



Research on the Influencing Factors of Tourism Flow Experience and Analysis on the Management Strategy of B&B Industry

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Abstract. At present, the Bed & Breakfast (B&B) industry is faced with the problems of product homogeneity, low-level operation, and management innovation. At the same time, flow experience, as a new type of travel experience, has attracted more and more attention. Therefore, this study proposes suggestions for the management and innovative development path of the B&B industry by studying the factors that affect the immersive experience of tourism. Based on the public comment website, this paper uses Python to crawl the online comments of tourists on “live-action role-playing game (LARP)”, and conducts a visual analysis of big data to initially form the main categories of antecedents of immersive experience. On this basis, use Nvivo to further analyze the text data, and finally summarize the antecedents and behavioral intentions of tourists’ immersive experience, so as to propose development strategies for B&B management. The study found that the antecedents of tourists’ flow experience mainly include: Theming and storytelling, atmosphere, immersion, service provided by B&B, service attitude and interactivity. Tourists gain flow experience and meaning experience through embodied practice, which ultimately affects tourists’ behavioral intentions. Based on the new service scenario, the article constructs a model diagram of the antecedents, participation process and behavioral results of tourists’ immersive experience, and proposes development strategies for the management of the B&B industry.

Keywords: Flow experience · Live-Action Role-Playing Game · Grounded theory · Business management strategy

1 Introduction

In the era of experience economy, the demand structure and content of tourists have undergone great changes, and tourism experience is favored by the majority of tourists. In 2017, immersive experience has entered the view of the Chinese public, and consumers felt an unparalleled sense of presence, interaction, and narrative in the immersive experience. Therefore, immersive experience has become a popular form of offline online celebrity entertainment for young consumers. In 2021, the Ministry of Culture and Tourism will vigorously support the development of immersive experience, encourage

the development of new consumption models such as customization, experience, and interaction, create new scenarios of immersive tourism experience, and promote the optimization and upgrading of *the* cultural industry structure. In recent years, “live-action role-playing game(LARP)” have been integrated and developed with various industries. The diversified combination of “LARP game” and immersive cultural tourism has become an important new format of cultural tourism, creating immersive consumption scenarios, accelerating industrial integration and innovation.

Previous studies have shown that immersive experience as a new format has attracted widespread attention from scholars. Therefore, based on the narrative space of “LARP game”, this paper crawls network text data, uses Python for visual analysis to study the antecedents and behavioral intention of tourists’ immersive experience, so as to propose a marketing strategy for the management and innovative development of the B&B industry.

2 Literature Review and Related Concepts

2.1 Flow Experience

Flow experience refers to an individual’s psychological state when fully engaged in an activity or involved in an event [1].

Flow experience, also known as optimal experience, is often described as a feeling of excitement, deep enjoyment, and a sense of loss of self-awareness [6]. Specifically, people immersed in an activity that can only focus on a specific goal while ignoring the existence of other things, and then feel pleasure and fulfillment [3]. At present, the research on immersion experience at home and abroad mainly focuses on the dimensions and measurement of immersion experience, the conceptual connotation of immersion experience, the influencing factors of immersion experience, and the immersion perception research based on new technologies such as XR, VR, AR [7]. And, based on the music festival, some scholars have discussed the perception dimension of tourists’ immersive experience in the scene atmosphere.[4]. However, research on the antecedents, influencing factors and outcomes of immersive experience based on different scenarios needs to be deepened.

2.2 Live-Action Role-Playing Game

The “live-action role-playing game” originated from a British board game “Murder Mystery Game”, also known as “Script Homicide”. At present, “two days and one night LARP” in China is mainly a combination of B&B and “LARP game”. The “LARP game” mainly has seven stages: character selection, reading the script, searching for clues, round table discussion, voting for the murderer, revealing the suspense, and replay game.

3 Methods

3.1 Data Collection

This article selects the top 10 cities (Shanghai, Wuhan, Beijing, Chengdu, Xi'an, Changsha, Nanjing, Tianjin, Shenzhen, Hangzhou) as the case cities based on the number of physical stores in Meituan's "2021 Entity LARP Game Consumption Insight Report" in 2021. Wuhan and Changsha lack relevant content, and finally Data from 8 cities were selected for analysis.

Dianping is a commonly used online travel platform (OTA) website in China, especially the LARP game players. Therefore, based on the public comment website, this article conducts a purposeful search on these eight cities. The search conditions are user comments that meet the "two days and one night". And the data crawling time is March 18, 2022, finally 1732 comments were crawled, with a total of 416402 words.

3.2 Data Process

First of all, this paper uses Python to preprocess the collected network data, and uses the jieba library to implement text segmentation processing. According to the segmentation results, the dictionary is manually modified by reading to form a more accurate word segmentation. Then, the word frequency statistics are sorted for the word segmentation, and the top 30 high-frequency words are selected. The specific content is shown in Table 1.

Table 1. High frequency word sorting (Top 45).

Words	Number	Words	Number	Words	Number
script	1793	room	364	expect	209
plot	1286	link	353	case detection	207
experience	1183	chamber	344	evidence	204
NPC	1138	deduce	336	clothing	201
LARP	787	feature	317	empathy	195
player	691	atmosphere	289	stimulate	192
role	670	photograph	270	price	190
game	639	accommodation	263	reasoning	186
environment	578	delicious	252	tasty	175
scenes	574	clothes	248	ambient atmosphere	167
service	564	recommendation	230	team building	165
immerse	457	skills	228	profession	160
Story	446	experience	216	props	159
theme	392	dress up	212	interactive	150
DM	387	staff	211	replay	144

3.3 Grounded Theory

Grounded theory was proposed by sociologists Glaser and Strauss in 1967. It abstracts theories by systematically summarizing data in a bottom-up manner, in order to find the core concepts of social phenomena and the relationship between concepts. This paper uses grounded theory to conduct open coding, spindle coding and selective coding of text data, and explores the impact mechanism of tourism immersive experience in the service scenario of "LARP". According to the key dimensions formed by the above-mentioned high-frequency words, this paper forms 7 core categories, 18 main categories and 62 initial analysis concept categories based on coded 1700 comments. The remaining 32 reviews were used as a theoretical saturation test, and it was found that no new categories emerged, reaching a state of theoretical saturation.

The main category and the core category are the main content of the research, which can summarize and abstract the theoretical framework. Since there are many coding contents, this article only shows the core category and the main category. The coding results are shown in Table 2.

Table 2. Grounded theory coding

Core category	Main category
Theming and storytelling	screenplay theme story
	Skill - Challenge
	Player-character fit
Atmosphere	scene layout
	scene interpretation atmosphere
Immersion	scene interpretation atmosphere
	time warp
	immersive
Service attitude	thoughtful service
	instant response
	service enthusiasm
Services	accommodation conditions
	pick-up service
	Shooting service
Interactivity	interact with staff
	Interaction between players
Behavior intention	Recommend intention
	Revisit intention

4 Data Analysis

According to high frequency words, word cloud and collected text data, and combined with the existing literature on flow experience, the driving factors of tourists' flow experience can be summarized into the following six aspects: Theming and storytelling, atmosphere, immersion, services, service attitudes, and interactivity. Tourists gain a flow experience in the process of participation and experience, which has an impact on tourists' behavioral intentions.

4.1 Theming and Storytelling

Theming and storytelling includes three aspects: the theme story of the script, the balance between the player's skills and the challenge of the script, and the fit between the player and the script character. In the "LARP game", players are immersed in the text story, enter the game situation from a first-person perspective, and exchange information with other players, store staff, DM, NPC, etc. The biggest feature of the "LARP game" is that the game itself brings players an immersive experience, which mainly comes from the characters and plot in the script.. The relationship between the difficulty of the script and the player's skills is balanced, which is beneficial for the player to obtain the best experience. In addition, the logic, coherence, originality of the plot, the reductiveness of the story, and the similarity between the characters and experiences of the players and the characters will all affect the tourists' sense of experience, substitution and immersion in the process of participation.

4.2 Atmosphere

Atmosphere refers to the background elements in the service environment and human sensory perception [2]. In this paper, the sense of atmosphere includes two types, one refers to the atmosphere created by the elements of the service scene such as scene layout, service, sound, light and sound effects, so that tourists can experience the immersive experience. The other type refers to the environment atmosphere created by the store staff, NPC, DM, companions and other players acting as characters, bringing tourists a sense of substitution. The sense of atmosphere brings the alternate perception of the player's facial features. Visually, the text and picture information of the script is perceived in the brain, and the player's memory is formed. In terms of hearing, the background music, sound and light create an atmosphere, increasing the player's sense of immersion [5].

4.3 Immersion

Immersion is a state in which an individual feels pleasure and satisfaction in focusing on the current target situation. In the process of participating, players forget the "real self" of the real world, blur the boundaries between the real world and the virtual world, substitute the character's identity, and understand the character's story and emotions. The fidelity and reductiveness of this scene arrangement and personnel interpretation

jointly participate in the construction of the player's immersive experience. High-quality immersion will also bring unforgettable memories to visitors (such as cultural output and national feelings in the script), which also affect the players' values and have a transformative impact on their life.

4.4 Services Provided by B&B Industry

Under the new format, homestays combine LARP game, take script IP as a cultural carrier, and take tourists' basic accommodation needs as the basis, becoming a new form of sustainable development for the B&B industry. The services provided by the B&B include training the professional skills of service personnel, accommodation, food, designing game links, pick-up services, and interacting with players during the game. The hygienic and tidy environment of the accommodation, the characteristics and taste of food, and the professional level of NPC acting skills will all affect the player's satisfaction and further affect the player's behavioral intentions.

4.5 Service Attitudes

The service attitude of the homestay is the most critical factor affecting the quality of tourists' experience. Before the tour, the interaction between the homestay and potential tourists (e.g. patiently answering tourists' information consultation). In the experience stage, the staff of the homestay has a warm and considerate service attitude. In the post-tour stage, targeted responses can be made to tourists' comments, compensatory measures can be taken for tourists who are dissatisfied with the experience, and tourists who are satisfied with the experience can be further strengthened, so as to achieve the value of tourism host and guest is created together.

4.6 Interactivity

Game interaction is an interactive communication application with situational interaction, relational interaction and agenda interaction as the main communication methods. From the perspective of situational interaction, the "LARP game" takes the script as the core output, supplemented by the scene layout. From the perspective of relationship interaction, in the "LARP game", players quickly pull into the relationship between each other, and broke the gap between interpersonal communication. From the perspective of agenda interaction, every game program needs to realize the interaction between players and players, DMs, NPCs, and the resonance between players and scripts.

This paper constructs the model diagram shown in Fig. 1, which reflects the entire framework of the antecedents, participation process, and behavioral consequences of the flow experience.

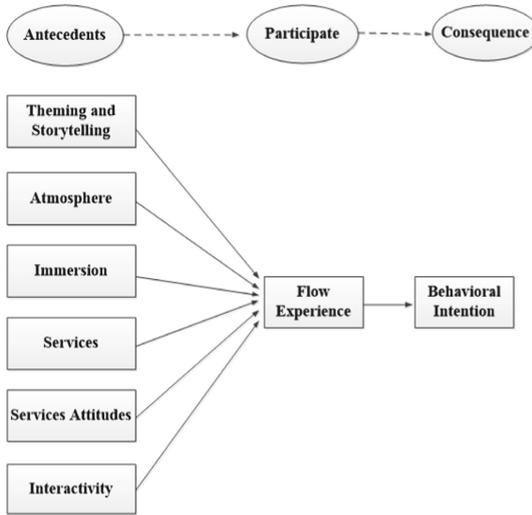


Fig. 1. Framework diagram of the antecedent and consequences of tourist flow experience.

5 Conclusion and Management Strategy

This paper explores the influencing factors of tourists’ immersive experience through physical practice and emotional perception under the new scenario of “tourism + LARP game”. The study found that the antecedents of tourists’ flow experience of “LARP games” in the B&B service scene mainly include: theming and storytelling, atmosphere, immersion, services, service attitude, and interactivity. The flow experience obtained in the process of participating in the interaction will further affect the future behavior of tourists, that is, the tourists’ recommendation intention and revisit intention.

In the experience awakening stage, based on their own unique diversified demand motives, tourists use the script chain plot as a medium to transmit into the narrative world. In the narrative world, tourists are placed in a dramatic scene atmosphere, fully mobilizing the body’s multi-sensory participation. Every tourist is deeply involved in the game, and emotions are transmitted to each other through physical interaction, resulting in emotional resonance, identity, and group unity, forming a high degree of “emotional ties”. When interacting with the script and staff, tourists deeply perceive the quality of tourism services and various interwoven experiences, and obtain rich emotional responses from them. There are positive emotions such as joy, excitement, surprise, excitement, happiness, pleasure, novelty, and moving, as well as moderate or negative emotions such as boredom, tension, regret, disappointment, anxiety, fear, and fear. Through a series of participation processes such as tourists’ cognition, embodied practice, and emotional perception, a pleasant and enjoyable immersive experience is finally generated in the narrative space, and these experiences further promote tourists’ continuous behavioral intentions.

5.1 Combined with Cultural IP

The script is the core of the script-killing game and a key element for tourists to obtain an immersive experience. A high-quality, unique script is fundamental to attracting tourists and increasing their satisfaction. At the same time, IP has gradually become the core of the entertainment industry and a symbol of vitality, providing a new source of development for the development of the “LARP game” industry. The broad prospects for the development of my country’s IP industry benefit from the long history and cultural heritage of China. Therefore, B&Bs should purchase original scripts that contain local culture, or create scripts rich in historical and cultural elements in combination with cultural IP. It is not only conducive to enhancing the attraction of tourism, but also conducive to the strong emotional resonance of tourists and the sense of historical substitution based on plot experience.

5.2 Create Scene Atmosphere

As the physical medium of tourists’ immersion experience, scene atmosphere is extremely important for tourists’ sense of substitution and immersion. Therefore, B&Bs should devote themselves to the layout of the scene, by creating scenes that match the plot, providing costumes that match the plot, and using lighting, background music and digital technology to create a realistic and reductive scene atmosphere, so that players feel Being in a virtual world brings players a sense of immersion and substitution, and improves the quality of player experience.

5.3 Improve the Professional Skills of Employees

In the narrative world, tourists are always in the process of communicating and interacting with the staff. The acting skills of DMs and NPCs, their line skills, professionalism and business ability directly affect whether the players can take the role and enter the plot. Therefore, when managing employees, professional training should be carried out on the skills of employees, the interpretation ability of employees should be improved, and professional knowledge should be enhanced, thereby improving the quality of tourism services. At the same time, the professional skills of employees are also an important factor affecting tourists’ satisfaction and willingness to revisit.

5.4 Improve Staff Service Attitude

The script killing game industry currently has serious industry regulation problems, and its negative reputation has a profound impact on the image of the industry’s development. Therefore, it is very important to improve the service attitude of the staff and improve the quality of tourism services to change the stereotype of tourists. Before the tour, the staff patiently responds to the inquiries of the tourists and understands the habits of the players in advance; during the participation process, they are warmly received, considerate and meet all the needs of the players, and don’t ignore the players’ satisfaction after the tour. The service attitude of the staff has a profound impact on tourists’ sense of experience and behavioral willingness, and can even remedy the negative effects of service failure to a certain extent.

5.5 Limitations and Future Research

Although this paper constructs the structural framework of immersive experience in the new scenario of tourism service, there are still some limitations. (1) The data source for this article is limited to one social media site, and future research should use multi-source data to conduct research in order to be more scientific. (2) This paper only studies the antecedents and consequences of immersive experience, and in future research, a mixed research method should be used to further investigate to what extent these factors affect flow experience.

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