

The Evaluation of Tourism Services Quality for the Senior Tourists in Xishuangbanna China: An Investigation Using the SERVPERF Model[†]

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Abstract

With the development of economy and society and the deepening of aging, elderly tourism has become a tourism market that cannot be ignored at this stage and in the future. There are still many problems in the process of providing tourism services for elderly tourists in various tourist destinations. Although domestic research on elderly tourism has been on the rise in recent years, there are relatively few studies on the quality of elderly tourism services. Under the guidance of active aging, tourism service system, service quality evaluation and other related theories, this paper uses the SERVPERF model, first of all, the current situation of the service quality of the destination elderly tourism service is studied, and the characteristics of the elderly tourism service are summarized; secondly, the theoretical model of the destination elderly tourism service quality evaluation system is constructed, and the service quality evaluation system of the elderly tourism service is designed and established; then, Xishuangbanna is selected as a case place, and a sample is sampled for questionnaire survey. Using the entropy right fuzzy comprehensive evaluation method to analyze the data, the results show that the quality of the elderly tourism service in Xishuangbanna is general, only in the category of "basic satisfaction", and there are problems such as lack of construction of ageing facilities, insufficient provision of ageing tourism services, lack of attention to the safety of elderly tourism, and irregularity of the elderly tourism market. Finally, in view of the existing problems, policy suggestions for improving the quality of tourism services for the elderly in tourist destinations are proposed.

Keywords: Tourism destination, Elderly tourism service, Quality evaluation system

Introduction

This part leads to the research questions in this paper from the background of the increasingly serious problem of population aging, the emergence of elderly tourism as a new growth point of the tourism economy, and the need for destinations to improve the quality of elderly tourism services.

Research background

1) The aging of the population will become one of the most significant social changes in the 21st century. Population ageing is a well-known phenomenon in most developed countries, where the proportion of older persons has been steadily rising over the past century. As the median age rises, the age composition of the world's population is changing rapidly, with the result that the younger elderly population is decreasing. This has led to an increased aging of the population in almost all developed countries of the world. By 2030, the global population aged 60 and over is expected to grow by 56 % to 1.4 billion people, and by 2050, the global elderly population is expected to more than double to nearly 2.1 billion (United Nations 2015). In China, a developing country, due to special reasons such as the country's family planning policy in the past 30 years, the problem of population aging is also very prominent. Data from the 7th Census of the National Bureau of Statistics of China shows that the total

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working-age population is still declining in 2020, while the degree of aging continues to deepen. 2020, the working-age population aged 16 - 59 fell from 897.29 million to 894.38 million, a decrease of 2.91 million, while the population aged 60 and over fell from 249.49 million to 264.02 million, an increase of 14.53 million, and the proportion of the total population also rose from 17.9 - 18.70 %. It is expected that the elderly population will reach 483 million in 2050, accounting for 34.1 %, and will become a highly aging country. We should see that in the context of deepening aging, the continuous upgrading of consumer demand for the elderly has made the “silver economy” an important part of China’s economic development, and there is a huge market potential behind aging.

2) Elderly tourism has become a new growth point for tourism economy. According to the relevant data of the China National Tourism Administration, the current silver-haired tourism group is growing rapidly, accounting for 20 % of the tourism market share, and the elderly tourism industry has gradually become a new growth point for the tourism economy.

3) Complaints about the quality of services in the tourism industry have increased. In 2019, China Quality Miles Consumer Complaint Platform received a total of 29,772 valid complaints, an increase of 264.2 % over 2018, and tourism complaints accounted for 2.5 % of all consumer complaints.

Research implications

1) Theoretical significance. The main significance is 3 aspects: One is to make up for the shortcomings of existing research and enrich the theoretical system of elderly tourism through the study of the problem of elderly tourism services; the second is to enrich the research objects of tourism service quality based on the perception of elderly tourists; third, to study the elderly tourism market as an independent tourism market. Combined with the characteristics of elderly tourism services, the evaluation system of elderly tourism service quality and the method of improving the quality of elderly tourism service are discussed, with a view to providing theoretical guidance for the development of elderly tourism in tourist destinations.

2) Practical significance. First, through the analysis of the perception and evaluation of elderly tourists, understand the advantages and disadvantages of tourism destinations for the elderly, improve the service quality of existing services, and enhance the service quality and market competitiveness of destinations; second, it is conducive to improving the aging transformation of software and hardware facilities in tourist destinations, and guiding the development of elderly tourism services in the direction of standardization and standardization; the third is to improve elderly tourism services.

Research the problem

1) How are the perceived satisfaction of elderly tourists in Xishuangbanna with the 5 dimensions of SERVPERF?

2) What are the problems of tourist destinations in serving elderly tourists? In what ways should the quality of tourism services for older persons in tourist destinations be improved and improved?

Research objectives

1) Evaluate the quality of elderly tourism services in Xishuangbanna.

2) Put forward guidelines for quality service management to meet the needs of elderly tourists in Xishuangbanna.

Theoretical framework for literature review

Review of foreign literature

Foreign literature mainly includes literature related to elderly tourism and tourism service quality evaluation, and the research content is more systematic and comprehensive.

Research on elderly tourism has focused on 4 areas: The motivations of elderly tourists, the preferences and characteristics of elderly tourists, the constraints of elderly tourism, and the development of the elderly tourism market.

Most of the research on the quality of tourism services has focused on evaluation perspectives, evaluation models and evaluation methods.

1) Research on the perspective of tourism service quality evaluation

The evaluation of tourism service quality is generally based on the 3 perspectives of customers, managers and service providers, and their emphasis on service quality and performance evaluation will be different, and they will have different perceptions of the same service. Research by Voget and Fesenmaier (1995) show that companies cannot accurately judge the level of experience for tourists and therefore tend to underestimate the quality of travel services. Tsang and Qu (2010) argue that, for the most part, managers overestimate the quality of travel services. The evaluation of the quality of tourism services is to seek consumer loyalty and should be developed from the customer's point of view. 982 proposed that the perceived quality of service, that is, the gap between the customer's expectations for the service and the actual service, is a subjective perception of the customer. Voget and Fesenmaier (1995) also stated that managers and service providers should focus on customers. Since then, evaluating the quality of service from the customer's point of view has become the basis of many studies.

2) Research on tourism service quality evaluation model

The models used to evaluate quality of service are the perceptual quality of service model, the SERVQUAL model, the SERVPERF model, and the IPA model. 982 proposed a customer-perceived quality model based on the theory of perceived service quality. Pamsuraman et al. (1988) proposed the SERVQUAL model, which considered quality of service to have 5 attributes and designed 22 specific questions to constitute an evaluation scale. On this basis, (Cronin & Taylor, 1992) revised the SERVQUAL model and proposed the SERVPERF performance-aware service quality model, emphasizing the evaluation of service quality based on the actual customer's feelings. Martilla and James (1977) proposed an IPA model for service quality in the automotive industry, determining its importance- a satisfaction analysis. Later, Carman (1990) proposed the SERVQUALXIMPORTANCE model, pointing out that on the one hand, it is necessary to analyze the gap between customer expectations and actual perception, and on the other hand, it is also necessary to consider the impact of various factors on customer purchases.

3) Research on tourism service quality evaluation methods

In the 1990s, the tourism industry introduced a service quality assessment mechanism. The main methods are the SERVQUAL evaluation method, the SERVPERF evaluation method, the IPA analysis method, and (James, 1998) uses the IPA to analyze the expectations and perceived quality of tourists and rate tourist satisfaction. Reichel et al. (2000) used the Perceived Quality of Service model to study the quality of rural tourism services in Israel, and the results showed that there was a gap between tourist expectations and actual perceptions. Ekinci et al. (2003) and others used the SERVQUAL method to evaluate the service quality of hotels, dividing the perceived service quality of tourists into 2 elements, tangible and intangible, and the results showed that tourists attach more importance to intangible service quality than to tangible factors. 2010 also uses the traditional SERVQUAL scale to assess the quality of service in various tourist destinations in India. 2004 *et al.* compared the 4 methods of SERVQUAL, SERVPERF, weighted SERVQUAL and IPA, and found that SERVPERF is constrained by time and cost as the most direct and effective method. This is also a common method for many scholars in China to evaluate the quality of tourism services.

Review of domestic literature

Compared with foreign studies, domestic research started late, mainly including elderly tourism research and tourism service quality evaluation research.

Research on elderly tourism mainly focuses on the motivation of elderly tourists, the consumption behavior of elderly tourists, the development strategy of the elderly tourism market, and the development of elderly tourism products.

The research on the evaluation of tourism service quality mainly focuses on the evaluation perspective, evaluation system and model construction, and evaluation methods.

1) Research on the perspective of tourism service quality evaluation

In recent years, domestic scholars have conducted research on service quality evaluation from different angles. He and LI (2015) believes that the quality of tourism services, as a key factor, can significantly affect the international competitiveness of China's tourism industry. Xiao (2016) also evaluated the perception of luoyang tourism services by inbound tourists as the research object, and the results showed that there were large differences in the evaluation of luoyang tourism service quality in different source countries. Liu and Ma (2017) studied the quality of tourism services in the Qinling area from the perspective of self-driving tourists, and the results showed that tourists attach great importance to maintaining support and identification systems. Xu and (Wang & Jianqiong, 2019) from the perspective of scenic spot employees, believe that the working environment will positively affect the quality of employees' service, and the return on work will negatively affect the quality of service.

2) Research on tourism service quality evaluation system and model construction

Domestic scholars generally use the SERVQUAL model and the SERVPERF model. Zhang (2016) combined the SERVQUAL model and the HISTOQUAL model, and considered the characteristics of heritage tourism, proposed a heritage model for evaluating the service quality of heritage tourism sites. Chen and Liu (2018), in order to ensure the sustainable development of ecotourism areas, the SERVQUAL model was used to evaluate the quality of ecotourism services, believing that ecological perception and accessibility would affect the perception and evaluation of tourists. Scholars such as (Bo & Zheng, 2019) have established the TDSEQ service quality evaluation model of tourist destinations, and scholars can select the main influencing factors from the model for evaluation according to specific tourist attractions and tourist cities.

3) Research on tourism service quality evaluation methods

At present, the evaluation methods of service quality mainly include SERVQUAL method, SERVPERF method, IPA method, factor analysis method, fuzzy comprehensive evaluation method, etc., and scholars are also using these methods to evaluate the quality of tourism service. Wei (2015) analyzed the service quality of the hotel using the SERVQUAL and SERVPERF methods respectively, and obtained different rules when using the 2 evaluation methods. Wang and Gu (2017) used the factor analysis method to draw the conclusion that tourism infrastructure, landscape planning, tourism services, operation management and tourism experience affect the quality of farm service, and used the IPA method to analyze the attention and satisfaction of tourists. Zhang et al. (2019) and other scholars took overseas tourists as the research object, analyzed the perception and evaluation of the quality of tourism services in Xinjiang by using the fuzzy comprehensive evaluation method, and pointed out that Xinjiang should improve the quality of tourism services by standardizing the order of the tourism market. Chen and Zhong (2020) combined the analytic hierarchy method and the fuzzy synthesis method to propose that rural traffic conditions should be improved and rural community participation should be strengthened to improve the quality of rural tourism services.

Review of the study

From the perspective of the research content of elderly tourism, domestic and foreign literature have mentioned that due to physiological and psychological characteristics, there are significant differences in the tourism behavior of the elderly group and other age groups, and the elderly tourism market should be valued and studied as a special segment of the tourism market. Although the domestic research on elderly tourism has shown an upward trend in recent years, from the perspective of consumer behavior, market development, product development, etc., there is a relative lack of research on the quality of elderly tourism services, especially the quality of elderly tourism services.

From the perspective of the research content of tourism service quality evaluation, most domestic scholars discuss service quality from the perspective of tourists, although the academic community has been discussing the evaluation of tourism service quality, but with the elderly as the research object, there is less research on the service quality of tourism destinations based on the perspective of elderly tourists,

especially the evaluation of tourism service quality for the elderly in destinations. Moreover, China's elderly tourism started late, the management mechanism is not perfect, and there is still a lot of research space for the evaluation of the quality of elderly tourism services. This paper aims to fill this gap, starting from the special needs of elderly tourists, constructing an evaluation system for the quality of tourism services for the elderly in tourist destinations, and combining the relevant results of empirical research to provide guidance for tourist destinations to improve the quality of tourism services for the elderly.

Conceptual definition and theoretical basis

Conceptual definition

Tourism destination is the research scope of this paper, the elderly are the research objects of this paper, the tourism quality and tourism services of the elderly are the research contents of this paper, and the definition of its concept is of great significance to this study.

1) Tourist destination

Since Gunn (1988) proposed the concept of "destination area", domestic and foreign scholars have defined the concept of tourist destinations from different angles, and foreign representative believes that tourist destinations are places where people leave their places of residence to travel to appreciate the characteristics of the place, and Chinese representative. It is believed that tourist destinations are places where tourists stay and move, and refer to the organic combination of relevant conditions such as tourism resources and tourism facilities in a certain space. This paper defines the concept of tourist within a certain spatial range, based on tourist attractions that attract tourists, and supported by the provision of perfect tourism reception services, a comprehensive and coordinated development of the tourism industry is formed, providing tourists with a pleasant experience and meeting their tourism needs. According to the needs of tourists, tourist destinations can be divided into sightseeing, leisure, business and special types. In view of the preferences and particularities of the subjects studied in this paper, the tourist destinations described in this paper generally refer to sightseeing tourism destinations and leisure vacation tourism destinations suitable for the elderly.

2) The elderly

With regard to the definition of older persons, different countries have different criteria, but they are generally defined on the basis of age. In 1956, the United Nations published the book *Population Ageing and Its Socio-Economic Consequences*, which considered older persons to be over 65 years of age; The age division of the elderly in our country should take into account the basic national conditions and actual policies. The Law on the Protection of the Rights and Interests of the Elderly stipulates that the elderly refer to citizens over the age of 60. The Code for Elderly Services for Travel Agencies promulgated in September 2016 also defines the age of elderly tourists as over 60 years old. Therefore, taking into account the actual situation of China's retirement system, and in order to ensure the continuity of policies and laws, this article defines the elderly as a population aged 60 and above. The subject of this paper is elderly tourists over the age of 60 who can participate in tourism activities on their own.

3) Elderly tourism

As a way of leisure and entertainment, tourism can not only bring spiritual enjoyment to the elderly, but also increase their knowledge and continuously improve themselves in the process. Elderly tourism generally refers to the tourism activities of the elderly who leave their usual place of residence under a certain age and health condition.

4) Quality of tourism services

The quality of tourism services is an extension of the quality of service, (Levitt, 1972) believes that service quality refers to whether the service can meet a preset standard, and (Gronroos, 1982) believes that the quality of service is the actual perception of the customer before and after receiving the service. Parasuraman et al. (1985). It is believed that customers can judge the gap between the quality of expected

services and the actual quality of service. As a service industry, the quality of service directly affects the development of tourism. At present, regarding the definition of tourism service quality, 1 view is from the perspective of tourism enterprises, that tourism service quality is the sum of the capabilities and characteristics of tourism products or services provided by enterprises to meet the needs of tourists. Another point of view is from the perspective of tourists, (Zhu, 2019) pointed out that the quality of tourism services is the tourist's perception of a specific tourism service by comparing the expected services and the actual services received, because the object of study in this paper is the elderly tourist, so the definition of tourism service quality in this paper is mainly from the perspective of the elderly tourist, which is the overall perception of the series of services provided by the tourist destination by the elderly tourist in the tourism process. The special physiological, psychological and consumer behavior characteristics of the elderly group determine that the requirements of elderly tourists for the quality of tourism services have their own characteristics.

Theoretical basis

The focus of this paper is on the evaluation and improvement of tourism service quality for the elderly in destinations, so the theory of active aging, the theory of tourism service system, the theory of service quality evaluation and the theory of service innovation are taken as the theoretical basis of this paper.

1) Theory of active aging

Population aging has become a global trend, and academics and relevant work departments have put forward "active aging" after in-depth research and exploration of population aging Theory aims to improve the quality of life of the elderly through a series of perfect social security systems, and ultimately achieve the purpose of improving the quality of life of the elderly. Contrary to negative aging, active aging emphasizes that the elderly is no longer a burden and burden on society, but encourage them to remain optimistic, take the initiative to participate in social activities, ensure the health status and quality of life of the elderly, present more possibilities for the elderly, and ensure that the elderly spend their old age happily. The theory of active aging is highly consistent with elderly tourism. On the one hand, the active aging theory supports the development of elderly tourism: From the perspective of the main body and service content, the main body of active aging is the service object of elderly tourism, and the quality pursuit of active aging theory is an important service content of elderly tourism; on the other hand, tourism has also become a way for the elderly to relax and entertain and improve their lives. Using the theory of "active aging" to guide tourism services for the elderly can increase the sense of social participation of the elderly, improve the quality of life of the elderly, and achieve "old age is happy."

2) Theory of tourism service system

Tourism is a highly interconnected industry, and its comprehensiveness and openness require that tourism services must be studied from a systems perspective. The tourism service system is a complex marginal concept system formed by the combination of tourism system and service system. Tourism service system is based on the study of tourism system, domestic scholar (Wu, 1998) earlier put forward the theory of tourism system, that tourism is an open complex system, including source market system, destination system, tourism system and support system 4 systems, of which each system has the penetration of tourism services, but the proportion is different. Zhang (2020) proposed a tourism service system model from the perspective of tourism on the basis of the theory of tourism system, pointing out that the tourism service system is divided into 4 subsystems, namely the source tourism service system, the travel service system, the destination tourism service system and the support service system. Among them, the destination tourism service system is to provide tourists with basic tourism services such as eating, living, traveling, traveling, shopping, entertainment; the support service system is divided into infrastructure services and other support services, mainly the services provided by the destination for the production and living needs of residents, although these services are not directly aimed at tourists, but they are essential basic services provided by the destination for tourists, and the support service system is mainly reflected in the public service support of tourist destinations. Combined with the scope of this paper, the destination tourism service system and

the support service system are used as the basis for analyzing the elements of tourism services in the elderly destinations.

3) Service quality evaluation theory

Since the SERVQUAL model was proposed, scholars have tried to evaluate the quality of service using other criteria. Cronin and Taylor (1992) proposed the SERVPERF evaluation model, the performance-aware service quality model, which emphasizes that the service quality is measured by the customer’s actual perception rather than expectations, and SERVPERF uses the same dimensions and measures as SERVQUAL. However, only measuring the customer’s actual perception of the service reduces the measurement of customer expectations and makes the results more direct and effective. Cronin and Taylor and other scholars have conducted a comparative analysis of the SERVQUAL model and the SERVPERF model, and the results table The SERVPERF model is significantly better in terms of validity and applicability. At present, domestic and foreign scholars still use the SERVQUAL 5-dimensional model and the basic questionnaire to evaluate the service quality of various industries, but in practice, considering the convenience of the SERVPERF model, many scholars use this method to directly measure the actual perception of customers.

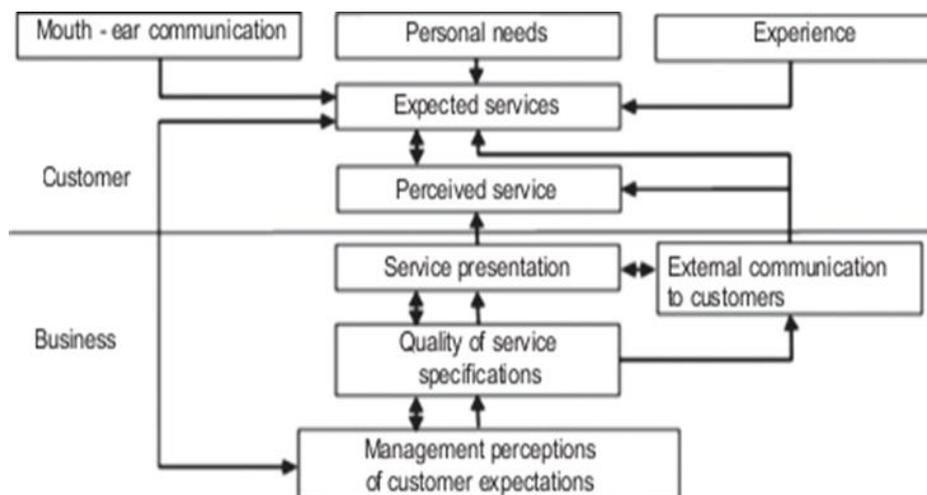


Figure 1 Conceptual model of quality of service.

Source: Parasuraman et al. (1985)

4) Service innovation theory

Service innovation is an effective way to help customers solve problems, is an idea or idea of innovation, the purpose is to create more value for customers. Tourism is a typical service industry, in the face of rapid changes in the environment, the pressure of external competition and the improvement of customer demand level, tourism enterprises must accelerate service innovation, in addition to meeting the basic needs of tourists such as food and housing, it is more important to create diversified products and provide high-quality, efficient personalized services to meet the service needs of tourists. With the advent of the era of global tourism, tourists have higher and higher requirements for the way of tourism destination services. According to the theory of service innovation, tourism services need to fully reflect humanization, all take the needs of tourism consumers as the starting point, innovate tourism service methods, improve the quality of tourism services, and provide tourists with perfect tourism services. Therefore, in the process of providing services for elderly tourists, destinations should consider the particularity of elderly tourists, and provide targeted and humanized services under the new innovative concept, which can not only meet the needs of elderly tourists, but also enable elderly tourists to obtain a satisfactory service experience, thereby improving the quality of elderly tourism services.

Study area: Xishuangbanna

Overview of Xishuangbanna tourist destinations

Xishuangbanna Dai Autonomous Prefecture is one of the 8 autonomous prefectures in Yunnan Province and the capital of Jinghong City. Xishuangbanna is located at latitude 21° 10’–22° 40 ’N, longitude 99° 55’–101° 50 ’E, tropical northern rim south of the Tropic of Cancer, an area of 19,124.5 square kilometers, bordering Pu’er City to the northeast and northwest, Laos to the southeast, myanmar to the southwest, the national border is 966.3 km long, and a river connects 6 There are 4 ports in the country.

Xishuangbanna is located on the northern edge of the tropics and has a tropical monsoon climate. Xishuangbanna Prefecture administers 1 county-level city and 2 counties, and in 2020, the ethnic minority population of Xishuangbanna Prefecture is 790,300 people, with the Dai ethnic group as the main ethnic group, and there are 13 ethnic groups living in the jurisdiction. According to China’s 7 population census, as of 00:00 on November 1, 2020, the permanent population of Xishuangbanna Dai Autonomous Prefecture is 1,301,407 people.



Figure 2 Geographical location of Xishuangbanna.

Basic information on xishuangbanna tourism

Xishuangbanna is the most well-preserved area of tropical ecosystems in China, known as the “plant kingdom”, “animal kingdom”, “biological gene bank”, and “a jade on the laurels of the plant kingdom” It is the only tropical rainforest nature reserve in China, a national ecological demonstration area, a national scenic spot, a member of the United Nations Biodiversity Conservation Circle, and a sustainable tourism observation point of the United Nations World Tourism Organization, with plant species accounting for 1/6 of the country and animal species accounting for 1/4 of the country. Xishuangbanna is The second largest natural rubber production base in China, the hometown of big leaf tea, the hometown of Pu’er tea, with 1 5A level scenic spot and 9 4A level scenic spots, Xishuangbanna is famous for its tropical rainforest natural landscape and ethnic minority customs, is one of the hot tourist cities in China, and has won the honor of one of the most internationally influential tourist destinations in China.



Figure 3 Distribution map of Xishuangbanna scenic spot.

Xishuangbanna has the advantages of developing tourism for the elderly

1) Advantages of tourism resources

Xishuangbanna is rich in natural and cultural resources. In terms of natural resources, Xishuangbanna has diverse animal and plant resources and beautiful tropical scenery, and is a rare year-round tourist city in China. In terms of human resources, Xishuangbanna is a multi-ethnic settlement with its own unique national culture, typical of ecological culture, Bayeux culture, religious culture, Pu'er tea culture, Dai medicine culture and so on. The different customs and habits of various ethnic groups make the cultural customs more colorful. Xishuangbanna's peculiar natural scenery, profound history and culture, and distinct folk customs are catering to the tourism needs and preferences of the elderly, not only allowing the elderly to appreciate the magical rainforest plants, but also allowing the elderly to experience exotic ethnic customs, and many resources can also be transformed into health tourism resources suitable for the elderly.

2) Climate and environmental advantages

Xishuangbanna is a tropical and warm region with an average annual temperature of 21 °C and no winter throughout the year, making it a winter resort in China. Xishuangbanna has a warm and comfortable climate all year round, which is suitable for the elderly to travel, condition their bodies, and live in life. Xishuangbanna is the only oasis on the Tropic of Cancer, with a statewide forest coverage rate of 78.4 %, dense vegetation, and a negative oxygen ion content of 100,000/cm³ in the air, ranking first in the "China High Negative Ion City Reputation List", with a PM 2.5 value close to 0, known as a "natural oxygen bar" [17]. The natural and superior climatic environment is a good place for the elderly to treat chronic diseases and recuperate and health care.

3) Policy advantages

In order to regulate the order of the tourism market, in recent years, the Xishuangbanna State Government has adopted a "zero tolerance" attitude, strictly rectified unreasonable "low-cost tourism", false publicity and other market chaos, and created a safe tourism environment for tourists, especially elderly tourists. The "Xishuangbanna" 14th 5-Year Plan "Tourism Industry Development Plan (2021 -

2025)” pointed out that it is necessary to vigorously develop the silver market, launch tourism products suitable for the elderly, and improve supporting services such as medical treatment and health. The “Implementation Plan for Xishuangbanna Prefecture to Create a National All-Area Tourism Demonstration Zone” pointed out that Xishuangbanna Prefecture should improve public service facilities and build a number of barrier-free facilities in major scenic spots, hotels and restaurants, tourist distribution areas, etc.

Xishuangbanna elderly tourism service quality status

By the end of 2020, Xishuangbanna had more than 1,000 tourist accommodation facilities, 29 tourist star hotels, 48 travel agencies, and 523 tourist buses. There are 38,000 direct employees in tourism and about 100,000 indirect employees, and the tourism industry system is becoming more and more perfect. The tourist reception facilities in Xishuangbanna have the ability to receive elderly tourism in terms of quality and quantity, and can meet the development of elderly tourism. However, in the process of field research, it was found that most tourism enterprises have not fully realized the huge potential of the elderly tourism market and have not paid enough attention to the elderly tourism market. It is mainly manifested in the lack of professionalism and pertinence of tourism services for the elderly, the lag in the construction of hardware service facilities for the elderly tourism, the irregularity of software services, and the lack of tourism professionals for the elderly. Tourism enterprises that receive elderly tourists treat the elderly group equally with other tourism groups, while ignoring the special physical and psychological characteristics of the elderly, which restricts the development of the elderly tourism industry in Xishuangbanna. As one of the popular tourist destinations in China, Xishuangbanna has a pleasant climate, unique natural environment and rich cultural tourism resources, which caters to the tourism preferences of most elderly people and has the advantages and conditions for the development of elderly tourism. However, as far as the current development of elderly tourism in Xishuangbanna is concerned, tourism hardware facilities and software services cannot meet the needs of elderly tourists, the attraction to elderly tourists is weak, and there is still a big gap between elderly tourism services and well-known tourist destinations such as Sanya, Xiamen and Hangzhou in China. At present, most of China’s tourism destinations are in this dilemma: They have the advantages and conditions for the development of elderly tourism, but due to the imperfect tourism services for the elderly, the quality of tourism services for the elderly is not high, and the problems of the elderly in the tourism process are frequent, affecting the satisfaction of elderly tourists with the quality of destination services and the overall image of the destination. In the face of this situation, how to optimize and enhance the quality of Xishuangbanna’s elderly tourism services is of great practical significance for promoting the development of Xishuangbanna’s elderly tourism industry and building Xishuangbanna into a well-known tourist destination for the elderly, and also provides policy suggestions for other tourist destinations in China to develop elderly tourism and improve and improve the quality of elderly tourism services.

SERVPERF model analysis

Build theoretical models

Taking the tourism service system model as the theoretical basis, taking the SERVPERF evaluation model as the guide, and combining the service quality characteristics of the elderly tourism service, the theoretical model of the tourism service quality evaluation system for the elderly in the tourism destination is constructed. In this study, the destination tourism service system is revised to “tourism reception services” provided by tourism enterprises in tourist destinations, and the “entertainment services” are modified to “leisure and entertainment services”, and “scenic tour services” are added; “infrastructure services” and “other support services” in the support service system are revised to “social public services provided by the public sector of tourism destinations.”

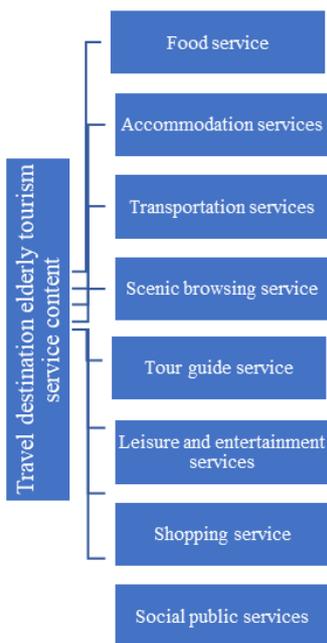


Figure 4 Components of the quality of tourism services for seniors in tourist destinations.

On this basis, according to SERVPERF proposed by (Cronin & Taylor, 1992). The 5 dimensions in the model look for what makes up each service element, namely formability, reliability, responsiveness, assurance, and empathy. As an important part of tourism services, tourism services for the elderly must have 5 service dimensions and their own uniqueness. Combined with the analysis of the service quality characteristics of elderly tourism, the dimension of “empathy” is replaced by “care”, and 2 dimensions of “safety” and “adaptability to the elderly” are added, which constitute 7 dimensions affecting the quality of elderly tourism services.



Figure 5 Tourism service quality evaluation dimensions for the elderly in tourism destinations.

Tourist destination services are characterized by comprehensiveness and complexity, on the one hand, tourism activities are comprehensive, and it is more difficult to assess tourists' expectations before receiving services and their actual perception after receiving services compared with general service industries. On the other hand, the research object of this paper is a special elderly group, the questionnaire design should be as simple as possible, easy for elderly tourists to understand and choose, while measuring service expectations and service perception is easy to cause confusion among elderly tourists, affecting the operability and authenticity of the questionnaire. Therefore, this paper adopts the SERVPERF service quality evaluation model, which only measures the actual perception of elderly tourists, and does not consider the comparison of expected service and perceived service to ensure the accuracy of the evaluation results. Therefore, this paper combines the traditional tourism service system theory with the classic SERVPERF service quality evaluation 5-dimensional model, and combines the service quality characteristics of elderly tourism, and constructs the theoretical model of the tourism service quality evaluation system for the elderly in tourist destinations as shown in **Figure 6**.

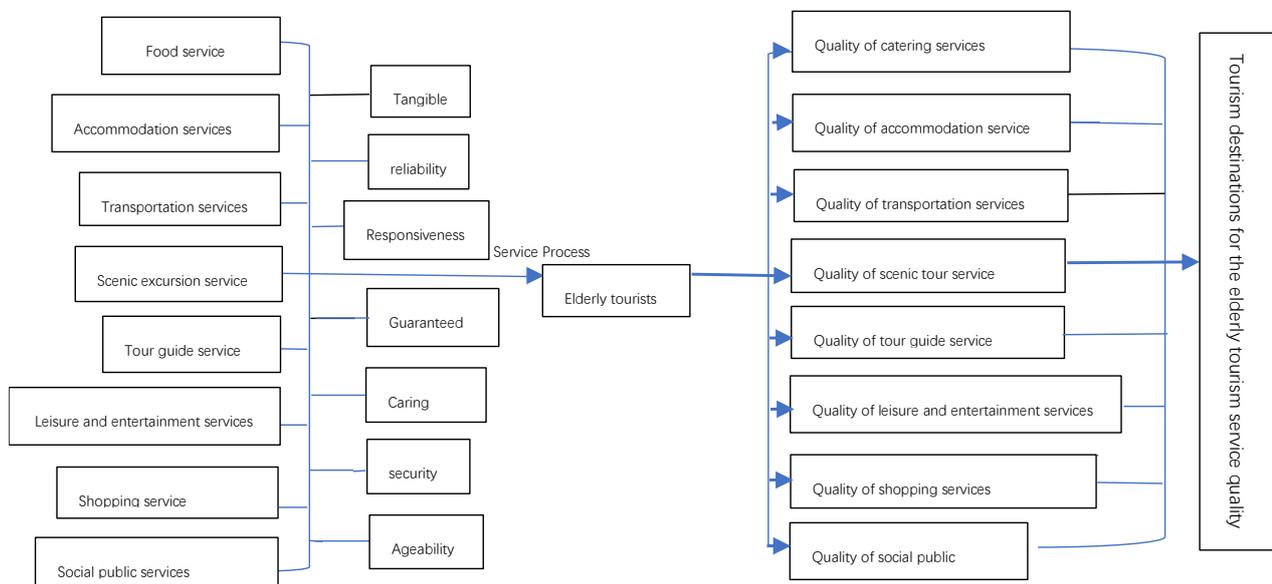


Figure 6 Theoretical model of tourism service quality evaluation system for the elderly in tourism destinations.

The meaning of the theoretical model is that the services provided by tourist destinations for elderly tourists mainly include catering services, accommodation services, transportation services, scenic tour services, tour guide services, leisure and entertainment services, shopping services and social public services, and elderly tourists can evaluate the quality of tourism services for the elderly in tourist destinations from 7 dimensions: Tangible, reliable, responsive, guaranteed, intimate, safe and suitable for the elderly. Combined with the core idea of the SERVPERF evaluation model, starting from the actual perception of elderly tourists, the quality of elderly tourism services in tourist destinations is comprehensively evaluated, which provides a basis for the improvement and improvement of the quality of elderly tourism services in tourist destinations.

Design evaluation index system

According to the theoretical model, the service quality evaluation index of the elderly tourism is constructed. Through literature combing, the existing tourism service quality evaluation indicators are summarized, and the tourism service quality evaluation of the elderly in tourism destinations is decomposed

into 8 different types of service content quality evaluation. When designing the indicators, the content of the SERVPERF scale was fully referred to, and combined with the characteristics of the quality of the elderly tourism service, the relevant industry standards in the “Travel Agency Elderly Tourism Service Specification” issued by the National Tourism Administration in 2016 were drawn. On the one hand, on the basis of the SERVPERF standard problem, the meaning of the original indicators is re-explained according to the characteristics of the elderly tourism services, on the other hand, according to the particularity of the research objects in this paper, new evaluation indicators are added, and the evaluation indicators of the quality of elderly tourism services in 54 tourist destinations are preliminarily constructed. There are 3 levels, of which “tourism service quality for the elderly in tourist destinations” is the target layer of the evaluation system; the service elements in the theoretical model: “Catering service quality”, “accommodation service quality”, “transportation service quality”, “scenic tour service quality”, “tour guide service quality”, “leisure and entertainment service quality”, “shopping service quality” The dimensions in the theoretical model: formability, reliability, responsiveness, assurance, care, safety and aging, and further refine the content of each element layer of tourism service quality evaluation of elderly tourism destinations according to these 7 attributes, and get 46 secondary indicators. In view of the strong subjectivity of the initially constructed evaluation system, there may be duplicate or omission of indicators, and the scientific and systematic aspects still need to be improved. Therefore, in order to ensure the objectivity and rationality of the evaluation system, the above indicator system should be screened. In this paper, the initial evaluation index system is sorted out and modified, and the original 54 evaluation indicators are adjusted to 45, of which 8 are first-level indicators and 37 s level indicators, forming an evaluation index system for the quality of tourism service for the elderly in tourist destinations. This is shown in **Table 1**.

Table 1 Index system for the evaluation of tourism service quality for the elderly in tourism destinations.

Target layer	Guideline layer	Indicator layer	Indicator properties
Quality of tourism services for the elderly in tourist destinations	A. quality of catering services	A1 catering environment and health.	Formability, reliability, safety
		A2 Diet quality and taste.	Tangible, reliable, age-appropriate
		A3 catering staff service attitude.	Responsive, guaranteed, caring
		A4 Personalized service of catering staff.	Caring, age-appropriate
	B. Quality of accommodation service	B1 the location and environment of the hotel	Formability, reliability, safety
		B2 the hotel facilities are complete and safe	Tangible, safe, age-appropriate
		B3 hotel staff service attitude	Responsive, guaranteed, caring
		B4 personalized service of hotel personnel.	Caring, age-appropriate
	C. Quality of transportation services.	C1 vehicle environment and safety performance.	Formability, reliability, safety
		C2 vehicle auxiliary facilities equipped.	Tangible, age-appropriate
		C3 Reasonable and soothing degree of itinerary.	Reliability, caring, ageing
		C4 driver and passenger service.	Responsive, guaranteed, carin

Target layer	Guideline layer	Indicator layer	Indicator properties
D. Quality of scenic tour service.	D1 scenic characteristics and environment.	Formability, reliability, safety	
	D2 scenic spot tour safety.	Tangible, safe, age-appropriate	
	D3 scenic infrastructure completeness.	Formability, reliability, safety	
	D4 Barrier-free facilities in scenic spots.	Tangible, age-appropriate	
	D5 tour route and rhythm.	Reliability, caring, ageing	
	D6 Scenic spot staff service.	Responsive, guaranteed, caring	
E. Quality of tour guide service	E1 Tour guide interpretation ability	Reliability, responsiveness, ageability	
	E2 Safety reminder for tour guides.	Safety, care, ageing	
	E3 the comprehensive quality of tour guides.	Reliability, assurance, care	
	E4 Guide medical emergency handling ability.	Responsiveness, safety, ageability	
	E5 personalized service of tour guides.	Caring, age-appropriate	
F. Quality of leisure and entertainment services.	F1 entertainment environment and safety.	Formability, reliability, safety	
	F2 entertainment project features and richness	Formability, reliability	
	F3 the degree of participation in the entertainment project.	Caring, age-appropriate	
	F4 Entertainment venue personnel services.	Responsive, guaranteed, caring	
G. Quality of shopping services.	G1 shopping environment	Formability, reliability, safety	
	G2 tourism product types and characteristics.	Formability, reliability	
	G3 tourism products cost-effective.	Reliability, caring, ageing	
	G4 store staff service.	Responsive, guaranteed, caring	
H. Quality of social public services.	H1 the degree of improvement of public facilities.	Tangible, reliable, age-appropriate	
	H2 Convenience of medical security services.	Responsiveness, safety, age ability	
	H3 traffic convenience and patency.	Formability, reliability	
	H4 social security environment.	Formability, reliability, safety	
	H5 friendly locals.	Guaranteed, caring, caring	
	H6 Tourist information consultation and complaint handling.	Reliability, assurance, responsiveness	

Research methodology

Based on the tourism service system model and guided by the 5 dimensions of the SERVPERF evaluation model, this chapter first constructs the theoretical model of the tourism service quality evaluation system for the elderly in the tourism destination, and on this basis integrates the characteristics of the service quality of the elderly tourism, and designs the index system for the service quality of the elderly tourism in the tourism destination; The entropy right method and the fuzzy comprehensive evaluation method are used to comprehensively evaluate the quality of xishuangbanna's elderly tourism service.

Population and simple size

According to the data of the Xishuangbanna Prefecture Culture and Tourism Bureau in March 2022, the Xishuangbanna Scenic Area received a total of 558 elderly tourists in March 2022; the Xishuangbanna Scenic Area received 558 elderly tourists in March for the survey as a whole, by using it Yamane (1970) formula determines the sample size. The formula for calculating the sample size is modified as follows;

$$= \frac{N}{1+N \times e^2} \quad n = \frac{558}{1+558 \times 0.05^2} = 233$$

where, n = sample size
 N = population size (558)
 e = precision or desired margin of error (5 %)

Data collection, sources and methods

Questionnaires

This paper studies the quality of tourism services for the elderly, and the subjective feelings of elderly tourists are the ultimate indicators for measuring the quality of tourism services for the elderly in tourist destinations, and also the direct content of measuring the service level of elderly tourism in tourist destinations. Therefore, based on the subjective perspective of elderly tourists, this paper measures the service level of elderly tourism in destinations. The questionnaire design adopts the principle of simplicity and understandability, including 2 parts: The first part is the Xishuangbanna Elderly Tourism Service Quality Survey, which mainly includes the evaluation of the quality of elderly tourism services. The second part is the basic information of elderly tourists, including the gender, age, pre-retirement occupation, education level, monthly income, physical health and so on of the elderly tourists. In this paper, the Rickett 5-level scale is used for the measurement of each subject, and 1 - 5 represent "very dissatisfied", "dissatisfied", "average", "satisfied" and "very satisfied."

Data analysis

In this paper, descriptive statistics are first used to analyze the demographic characteristics of the respondents, and then, the entropy right method is used to determine the weight of each evaluation index, and a fuzzy comprehensive evaluation model for the quality of tourism service for the elderly in tourist destinations is established, and the model is used to comprehensively evaluate the quality of elderly tourism services and obtain the service level of elderly tourism in tourist destinations.

Determine metric weights

In this paper, the entropy weight method is used to determine the index weight, and according to the degree of variation of each index, the weight of each index is calculated by using information entropy, and then the entropy weight is used to correct the result. It can determine the weight according to the relationship between the original data, does not rely on subjective judgment, makes the evaluation results more objective, and avoids the risk of data lack caused by principal component analysis and factor analysis.

Fuzzy comprehensive evaluation method

The essence of the service quality evaluation of elderly tourism is to evaluate the service quality from the perspective of the perception of elderly tourists, tourist perception is a subjective feeling, and different tourists' perception of the same service quality is different, with strong subjectivity and ambiguity. This method can measure the fuzzy phenomenon, obtain objective and scientific evaluation results by quantifying various factors, and overcome the shortcomings of subjective evaluation. Therefore, this paper adopts the fuzzy comprehensive evaluation method to establish a comprehensive evaluation model for the quality of elderly tourism services in tourist destinations, and measures the service level of elderly tourism in tourist destinations.

- 1) Establish a fuzzy evaluation factor set: Set up a target layer, a criterion layer, and an indicator layer. According to the 3-level evaluation indicators, the evaluation factor set is established separately.
- 2) Determine the comment set: The comment set is a collection that reflects the evaluation results. Let the comment set be $V = (V1 - V5)$, where: $V1 =$ very satisfied, $V2 =$ satisfied, $V3 =$ general, $V4 =$ unsatisfied, $V5 =$ very dissatisfied. This article will divide these 5 evaluation levels into a percentage system, that is, "very satisfied" = "80 - 100", "satisfied" = "60 - 80", "general" = "40 - 60", "dissatisfied" = "20 - 40", "very dissatisfied" = "0 - 20", and take the median quantitative comment set of each interval segment, then $V = (90, 70, 50, 30, 10)$, the higher the score, the higher the evaluation.
- 3) Determine the weight of the indicator: In order to ensure the accuracy of the evaluation results, different weights are given to each factor and a weight set is established.
- 4) Establish a fuzzy evaluation matrix and calculate the comprehensive evaluation value: First calculate the fuzzy evaluation value of each indicator set, and then evaluate each criterion set, and finally obtain the comprehensive evaluation value. According to the comprehensive score of the service quality of the elderly tourism service of the tourist destination, the service level of the elderly tourism of the tourism destination can be effectively judged.

Outcome

Taking Xishuangbanna as an example, this part comprehensively evaluates the quality of elderly tourism services in Xishuangbanna, and analyzes and calculates the service level of elderly tourism in tourist destinations. A total of 300 questionnaires were distributed in this survey, and 233 valid questionnaires were recovered.

- 1) Statistical descriptive analysis of 233 xishuangbanna elderly tourism service quality questionnaires, the main contents of which include: Gender, age, pre-retirement occupation, education level, monthly income, and physical health status of elderly tourists.

Table 2 Analysis table of basic characteristics of elderly tourists.

Basic characteristics		Number	Percentage
gender	man	126	54.1 %
	woman	107	45.9 %
age	60 - 69 years old	171	73.4 %
	70 - 79 years old	53	22.7 %
	Over 80 years old	9	3.9 %
Pre-retirement occupation	public servant	42	18.0 %
	worker	51	21.9 %
	Teachers/healthcare professionals	29	12.4 %
	Business executives	33	14.2 %
	farmer	19	8.2 %
	Self-employed	37	15.9 %
	other	22	9.4 %

Educational attainment	Elementary school and below	18	7.70 %
	junior high school	59	25.30 %
	High school or secondary school	86	36.90 %
	College or undergraduate degree or above	70	30.00 %
Monthly income	Less than 2,000 yuan	11	4.70 %
	2,000 - 3,000 yuan	18	7.70 %
	3,000 - 4,000 yuan	72	30.90 %
	4,000 - 5,000 yuan	78	33.50 %
	More than 5,000 yuan	54	23.20 %
Physical health	Very healthy	58	24.90 %
	healthy	148	63.50 %
	So so	27	11.60 %
	Not so good	0	0 %
	Very bad	0	0 %

In terms of gender, among the 233 elderly tourists surveyed, 126 were males, accounting for 54.1 %, and 107 were females, accounting for 45.9 %, and the proportion of men and women was generally balanced; in terms of age structure, the age group of elderly tourists was mainly concentrated 60 - 69 years old, accounting for 73.4 %, 70 - 79 years old elderly tourists accounted for 22.7 %, 80 years old and older people only 9 people, accounting for 3.9 %, indicating that the main group of current elderly tourism is the young elderly, most of them are healthy, all aspects are relatively independent, middle and elderly people generally travel by family members From the perspective of pre-retirement occupations, the elderly tourists surveyed came from different industries, with the largest number of enterprise workers accounting for 21.9 %, and the other high proportions were civil servants (18.0 %), self-employed (15.9 %), enterprise managers (14.2 %), teachers/medical staff (12.4 %), occupation is relatively stable and has a certain economic strength; in terms of educational level, the education level of elderly tourists is mainly concentrated in high school or secondary school and college or college or university degree, accounting for 36.9 and 30.0 %, respectively, followed by junior high school education, accounting for 25.3 %. Indicate that most elderly tourists have a higher level of education; Monthly income, 87.6 % of the elderly tourists monthly income of more than 3,000 yuan, of which 3,000 - 4,000 yuan and 4,000 - 5,000 yuan accounted for a relatively high, respectively, 30.9 and 33.5 %, the monthly income in More than 5,000 yuan accounted for 23.2 %, it can be seen that the economic strength of elderly tourists is gradually improving; from the perspective of physical health, 63.5 % of elderly tourists are in good physical condition, and 24.9 % of elderly tourists with very good physical condition are mainly concentrated in the young age group of 60 - 69 years old 11.6 % of the elderly tourists said that their physical condition was average, and this part of the elderly tourists were mainly middle-aged and elderly. It can be seen from the basic characteristics of the sample that the elderly tourists who come to Xishuangbanna for tourism have the characteristics of high education, high income, good physical condition and young age.

2) Conduct comprehensive evaluation and analysis of the quality of tourism services for the elderly. This part is based on the questionnaire survey, using the entropy law to determine the weight of each evaluation index system, establish a fuzzy comprehensive evaluation model for the quality of tourism services for the elderly in tourist destinations, calculate the comprehensive evaluation results of the quality of elderly tourism services in Xishuangbanna, and find out the problems existing in the process of serving elderly tourists in destinations.

Determine the weights

According to the calculation steps of the entropy law, the entropy and entropy rights obtained from the 34 evaluation indicators of the quality of tourism services for the elderly in Xishuangbanna are shown in **Table 3**.

Table 3 Weights of Xishuangbanna elderly tourism service quality evaluation index system.

Target layer	Guideline layer	Indicator layer	entropy	Entropy rights
(1.00)		A1 catering environment and health.	0.990	0.019
	A. quality of catering services (0.144)	A2 Diet quality and taste.	0.960	0.073
		A3 catering staff service attitude.	0.990	0.018
		A4 Personalized service of catering staff.	0.981	0.034
		B1 the location and environment of the hotel	0.991	0.016
	B. Quality of accommodation service (0.143)	B2 the hotel facilities are complete and safe.	0.977	0.041
		B3 hotel staff service attitude	0.992	0.015
		B4 personalized service of hotel personnel.	0.961	0.071
		C1 vehicle environment and safety performance.	0.990	0.019
	C. Quality of transportation services. (0.138)	C2 vehicle auxiliary facilities equipped.	0.970	0.053
		C3 Reasonable and soothing degree of itinerary.	0.986	0.025
		C4 driver and passenger service.	0.978	0.041
		D1 scenic characteristics and environment.	0.988	0.022
		D2 scenic spot tour safety.	0.990	0.018
	D. Quality of scenic tour service. (0.132)	D3 scenic infrastructure completeness.	0.982	0.032
		D4 Barrier-free facilities in scenic spots.	0.986	0.025
		D5 tour route and rhythm.	0.989	0.019
		D6 Scenic spot staff service.	0.991	0.016
		E1 Tour guide interpretation ability	0.985	0.028
	E. Quality of tour guide service (0.137)	E2 Safety reminder for tour guides.	0.990	0.019
		E3 the comprehensive quality of tour guides.	0.983	0.031
		E4 Guide medical emergency handling ability.	0.990	0.018
		E5 personalized service of tour guides.	0.977	0.041
		F1 entertainment environment and safety.	0.978	0.039
	F. Quality of leisure and entertainment services. (0.105)	F2 entertainment project features and richness	0.986	0.024
		F3 the degree of participation in the entertainment project.	0.987	0.023

Target layer	Guideline layer	Indicator layer	entropy	Entropy rights
		F4 entertainment venue personnel services.	0.989	0.019
		G1 shopping environment	0.981	0.034
	G. Quality of shopping services. (0.149)	G2 tourism product types and characteristics.	0.992	0.014
		G3 tourism products cost-effective.	0.961	0.070
		G4 store staff service.	0.983	0.031
	H. Quality of social public services. (0.052)	H1 the degree of improvement of public facilities.	0.986	0.024
		H2 social security environment.	0.994	0.010
		H3 friendly locals.	0.990	0.018

The weights of the 34 s level evaluation indicators shown in Table 3 can be calculated to obtain the weights of 8 first-level indicators, namely “catering service quality”, “accommodation service quality”, “transportation service quality”, and “transportation service quality” “scenic tour service quality”, “tour guide service quality”, “leisure and entertainment service quality”, “shopping service quality”, “social public service quality” The weights are 0.144, 0.143, 0.138, 0.132, 0.137, 0.105, 0.149, and 0.052, respectively.

Establish a fuzzy evaluation matrix

There are 2 sets of indicators in the tourism destination elderly tourism service quality evaluation system, so it is necessary to evaluate the criteria layer indicators and the target layer indicators separately. First, the first-level fuzzy comprehensive evaluation obtains the evaluation result B_i ($I = 1 - 8$), which constitutes the first-level fuzzy comprehensive evaluation matrix R ; followed by the second-level fuzzy comprehensive evaluation, which obtains the fuzzy comprehensive evaluation matrix B of the total target layer.

Consists $B_1, B_2, B_3, B_4, B_5, B_6, B_7, B_8$ of a first-level fuzzy comprehensive evaluation matrix R , that is, a fuzzy relationship matrix of the target layer “tourism destination elderly tourism service quality”, then;

$$R = (B_1, B_2, B_3, B_4, B_5, B_6, B_7, B_8)^T$$

$$= \begin{pmatrix} 0.250 & 0.458 & 0.208 & 0.084 & 0 \\ 0.162 & 0.380 & 0.317 & 0.127 & 0.014 \\ 0.107 & 0.393 & 0.410 & 0.057 & 0.033 \\ 0.227 & 0.477 & 0.235 & 0.053 & 0.008 \\ 0.184 & 0.463 & 0.302 & 0.051 & 0 \\ 0.400 & 0.476 & 0.114 & 0.010 & 0 \\ 0.161 & 0.436 & 0.329 & 0.074 & 0 \\ 0.392 & 0.431 & 0.118 & 0.059 & 0 \end{pmatrix}$$

Through the first-level fuzzy comprehensive evaluation, the evaluation level distribution of the target layer B can be calculated.

$$\begin{aligned}
 B &= W \circ R \\
 &= \begin{pmatrix} 0.144 \\ 0.143 \\ 0.138 \\ 0.132 \\ 0.137 \\ 0.105 \\ 0.149 \\ 0.052 \end{pmatrix}^T \circ \begin{pmatrix} 0.250 & 0.458 & 0.208 & 0.084 & 0 \\ 0.162 & 0.380 & 0.317 & 0.127 & 0.014 \\ 0.107 & 0.393 & 0.410 & 0.057 & 0.033 \\ 0.227 & 0.477 & 0.235 & 0.053 & 0.008 \\ 0.184 & 0.463 & 0.302 & 0.051 & 0 \\ 0.400 & 0.476 & 0.114 & 0.010 & 0 \\ 0.161 & 0.436 & 0.329 & 0.074 & 0 \\ 0.392 & 0.431 & 0.118 & 0.059 & 0 \end{pmatrix} \\
 &= (0.216 \quad 0.438 \quad 0.271 \quad 0.067 \quad 0.008)
 \end{aligned}$$

Analysis of fuzzy comprehensive evaluation results

This part calculates the comprehensive evaluation results of Xishuangbanna elderly tourism service quality according to the fuzzy comprehensive evaluation model, and according to the assignment of each evaluation level, the final evaluation result C of “Xishuangbanna Elderly Tourism Service Quality” can be calculated as;

$$C = B \circ V^T = (0.216 \quad 0.438 \quad 0.271 \quad 0.067 \quad 0.008) \circ \begin{pmatrix} 90 \\ 70 \\ 50 \\ 30 \\ 10 \end{pmatrix} = 65.74$$

65.74 between 60 and 80, according to the review set belongs to “satisfaction”, but the score is lower than 70 points, indicating that the quality of elderly tourism services in Xishuangbanna as a whole is at a lower middle level in range.

Among the 8 constituent elements that affect the quality of elderly tourism services in Xishuangbanna, elderly tourists have the highest evaluation of “leisure and entertainment service quality” in tourism services, and the second is “social public service quality”, both of which have scores of more than 70 points, which are in a high degree of satisfaction, and these 2 services should continue to be maintained in the future. In contrast, “catering service quality”, “accommodation service quality”, “scenic tour service quality”, “tour guide service quality”, “shopping service quality”/b114 > The service quality evaluation score of these 5 criterion layer elements is between 60 - 70 points, and the results all reach the “satisfaction” level, but are at the lower middle level of the “satisfaction” range, and the indicators of low satisfaction and high dissatisfaction should be improved. The “tourism traffic service quality” belongs to the “general” level of comprehensive evaluation of service quality, and should be used as the focus of improving and improving the quality of tourism service for the elderly in Xishuangbanna in the future.

Conclusions and discussions

Through the study of this paper, the following conclusions are mainly drawn:

- 1) This paper analyzes the development status of the quality of tourism services for the elderly in tourist destinations, and concludes that the service quality characteristics of safety, comprehensiveness, adaptability and care should be considered when providing services to elderly tourists in tourist destinations.
- 2) Based on the tourism service system model and guided by the 5 dimensions of the SERVPERF evaluation model, this paper first constructs the theoretical model of the tourism destination elderly tourism service quality evaluation system from 3 aspects: Policy basis, literature basis and

theoretical basis, and on this basis, the characteristics of the elderly tourism service quality are included, and the tourism service quality evaluation index system of the tourism destination is designed.

3) This paper takes Xishuangbanna as a case to conduct empirical research, and uses the entropy right method and the fuzzy comprehensive evaluation method to comprehensively evaluate the quality of elderly tourism services in Xishuangbanna, and the result score is 65.74, the score is not high, and it is located at a slightly lower level between 60 - 80 points corresponding to "satisfaction", and the overall service quality level is in the category of "basic satisfaction."

4) At present, the tourism service for the elderly in tourist destinations has reached a certain level, but the perceived satisfaction of elderly tourists with the quality of tourism services for the elderly in tourist destinations is not high, mainly due to the lack of construction of ageing facilities in tourist destinations, insufficient provision of ageing tourism services, lack of attention to the safety of elderly tourism, and irregularities in the elderly tourism market, which should be improved and improved for the existing service quality problems.

Suggestions for improving the quality of tourism services for the elderly in tourist destinations

Through the previous evaluation and research on the quality of tourism services for the elderly in tourist destinations, it can be seen that in the process of population aging, the current tourism services for the elderly in tourist destinations have reached a certain level, but it is worth noting that the overall quality of tourism services for the elderly is not high, and it is still necessary to propose improvement measures for the future development of tourism destinations for the future development of tourism services for the elderly in response to the problems existing therein. Therefore, from the perspective of development, this paper summarizes and draws on the successful experience of developed countries in developing elderly tourism, and then further puts forward policy suggestions for improving the overall service quality of elderly tourism in tourist destinations.

1) Standardize market order to protect the rights and interests of tourism for the elderly

On the basis of implementing the Tourism Law, the Law on the Protection of the Rights and Interests of the Elderly, the Regulations on The Tourism Services for the Elderly of Travel Agencies, etc., each tourist destination should formulate the corresponding "Tourism Service Specifications for the Elderly", rectify the order of the tourism market for the elderly, and optimize the development environment of tourism for the elderly. The government and tourism enterprises should jointly set up supervisory bodies to increase the rectification and regulation of the elderly tourism market in tourist destinations, severely punish acts that infringe on the rights and interests of elderly tourists, actively deal with complaints about elderly tourists, and safeguard the legitimate rights and interests of elderly tourists. At the same time, it is necessary to strengthen the publicity and guidance of the "silver-haired people" in the tourism rights protection, improve the awareness and ability of elderly tourists to safeguard their rights in the process of tourism, inform the elderly tourists of the hotline for the protection of the rights of tourist destinations, and call on them to actively complain to the tourism department if they encounter unauthorized changes in itinerary and compulsory shopping, and have the courage to safeguard their rights, so as to standardize the business behavior of tourism enterprises, enhance and improve the tourism environment of tourist destinations in a targeted manner, strengthen social supervision, and ensure the standardized development of the elderly tourism market.

2) Comprehensively improve the operation and reception level of travel agencies

Investigate and deal with illegal business operations. Travel agencies should seriously deal with the phenomenon of travel agencies taking advantage of the characteristics of the elderly to pursue low prices to publish false advertisements and change tourism routes without authorization. Improve the internal management system, so that there is no "black society" in tourism operations. At the same time, the government departments of tourist destinations should also strengthen the rectification of the tour guide team that receives elderly tourists, do a good job in scoring and evaluating the tour guide personnel, timely clean up and punish unqualified tour guide personnel, and raise the threshold of the tour guide team serving

the elderly tourists through strict market supervision. In addition, it is necessary to comprehensively improve the 5 major service levels of food, accommodation, travel, travel and purchase in the tourism destination elderly tourism market, focus on solving the outstanding problems of the current tour guide personnel uniting with tourism enterprises in disguise, mandatory shopping for the elderly and inflated prices of tourism commodities, and purifying the elderly tourism market environment.

3) Strengthen safety supervision and guarantee elderly tourism

Tourist destinations should further improve the safety of tourist transportation facilities and equipment, the safety of catering and accommodation places, the safety of scenic spots and the safety of social public security, including the construction of basic security service facilities, such as emergency passages and medical centers. At the same time, the relevant departments of tourism destinations should also establish a special elderly tourism safety rescue center, improve the construction of the medical care service system and emergency rescue guarantee system with tourism enterprises as the mainstay, hospitals, fire departments and other multi-subject participation, and when the elderly group has an accident in the tourism process, it can be rescued and sent to the hospital in time.

Tourist destinations should strengthen the supervision and management of tourism enterprises for the safety and security of the elderly tour groups, such as the provisions of tourism enterprises to serve the elderly tourists of the staff of tourism safety awareness training, and tour guides to have a certain knowledge of mental health care for the elderly and basic medical knowledge, in the whole process of tourism to fulfill the responsibility and obligation of safety tips, for a large number of people and special elderly tour groups should be equipped with the corresponding group doctors, etc., to provide safety and security for the elderly to travel, Maintain the smooth development of the elderly tourism market in tourist destinations.

4) Give policy support to elderly tourism

The competent government departments of tourist destinations should attach importance to the tourism market for the elderly, increase the supervision of tourist attractions, and formulate various measures to benefit the elderly tourism. For example, let the elderly tourists enjoy free scenic spot tickets, free travel transportation, etc., so that the elderly group can get more policy preferences in tourism, and create more convenient conditions for the development of elderly tourism in tourist destinations.

The government of the tourist destination should guide the tourism enterprises to form a service system with the characteristics of the elderly tourism, and this service system should be standardized and professionalized to guide the development of the elderly tourism. By absorbing and learning from the mature experience of the development of elderly tourism services in developed countries, encouraging destination tourism enterprises to actively carry out elderly tourism, and adopting operational support and financial subsidies for enterprises that receive elderly tourism, so as to solve the worries of tourism enterprises in the process of carrying out elderly tourism, so that tourism enterprises can devote themselves to the construction of elderly tourism with a more positive attitude, and promote the cultivation and healthy sustainable development of the elderly tourism market in tourist destinations.

5) Build facilities suitable for the elderly to support tourism for the elderly

Increase investment and supervision of "age-appropriate" tourism facilities. On the basis of the transformation and upgrading of age-appropriate tourism facilities, tourist destinations should invest funds to build a number of "age-appropriate" tourism service facilities according to the particularity of the elderly, especially the detailed service facilities, reflect the care and care for the elderly in detail, and regularly supervise and manage these ageing facilities, not only to ensure that the facilities built can truly meet the needs of elderly tourists, but also to check the quality to ensure the comfort and safety of elderly tourists in the tourism process. Thus facilitating the travel of the elderly.

Comprehensively improve the catering and accommodation facilities of tourist destinations, hotels should consider floors, toilets and other facilities to be anti-slip, anti-bump, equipped with corresponding toilet handrails, ground anti-slip mats, emergency call buttons; further improve the convenience and safety performance of tourist destination transportation facilities, tourist vehicles should remain spacious and

comfortable, and equipped with a certain number of crutches and wheelchairs and other auxiliary facilities; focus on improving tourist destination scenic spots, in the scenic spots with more elderly tourists to increase the elderly tourist reception center, provide wheelchairs, crutches, Free rental of special audio-visual equipment, construction of barrier-free toilets, special passages for the elderly, equipped with special sightseeing vehicles for the elderly, etc., so that elderly tourists can enjoy barrier-free tourism in the true sense of tourist destinations.

6) Train professionals to serve the elderly

Tourist destinations should strengthen the construction and training of tour guides serving elderly tourists and improve the level of tourism services for the elderly. When cultivating elderly tourism service personnel, tourism enterprises should regularly conduct systematic training for young tour guides engaged in elderly tourism, such as common sense of elderly care and basic medical care knowledge, so that they can fully understand the physiological characteristics and psychological demands of the elderly, and constantly cultivate their patience and love, improve their self-cultivation and professional quality of serving the elderly, give humane care to the elderly tourism groups, and make the elderly tourists feel the family atmosphere of being respected and cared for.

In the choice of professional elderly tourism service personnel, not only to pay attention to strengthening the training of young tour guides, but also to learn from the experience of developed countries, focus on recruiting and cultivating a group of middle-aged and elderly tour guides, they have a better understanding of the cultural history of the destination, the experience is more abundant, than the young tour guides can empathize with the physiological and psychological characteristics of the elderly, whether it is explanation or service are more close to the demands of elderly tourists, in the tourism process is also better at discovering the needs of elderly tourists, and can provide meticulous care and help in a timely manner.

Tourist destinations should strengthen social concern, establish service centers for the elderly, mobilize the strength of all aspects of society to care for and participate in tourism for the elderly, cultivate professional tourism service organizations for the elderly, build a trend of respect, care and help the elderly in tourist destinations and even the whole society, create an atmosphere of “active aging”, and enhance the awareness and quality of service for the elderly in tourist destinations. In the elderly tourism activities, so that service personnel can treat the elderly warmly, respect and help the elderly, will rise to the height of overall social development for the construction of the service awareness of the elderly, create a good public opinion atmosphere for continuously optimizing the market environment for the elderly tourism, improve the service level of the elderly, and establish a good image of serving the elderly in tourist destinations.

Limitations of the study

1) Elderly tourism started late in China, there are not many references on elderly tourism services, due to personal ability and lack of experience, the qualitative research on the development status of tourism service quality for the elderly in tourist destinations is not thorough and in-depth enough, and it needs to be further explored and studied.

2) Data collection has certain limitations, due to the difficulty of the questionnaire survey of elderly tourists, this article in the process of research for some elderly tourists who cannot fill in the questionnaire independently need to help them complete the survey, while the elderly tourists do not understand the indicators for a detailed explanation, the particularity of elderly tourists increases the difficulty of the survey process, resulting in the sample capacity is not large enough.

3) Due to time and financial constraints, this paper only selected Xishuangbanna for empirical evidence in the selection of samples, and did not compare with other types of tourist destinations, hoping to conduct more in-depth research in the future to make the evaluation results more objective.

Research recommendations

1) In the selection of the research object area, it is necessary to expand the regional scope of the research object, not only pay attention to the survey of domestic elderly tourists, but also pay attention to the questionnaire distribution of foreign elderly tourists, and conduct a comprehensive evaluation of the service level of elderly tourism in tourist destinations.

2) In the design of the research index system, the index evaluation system constructed in this paper only includes the traditional tourism elements, and does not involve the new elements included in the future of the elderly tourism service, and in the future, new indicators can be added from the actual development of the elderly tourism service to enrich the indicator system.

3) In the choice of research methods, this paper mainly adopts the fuzzy comprehensive evaluation method of entropy weight, and can try to analyze it with a better method in the future.

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