

Developing an Emotional Design Strategy Model for Souvenirs: The Case of Guangdong Paper Cutting

Ms. Xiaojun Zhou¹, Asst. Prof. Dr. Kittisan Sriruksa², Dr. Arunee Sriruksa³

¹Ms. Xiaojun Zhou, Culture, Fine Arts, and Design Research Program, Faculty of Fine and Applied Arts, Khon Kaen University, Khon Kaen, Thailand, 40002, Email: xiaojun.z@kkumail.com (First Author)

²Asst. Prof. Dr. Kittisan Sriruksa, Culture, Fine Arts, and Design Research Program, Faculty of Fine and Applied Arts, Khon Kaen University, Khon Kaen, Thailand, 40002, Email: kitisri@kku.ac.th (Corresponding Author)

³Dr. Arunee Sriruksa, Culture, Fine Arts, and Design Research Program, Faculty of Fine and Applied Arts, Khon Kaen University, Khon Kaen, Thailand, 40002, Email: arunsr@kku.ac.th

Abstract

Based on Donald Norman's three-level emotional design theory, this study develops a strategic model for designing cultural tourism souvenirs and validates it using the case of Guangdong paper cutting, a traditional handicraft of Guangdong Province. A mixed-methods approach is adopted, combining consumer questionnaires targeting individuals aged 19 to 30 to explore emotional preferences, and interviews with consumers, artisans, designers, and souvenir sellers. The findings demonstrate that applying the proposed emotional design strategy model enhances the cultural depth and emotional resonance of souvenirs. The model offers a practical and adaptable framework for emotionally driven innovation in souvenir design, contributing to the development of cultural tourism.

Keywords

Design strategy model, Emotional design, Souvenir, Guangdong paper cutting, Cultural connotation

1. INTRODUCTION

The deep integration of culture and tourism is a key trend in the high-quality development of China's tourism industry. In 2022, the General Offices of the Central Committee of the Communist Party of China and the State Council issued the 14th Five-Year Plan for Cultural Industry Development, which emphasized the need to promote the integration of culture and tourism. The plan stated: "Efforts should be made to shape tourism through culture and highlight culture through tourism, fostering integration on a broader scale, at a deeper level, and with higher quality to create a uniquely appealing Chinese cultural tourism experience" (Central Committee of the Communist Party of China & General Office of the State Council of China, 2022). In addition, tourists' demand for experiences involving different cultures and lifestyles has become a key factor influencing travel decisions (Wang et al., 2023). Driven by both policy support and market demand, cultural tourism has emerged as a central direction for the development of China's tourism industry.

Cultural tourism refers to tourism activities in which the primary motivation of visitors is to learn about, experience, and consume the tangible and intangible cultural attractions or products of a destination (World Tourism Organization, n.d.). At its core, it aims to fulfill tourists' spiritual needs through meaningful engagement with local culture. Souvenir, as tangible representations

of the travel experience, serves as vital mediums for emotional connection between tourists and destinations. They are not only visual symbols and reminders but also carriers of intangible memories, extending the cultural and emotional experience beyond the journey itself (Zhang & Khan, 2024).

Despite the growing attention to cultural tourism, challenges remain in souvenir design. In recent years, China's souvenir market has expanded alongside the rapid development of tourism. Yet this growth has been accompanied by problems, particularly the severe homogeneity of products, which has significantly hindered sustainable development in the industry. Homogenized souvenirs often lack distinct regional characteristics and fail to inspire emotional engagement or purchasing motivation. Many souvenir companies operate on a small scale and lack innovation, resulting in products that struggle to reflect unique cultural features. Souvenirs from different scenic spots are often similar or even identical, which reduces consumers' willingness to buy and adversely affects the market (Hou, 2021).

To address this issue, high-quality souvenirs should explore cultural connotations that resonate emotionally with consumers. In recent years, researchers have applied emotional design principles to various cultural and creative products, including museum merchandise, intangible cultural heritage items, and themed souvenirs. However, most existing studies focus either on isolated emotional design cases or on theoretical discussions. There remains a gap in translating Emotional design theory into an actionable strategic model for souvenir development. To bridge this gap, this study attempts to construct a souvenir emotional design strategy model under the framework of Donald Norman's Emotional design theory (Quan & Khan, 2024).

In addition, this study seeks to validate the proposed model through design practice. Guangdong paper cutting, as a significant representative of Guangdong Province's traditional handicrafts and regional culture, is renowned for its exquisite artistic effects and rich cultural connotations. However, it is currently at risk of disappearing, primarily due to declining market demand and the impact of modern technology (Zhang, 2021). These challenges make Guangdong paper cutting an ideal medium for applying the emotional design strategy model through concrete design practice to test whether it can effectively transform representative traditional culture into souvenirs, thereby bridging cultural connotation and contemporary design innovation (Li & Khan, n.d.).

In summary, this study develops and tests an emotional design strategy model for souvenirs, using Guangdong paper cutting as a case study. It aims to provide a feasible and practical path for the innovative integration of local traditional culture and modern design theory in the context of cultural tourism development.

2.LITERATURE REVIEW

Emotional design has emerged as one of the core theories in the field of product design in recent years. Donald Norman, a pioneer of this design theory, proposed the three levels of emotional design: the outer tangible, the middle behavioral, and the inner reflective levels. These levels respectively focus on users' perceptual responses to a product, interactive use, and cultural associations (Norman, 2004). This model emphasizes that product design should consider both functional performance and emotional value, thereby expanding the traditional function-dominated design paradigm.

In recent years, emotional design has been increasingly applied in the research of cultural and creative products, including souvenirs. It has become an effective tool for connecting user experience with cultural communication. Based on differences in research content and methodology, current literature on emotional design in cultural and creative products are broadly divided into two categories: practice-based design research and case-based theoretical research (Du et al., 2023).

Practice-based design research focuses on the application of emotional design principles through specific cultural themes or design projects. For instance, Wu (2020) analyzed ritual symbols and totemic elements in Mazu culture and transformed them into a visual design language. Li (2021), using Suzhou gardens as a context, proposed an emotional design hierarchy of “scenery, scenario, and participation” to enhance user engagement and cultural experience. Wang and Li (2021), in the context of museum-inspired cultural products, introduced a layered emotional design strategy of “scene, interaction, and reflection” to foster user resonance and cultural connectivity. In addition, Zhu et al. (2023) conducted a quantitative analysis of Song Dynasty porcelain-themed cultural products, emphasizing cultural recognizability through weighted design elements. Song and Wang (2024) explored the emotional needs of Generation Z consumers and proposed innovative packaging strategies for Chinese tea beverages that integrate traditional cultural elements with modern aesthetics to enhance emotional resonance and brand identity.

Case-based theoretical research, on the other hand, aims to explore emotional design methods, benefits, and emerging trends by analyzing existing design examples. Li (2020) examined reflective-level emotional design strategies in cultural and creative products, highlighting the integration of cultural connotations and user value recognition to deepen emotional engagement. Yang (2021) selected design cases from the perspectives of cultural orientation, emotional interaction, authentic experience, and heritage transmission to conduct theoretical analysis and propose emotional design approaches. Li (2023) proposed emotional design strategies and development trends based on Norman’s three levels of visceral, behavioral, and reflective design.

Table 1 Representative Literature on Emotional Design in Cultural and Creative Product Research (2020–2024)

Research Type	Author (Year)	Research Subject	Research Methodology
Practice-based design research	Wu (2020)	Mazu culture-based products	Semiotic analysis, field survey
	Li (2021)	Suzhou garden-themed products	Situational experience analysis
	Wang & Li (2023)	Archaeological blind-box products	Scenario analysis, user research
	Zhu et al. (2023)	Song porcelain-themed products	Analytic Hierarchy Process (AHP)

	Song & Wang (2024)	Packaging design of Chinese tea beverages	User research
Case-based theoretical research	Li (2020)	Emotional design at the reflective level in cultural and creative products	Case analysis
	Yang (2021)	Emotional design of tourist souvenirs	Case analysis
	Li (2023)	Emotional design strategies for cultural and creative products	Case analysis

Overall, while current research on emotional design in cultural and creative products is abundant, most studies concentrate on individual case applications and design experience summaries. In the realm of souvenir design with rich cultural connotations, there is still a lack of concrete and actionable strategic models for emotional design (Chongcharoen et al., n.d.). Therefore, this study aims to develop a systematic emotional design strategy model for souvenirs, grounded in Norman's three-level Emotional design theory. The study will focus on Guangdong paper-cutting, a medium that combines visual appeal and cultural depth, to carry out design practices and empirical validation. The goal is to bridge the gap in theoretical application and methodological construction, thereby promoting the innovative expression and sustainable development of traditional crafts within the context of contemporary cultural tourism.

3. METHODOLOGY

3.1 Scope of Study

This study focuses on the application of emotional design in the development of cultural tourism souvenirs. It aims to construct a strategic model based on Donald Norman's three-level Emotional design theory and to validate the model's feasibility and effectiveness through a design case study of Guangdong paper cutting. The research seeks to provide a systematic theoretical foundation and a practical, actionable design framework for culturally rich souvenirs, enhancing their ability to evoke emotional resonance on a cultural level.

3.2 Data Collection and Analysis

An evaluation from multiple perspectives was conducted through in-depth interviews following the completion of the Guangdong paper cutting souvenir design. Participants will include target consumers, Guangdong paper cutting artisans, souvenir designers, and souvenir sales personnel. This approach aims to gather comprehensive feedback to further validate the effectiveness and practicality of the proposed emotional design strategy model.

3.3 Groups

To ensure comprehensive data collection, this study involves four main participant groups:

1. Target Consumers

This group includes more than 200 young consumers aged 18 to 30, who represent the main audience for cultural tourism and souvenirs, who play a key role in cultural transmission. They participate in a questionnaire survey to share their preferences regarding the emotional aspects

of Guangdong paper cutting souvenirs. Additionally, three consumers from this group participate in in-depth interviews to provide user-centered feedback during the design evaluation phase.

2. Guangdong Paper Cutting Artisans

This group includes two experienced artisans who possess deep expertise in traditional Guangdong paper cutting techniques. They offer insights into the cultural authenticity and craftsmanship reflected in the souvenir designs, helping ensure alignment with the cultural connotation of Guangdong paper cutting.

3. Souvenir Designers

This group consists of three professional product designers with experience in the development of cultural and creative souvenirs. Their feedback focuses on the effectiveness of emotional design strategies and the overall design quality from a design innovation and feasibility standpoint.

4. Souvenir Sales Personnel

This group consists of two participants with practical experience in the retail and commercialization of souvenirs. In addition to evaluating the market appeal, pricing strategies, and consumer acceptance of the new designs, they also provide detailed information on existing Guangdong paper cutting souvenir products, including current design trends and customer preferences. These insights contribute to a deeper understanding of the commercial context in which the proposed design strategy will be applied.

4. RESULTS AND DISCUSSIONS

4.1 Emotional design strategy model for souvenir

1. Emotional design levels of souvenirs

Souvenirs are not only material carriers of cultural tourism but also serve as mediators of tourists' emotional memories and cultural identity. In the design process, a deep understanding of consumer emotional responses across different levels can help enhance the attractiveness and cultural value of souvenirs. Therefore, it is essential to explore how the three levels of emotional design can be concretely mapped in souvenir development, providing a foundational analysis for the subsequent model construction.

At the outer visceral level, tourists' initial impressions of souvenirs are often based on sensory appeal. By optimizing intuitive design elements such as form, colour, and material, designers can improve users' visual and tactile experiences. For instance, vibrant colour, delicate craftsmanship, and unique shapes can quickly capture users' attention, generating immediate interest and positive feelings toward the souvenir. This instinctive appeal lays the groundwork for the initial emotional connection between the user and the product.

At the middle behavioral level, the functionality and usability of the souvenir contribute to enhancing users' emotional pleasure. Souvenirs that are not only visually appealing but also practical—such as accessories, ornaments, or stationery—are more likely to be kept and used over time. Moreover, the ease of use and the ability to evoke specific travel memories during use directly influence user satisfaction and emotional attachment.

At the inner reflective level, souvenir design should emphasize the transmission of cultural meaning, enabling users to emotionally resonate with the cultural values embedded in the product. By deeply exploring local cultural characteristics and incorporating them into the design, souvenirs can help consumers develop a more profound understanding and identification with

the underlying cultural message. This strengthens their emotional dependence on the product and enhances its value as a collectible.

In summary, emotional design, through the threefold path of the outer tangible, middle behavioral, and inner reflective levels, offers a more targeted design approach for souvenirs. It highlights users' emotional needs in terms of aesthetic appeal, functional utility, and cultural depth, thus providing theoretical support for the development of the strategy model.

2. Emotional design strategy model for souvenir

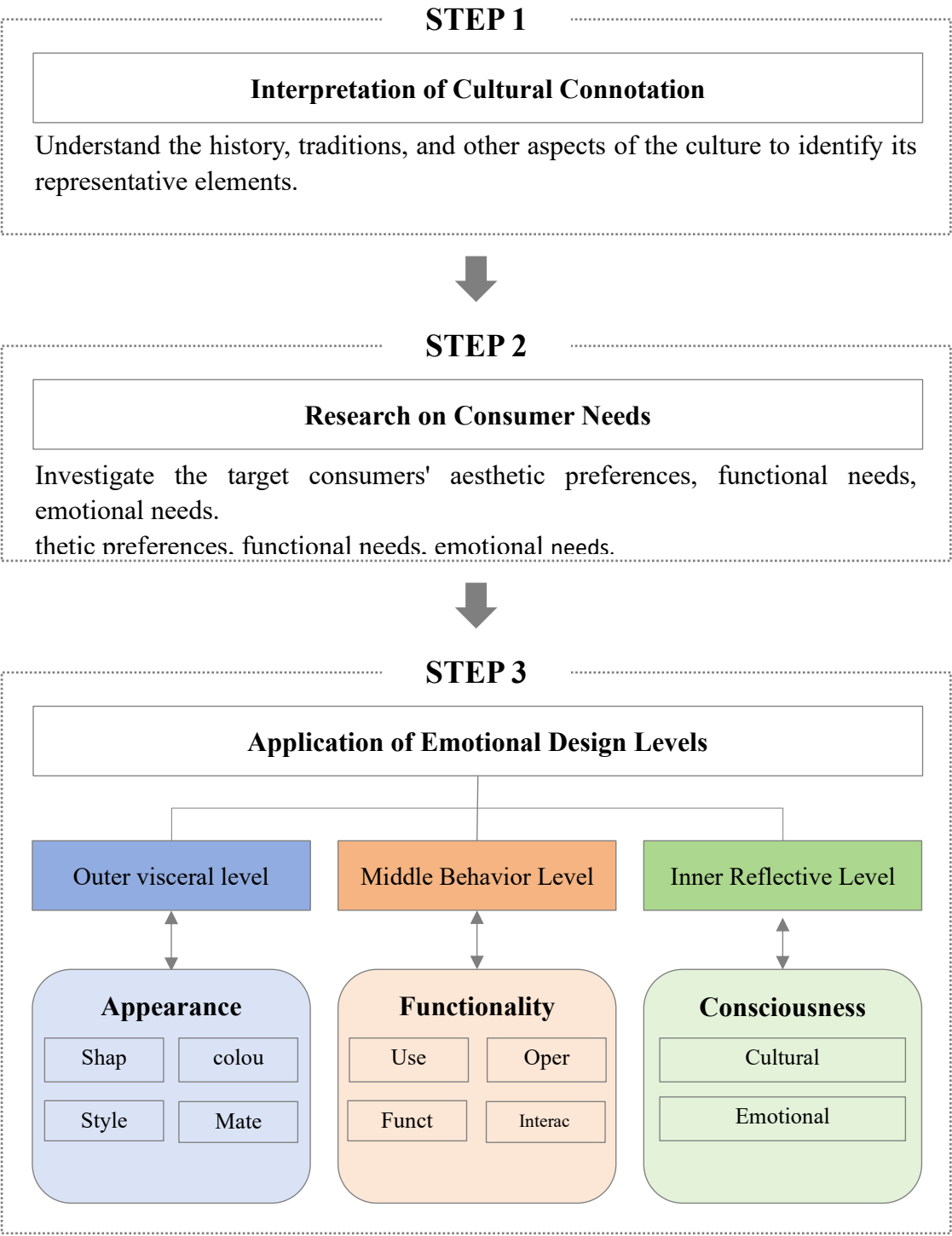
Based on the analysis of the roles played by the three levels of Emotional design theory in souvenir development, this study further proposes an emotional design strategy model. This model integrates the needs of target users with the cultural connotations embodied in souvenirs and follows a typical product design process. Its aim is to offer a systematic and practical framework for emotional design in the context of cultural tourism souvenirs.

The model comprises three core steps: Interpretation of Cultural Background, Analysis of Consumer Needs, and Application of Emotional Design Levels, as shown in Figure 1. These steps are closely interconnected and work collaboratively to facilitate the effective transformation of cultural content into souvenir design. Together, they help evoke emotional resonance more effectively.

In the first step, Interpretation of Cultural Background, the goal is to analyze and extract representative cultural elements such as patterns, colour, and symbols through an in-depth understanding of the cultural context. These elements are then integrated into the design as key components. This step ensures that the final design aligns with the targeted cultural background and accurately conveys its intended meaning.

The second step, Analysis of Consumer Needs, involves a thorough investigation of the target consumers' expectations. This includes their aesthetic preferences (for example, colour and form), functional requirements (such as usability and usage scenarios), and emotional needs (including cultural identity and emotional connection). This step supports a precise understanding of users' multifaceted demands, both emotional and practical, and guides the design of souvenirs that meet market expectations.

The third step, Application of Emotional Design Levels, integrates cultural meaning and user needs within Norman's three-level emotional design structure. This step ensures that the souvenir satisfies users' diverse expectations in terms of appearance, user experience, and cultural significance. As a result, it fosters strong emotional resonance across all three levels.



1. Cultural connotation of Guangdong paper cutting

As a traditional art form, paper cuttings often have distinct regional characteristics in their visual appearance. Secondly, paper cuttings carry profound folk culture and spiritual significance. They are not just decorative art but also an important medium for expressing emotions and beliefs. Therefore, by exploring the unique visual features and deep spiritual meaning of Guangdong paper cutting, one can gain a deeper understanding of their cultural essence.

(1) Visual Characteristics of Guangdong Paper Cutting



Guangdong paper cutting represents the southern style of Chinese paper cutting, characterized by its delicacy and intricacy, in contrast to the bold and straightforward style found in the north (Huang, 2014).

Unlike the scissor-based techniques commonly used in other regions, artisans in Guangdong primarily rely on engraving knives. This practice is supported by the region's advanced blade-making technology, which enables the creation of refined, smooth, and precise lines. As a result, Guangdong paper cuttings often feature complex and asymmetrical compositions that enhance their artistic diversity.

In terms of materials, Guangdong paper cutting can be broadly categorized into paper-based and metal foil types. Paper-based works typically employ red paper for festive and decorative purposes, while other colours such as yellow, white, black, and blue were traditionally used for sacrificial rituals. However, these ritual practices have largely diminished over time. Metal foil paper cutting is a distinctive feature unique to Guangdong. It uses materials such as gold foil and copper foil, often combined with coloured pigments to create vivid visual effects. This technique not only shows exceptional craftsmanship but also reflects the region's rich aesthetics (Guangdong Municipal Government & Guangdong Provincial Local Chronicles Office, 2024).

Taking the representative work "Like a Fish in Water" by Guangdong paper cutting intangible cultural heritage inheritor Deng Chunhong as an example, the key visual characteristics of Guangdong paper cutting are presented and summarized in the following Table 2:

Table 2 Visual characteristics of Guangdong paper cutting

Types of Guangdong paper cutting		Visual characteristics
Solid colour paper cutting	Metal foil paper cutting	
		Intricate, fine, and fluid lines showcasing the delicacy of paper cutting craftsmanship
		The composition emphasizing freedom, flexibility, visual balance, and dynamic beauty over strict symmetry.
		colour application with solid red or multicolours in vibrant hues, enhancing visual richness.





(2) Spiritual value of Guangdong paper cutting

Guangdong paper cutting is not only a widely circulated form of daily artistic decoration but also a folk tradition closely tied to the region’s vibrant folk activities and flourishing beliefs(Yan, 2015), becoming an integral part of people's spiritual world and a medium for expressing deep emotions.

Based on the themes, content, and belief carried by Guangdong paper cutting, they can be broadly classified into four categories. The first is nature worship, with themes centered around auspicious animals and plants such as dragons, phoenixes, fish, and flowers. These paper cuttings reflect people's reverence and awe for the natural world, symbolizing vitality, prosperity, and harmony, while conveying a longing for a better life. The second category is totem worship, often depicting mythical animals, landmark buildings, and content related to local folk activities. These themes not only showcase regional characteristics but also convey a sense of identity with traditional cultural symbols. The third is religious faith, which includes images of Confucius from Confucianism, Buddha from Buddhism, and deities from Taoism, commonly used for blessings and seeking protection. This reflects the important role of religious beliefs in the folk life of Guangdong. Finally, there is ancestor worship, where the themes involve ancestral hall decorations, sacrificial scenes, and portraits of famous individuals. These works express reverence and remembrance for ancestors, carrying family culture and historical memories.

These four categories of Guangdong paper cutting not only showcase the richness and diversity of Guangdong paper cutting art but also deeply reflect its spiritual significance and cultural value as an important medium of local folk culture.

Table 3 Cultural connotation of Guangdong paper cutting

Beliefs	Contents	Examples	
Nature worship	Sun and Moon, Ocean, Local Famous Mountains and Rivers		"Zao Mu Mountain" by Rao Baolian
Totem worship	Mythological Animals, Landmark Buildings, Folk Activities		"Guangdong Lion Dance" by Chen Yongcai
Ancestor worship	Ancestor Temples, Famous Historical Figures		"Foshan Ancestral Temple" by Chen Yongcai
Religious Belief	Confucianism Buddhism Taoism		"Xiqiao Guanyin" by Rao Baolian

2. Research on consumer needs of Guangdong paper cutting souvenirs

During the field survey phase, representative tourist attractions in Guangdong city, Guangdong Province are selected to gain an in-depth understanding of the types, design styles, and sales conditions of existing Guangdong paper cutting souvenirs. The field survey revealed that the current market mainly features decorative crafts with strong ornamental value, lacking functional practicality and innovative design. This is in significant contrast to the goals of Emotional design. Additionally, interviews with souvenir vendors indicated that the primary consumer group for these souvenirs consists of middle-aged and elderly individuals, while the appeal to younger groups is relatively weak. Based on this market gap, the primary target user group for future Guangdong paper cutting souvenirs will focus on young consumers.

Emotional design requires designers to adopt a user experience perspective to analyze and summarize user needs. The core of Emotional design is to focus on the emotional appeals of users, so that the designed product can help users experience its social value from physiological and psychological aspects, and provide them with a sense of pleasure (Zhang & Jiang, 2024). Therefore, to gain a deeper understanding of the target users' underlying needs, a questionnaire survey on the Emotional design of Guangdong paper cutting souvenirs was conducted for the target consumer group. A total of 223 questionnaires were distributed, and 215 valid responses were collected. The analysis of the questionnaire survey results is as follows:

(1) Appearance at the visceral level

The innovation of appearance design is a key factor in influencing the attractiveness of souvenirs. In the questionnaire survey, 78.6% of respondents expressed low satisfaction with the appearance of current products, indicating that the existing Guangdong paper cutting souvenirs fail to effectively attract target consumers, and urgent innovation in the appearance design is needed. Additionally, the survey provided multiple design style options, including traditional style, minimalist style, cartoon style, and other suggested styles, from which respondents could choose the one that best matched their preferences. The results showed that cartoon and minimalist styles received higher ratings, as shown in the following figure.

Target consumers' preferences for pattern style

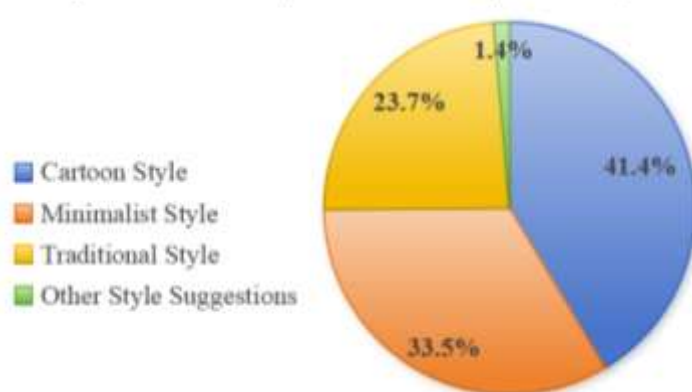


Figure 2 Questionnaire survey result: Target consumers' preferences for pattern style

(2) Functionality at behavioral level

The creativity of the behavioral level of Emotional design for Guangdong paper cutting souvenirs mainly comes from the development of product types. In the questionnaire survey of this study, options of the product categories for Guangdong paper cutting souvenirs included decorative

crafts, festive goods, daily necessities, stationery, clothing and accessories, and virtual products. Each respondent could select multiple options based on personal preferences. The results, as shown in the Figure 4 below, indicate that respondents' preferences for Guangdong paper cutting souvenir product types are as follows: daily necessities, clothing and accessories, stationery, festive goods, decorative items, and virtual products.

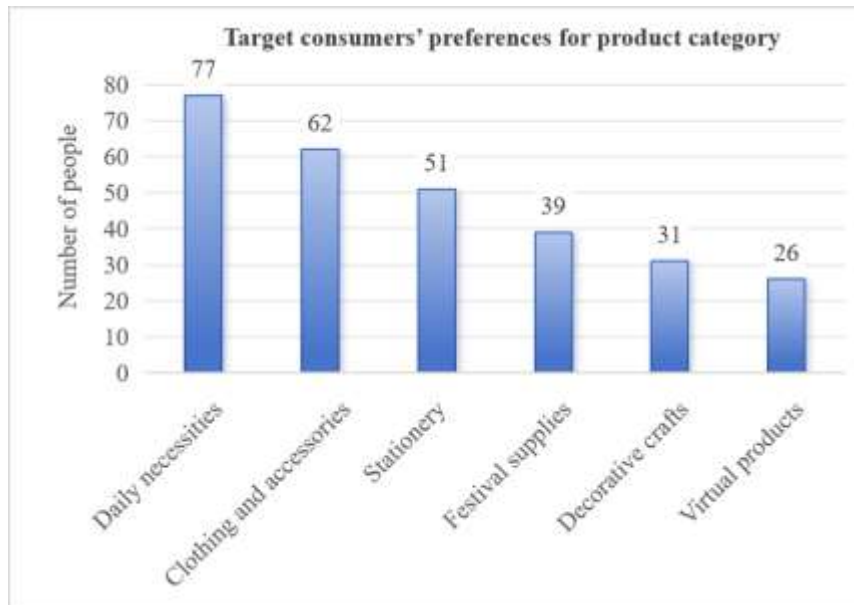


Figure 3 Questionnaire survey result: Target consumers' preferences for product categories

(3) Cultural connotation at reflective Level

The symbolism and cultural meaning of paper cutting primarily come from its patterns, which not only carry auspicious messages but also serve as important vessels for local cultural stories and spiritual beliefs. To address this, the survey included detailed options for Guangdong paper cutting patterns, allowing respondents to select multiple patterns they preferred. The results showed that the "folk activities" theme was the most favored, followed by "landmark buildings" and "Taoist beliefs".

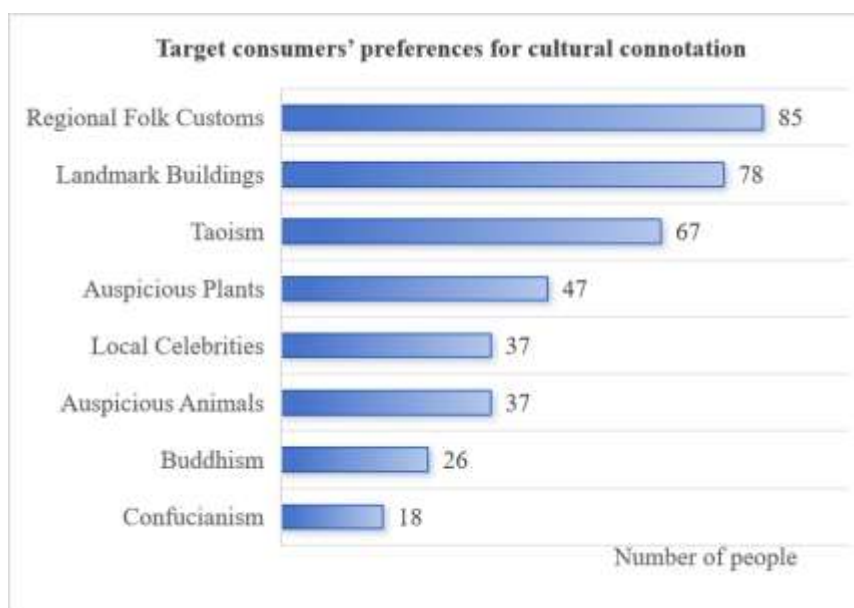


Figure 4 Questionnaire survey result: Target consumers' preferences for cultural connotation

In summary, the research findings indicate that the younger consumer group has a high demand for the aesthetic innovation, functionality, and cultural connotations of Guangdong paper cutting souvenirs. Therefore, Emotional design should focus on innovative appearance design, expand product functionality, and enhance the presentation of cultural elements in order to better meet the needs of the target users.

3. Application of Emotional design levels in Guangdong paper-cutting souvenirs



Based on the of the cultural connotations of Guangdong paper cutting and the findings from target consumer research, this section applies the three levels of emotional design to the development of Guangdong paper-cutting souvenirs. The detailed design elements are presented in Table 4.












At the outer visceral level, the designs draw inspiration from the works of Chen Yongcai's Young Wong Fei-hung and Rao Baolian's Martial Wong Fei-hung, both of whom are inheritors of Guangdong's intangible cultural heritage. The visual presentation adopts a cartoon-like style to enhance visual appeal and respond to younger consumers' preferences for individuality and novelty. While the patterns are creatively adapted, they retain key characteristics of traditional paper cutting in terms of colour, line, and composition to maintain cultural recognizability at the visual level.

At the middle behavioral level, the focus is placed on functionality and portability, ensuring that the souvenirs not only offer decorative value but also serve practical purposes in daily life. Based on user research results, priority is given to the development of highly functional product types such as coasters, eco-friendly bags, notebooks, and folders. These products aim to increase frequency of use and enhance perceived value.

At the inner reflective level, the design emphasizes the expression of cultural connotation. By integrating local figures, folk customs, and architecture, the souvenirs convey local narratives that stimulate users' emotional resonance. The pattern design incorporates three key elements: First, the image of Huang Feihong, a renowned historical figure in Guangdong, symbolizes the region's martial tradition and admiration for local heroes. Second, the lion dance pattern reflects the vibrancy of local folk activities. Finally, the Foshan Ancestral Temple, a historic architectural landmark, represents the city's legacy as a historic and culturally rich destination. The integration of these three patterns not only enriches the cultural connotation of the souvenir but also conveys a cohesive local narrative, allowing tourists to naturally develop emotional resonance through their interaction with the product.

Table 4 Design concept and process

Guangdong paper cutting prototype	"Young Huang Feihong" by Chen Yongcai	"Jingwu Huang Feihong" by Rao Baolian
		
visceral level	Solid colour paper cutting pattern	Metal Foil paper cutting pattern

			
Behavioral level	Daily Essentials	Stationery	wearable products
	  	 	 
Reflective level	The pattern design incorporates three key element: local figures, folk customs, and architecture.		
	1 	2 	3 

In conclusion, the Emotional design of Guangdong paper cutting souvenirs centers around the rich cultural heritage of Guangdong paper cutting, focusing on the integration of traditional culture with modern Emotional design concepts. The creative strategy should take into account the innate, behavioral, and reflective needs of the target users, aiming to achieve the fusion of cultural and practical value through multi-levelled design practices.

4.Design evaluation of of Guangdong paper cutting souvenirs

To validate the effectiveness of the proposed emotional design strategy model in the actual development of souvenirs, this study conducted a systematic user evaluation of the designed Guangdong paper-cutting souvenirs. The evaluation was carried out using a structured assessment form, covering multiple dimensions including aesthetic perception, functional practicality, cultural communication, and emotional resonance. Participants included ten individuals with

experience in purchasing travel souvenirs: ordinary users, paper-cutting artists, souvenir designers, and souvenir retailers. The goal was to obtain comprehensive feedback from diverse perspectives. Young consumers generally found the souvenir to be visually appealing, with a strong sense of design innovation. In terms of purchase intention, most consumers noted that the product was easy to carry and offered a certain degree of practicality, which positively influenced their willingness to purchase.

Paper-cutting artists affirmed the cultural authenticity and creative expression of the design. They emphasized that the product successfully incorporated contemporary aesthetic language into traditional patterns, allowing traditional art to enter the lives of younger generations in a more relatable and accessible way.

Souvenir designers noted that the overall style of the product reflected both the regional characteristics of Guangdong paper cutting and the aesthetic preferences of young consumers. They highlighted its strong recognizability and memorability as key advantages.

Souvenir retailers pointed out that, compared with existing Guangdong paper-cutting souvenirs, the product was more likely to attract the interest of young customers and was well-suited for promotion within the cultural and creative product market. This indicates a certain degree of market potential for commercial development.

In summary, the evaluation results demonstrate that the Guangdong paper-cutting souvenir developed based on the emotional design strategy model received generally positive feedback in terms of aesthetics, functionality, and cultural value. These findings support the feasibility and effectiveness of the model in practical application.

5. CONCLUSION

This study aimed to explore how Emotional design theory can be effectively applied in the development of souvenirs and to construct a systematic design strategy model based on this approach. Drawing on Donald Norman's three-level theory of emotional design, the study proposed a strategy model comprising three sequential steps: Interpretation of Cultural Background, Analysis of Consumer Needs, and Application of Emotional Design Levels. This model serves as a theoretical framework intended to guide designers in transforming deep cultural values into souvenir designs that evoke emotional resonance among users.

To validate the practical effectiveness of the proposed model, Guangdong paper cutting, a form of national intangible cultural heritage, was selected as a case study. Individuals aged 19 to 30 were identified as the primary target consumer group. The design process closely adhered to the model's three-step structure. First, the cultural characteristics and symbolic meanings of Guangdong paper cutting were systematically analyzed. Second, user surveys were conducted to gather insights into the emotional preferences and practical needs of the target audience. Third, the findings were integrated into the three emotional design levels—namely, the outer visceral level, the middle behavioral level, and the inner reflective level—in order to facilitate the translation of cultural content into concrete design outcomes.

Furthermore, a comprehensive design evaluation involving various stakeholders was carried out to assess the model's effectiveness in real-world product development. Participants included general consumers, paper-cutting artists, souvenir designers, and retailers. Feedback was collected across multiple dimensions, including aesthetic appeal, functional practicality, cultural communication, and emotional engagement. The evaluation results indicated that the designed

Guangdong paper-cutting souvenirs were well received in terms of visual attractiveness, usability, and cultural representation. These findings support the feasibility and effectiveness of the proposed strategy model in practical design applications.

In conclusion, the emotional design strategy model developed in this study not only provides a clear and structured framework for the creation of cultural tourism souvenirs, but also demonstrates strong practical potential. By integrating cultural interpretation with emotional user experience, the model offers a viable path for developing souvenirs that are both culturally meaningful and commercially appealing. Additionally, it contributes theoretical and practical value to the broader effort of transforming intangible cultural heritage within the cultural and creative industries.

6. Recommendation for Further Research

Building upon Norman's three levels of emotional design, this study successfully developed and validated an emotional design strategy model for cultural tourism souvenirs. However, several limitations remain, which provide valuable directions for future research.

The proposed model was applied and validated through a single case study focusing on Guangdong paper cutting. To further examine its generalizability and adaptability, future research is encouraged to test the model across a wider range of cultural product types. Moreover, this study specifically targeted young consumers aged 19 to 30, which limits the applicability of the findings to other demographic groups. Expanding future studies to include children, older adults, and international tourists would help capture a more comprehensive range of emotional needs and user perspectives.

In conclusion, the emotional design of cultural tourism souvenirs offers substantial potential for further research. Future work should deepen exploration in both case studies and user demographics to foster innovative integration of cultural and emotional values.

REFERENCES

- Central Committee of the Communist Party of China, & General Office of the State Council of China. (2022, August 16). *The 14th Five-Year Plan for Cultural Development*. Xinhua News Agency. https://www.gov.cn/zhengce/2022-08/16/content_5705612.htm
- Guangdong Municipal Government, & Guangdong Provincial Local Chronicles Office. (2024, March 5). *Foshan paper cutting: Beauty of folk art never fades*. Guangdong Provincial Chronicle. https://dfz.gd.gov.cn/zjgd/content/post_4385321.html
- Hou, F. F. (2021). Development and design of tourism souvenirs. *Papermaking Equipment & Materials*, (02), 181–182.
- Huang, Y. C. (2014). *The origin, classification and evolution of Chinese paper cutting* (Doctoral dissertation, University of Leeds).
- Li, Q. Q. (2023). Design strategies for cultural and creative products based on emotional design concepts. *Footwear Technology and Design*, 3(22), 39–41.
- Li, W. (2020). Emotional design of cultural and creative products based on the reflective level. *Art Work*, (06), 89–92.
- Li, W. (2021). Research on cultural and creative product design based on emotional design: A case study of the “Suzhou Gardens” design practice. *Zhuangshi (Decoration)*, (05), 136–137. <https://doi.org/10.16272/j.cnki.cn11-1392/j.2021.05.032>

- Norman, D. A. (2005). *Emotional design: Why We Love (or Hate) Everyday Things* (1st ed.). Basic Books.
- Song, M. Y., & Wang, C. X. (2024). Innovative packaging design of Chinese tea beverages based on the emotional needs of Generation Z. *Packaging Engineering*, 45(16), 235–244.
- Wang, W. Z., & Li, F. (2023). Research on the emotional design of cultural and creative products in museums. *Design*, 8(4), 4157–4165. <https://doi.org/10.12677/design.2023.84508>
- Wang, X. H., Wei, J., & Song, D. D. (2023). A review of domestic tourism consumer behavior. *Foreign Economic Relations & Trade*, (09), 61–64. <https://qikan.cqvip.com/Qikan/Article/Detail?id=7110512271>
- World Tourism Organization. (n.d.). *Tourism and culture*. UNWTO. Retrieved March 18, 2025, from <https://www.unwto.org/tourism-and-culture>
- Wu, L. D. (2020). Exploration of cultural and creative product design based on emotional design: A case study of Mazu cultural creative products. *Journal of Putian University*, 27(3), 37–43.
- Yan, M. X. (2015). The Guangdong cultural characteristics of Foshan paper cutting in Guangdong Province. *Journal of Yanbian Party School*, 31(05). <https://doi.org/10.16332/j.cnki.cn22-1302/d.2015.05.025>
- Yang, Q. C. (2021). Design of tourist souvenirs based on emotional design. *Packaging Engineering*, 42(02), 279–281. <https://doi.org/10.19554/j.cnki.1001-3563.2021.02.046>
- Zhang, J. J. (2021). Research on the application of Foshan paper cutting art in modern design. *Designs*, (02), 31–35. <https://doi.org/10.16129/j.cnki.mysds.2021.02.013>
- Zhang, X., & Jiang, Y. (2024). Research on museum website interface design based on Emotional design theory: A case study of the Palace Museum website. *Art Education Research*, 4, 90–93.
- Zhu, J. G., Cui, L. N., Qi, Q., & Wu, Y. (2023). Research on the design of cultural and creative products based on emotional design: A case study of "Song porcelain cultural creation" design practice. *Furniture & Interior Design*, 30(1), 80–85. <https://doi.org/10.16771/j.cn43-1247/ts.2023.01.014>
- Chongcharoen, D., Shahid Khan, M., & Jankaweekun, P. (n.d.). วารสารนวัตกรรมการจัดการ ปีที่ 4 เดือนกรกฎาคม-ธันวาคม 256 วิจัย นวัตกรรมและการจัดการ มหาวิทยาลัยราชภัฏสวนสุนันทา Does Global Leadership Development Boost Multinational Corporations (MNCs) Performance?
- Du, M., Khan, R., Khan, M., & Khan, M. S. (2023). The impact of transformational leadership on employee's performance: the mediating role of job satisfaction and employees' commitment. *International Journal of Learning and Intellectual Capital*, 1(1). <https://doi.org/10.1504/ijlic.2023.10058304>
- Li, L., & Khan, M. S. (n.d.). How Does Green Transformational Leadership Influence Employee Green Behavior? - Based on the Mediating Effects of Self-Efficacy, Green Positivity and Green Organizational Culture. In 389 *Rajapark Journal* (Vol. 17, Issue 55)
- Quan, J., & Khan, M. S. (2024). The mediating role of job satisfaction and competitive advantage between quality management practices and sustainable performance: Case of hospitals in Guangxi, China. *Human Systems Management*, 43(6), 971–988. <https://doi.org/10.3233/HSM-240045>
- Zhang, H., & Khan, M. S. (2024). Empirical Research On Ethical Leadership And Knowledge Workers' Innovative Behaviour: The Mediating Role Of Job Autonomy. *Revista de Gestao Social e Ambiental*, 18(9). <https://doi.org/10.24857/rgsa.v18n9-091>