

# Exploration on the Construction and Implementation Path of Tourism E-commerce Ecosystem under the Background of Rural Revitalization

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**Abstract:** At present, with the rapid development of rural tourism in China and the popularization and application of internet technology in rural areas, e-commerce has been widely used in rural tourism in China, but it has also brought more challenges and development opportunities. Business ecosystem theory can better guide the cluster development of e-commerce industry. Therefore, under the background of promoting rural revitalization in an all-round way, it is of great theoretical and application value to explore the construction mechanism and implementation path of tourism e-commerce ecosystem. Based on the study of tourism value chain, this paper analyzes the application of e-commerce in tourist attractions from the perspective of e-commerce ecosystem, gives the composition, evolution and coordination mechanism of tourism e-commerce ecosystem, and finally puts forward the corresponding implementation path.

## 1. Introduction

With its powerful hematopoietic function and fusion function, rural tourism plays an important role in promoting agricultural quality and efficiency, increasing farmers' income, promoting rural prosperity and stability, and accelerating urban-rural integration development [1]. At present, with the rapid development of rural tourism in China and the popularization and application of internet technology in rural areas, e-commerce has been widely used in rural tourism in China, but it has also brought more challenges and development opportunities. Under the background of rural revitalization, the development of e-commerce is the top priority. The development of e-commerce has a direct impact on the development of new consumer industries. As the creator of tourism products and services, tourist attractions are the upstream links of the tourism value chain. In the competition and cooperation with other links of the value chain, we must first realize the integration of resources within tourist attractions. Business ecosystem theory can better guide the cluster development of e-commerce industry [2-3]. Therefore, under the background of promoting rural revitalization in an all-round way, it is of great theoretical and application value to explore the construction mechanism and implementation path of tourism e-commerce ecosystem.

## 2. Key factors affecting the implementation of tourism e-commerce under the background of rural revitalization

In today's society, people put forward higher requirements for the efficiency and accuracy of e-commerce technology. The development of e-commerce needs funds, especially in the early stage of development, which requires a lot of investment. Promoting e-commerce is a long-term process, which requires the continuous efforts of all relevant departments and sufficient capital investment. If we want to develop and popularize it better, we must have enough funds. Therefore, the government's special funds have played a decisive role in the development of e-commerce.

Tourism is a comprehensive industry, with a long industrial chain and intersection with many industries. As a branch of tourism, rural tourism also needs the support of many industries and industries [4]. At the same time, there are some differences between the attributes of rural tourism resources and urban resources. Urban resources are divided into state-owned resources and private resources, and the boundaries are clear. Rural tourism resources belong to multiple property rights

such as state-owned and collective ownership and private ownership. From the essential definition of mechanism, the so-called mechanism is to realize a specific function, the internal working mode of each element in a certain system structure, and the operating rules and principles of the mutual connection and interaction of each element under certain environmental conditions.

Experience, as another important feature of rural tourism, is mainly composed of tourists and community participants, which involves two important quality evaluation indicators: customer satisfaction and resident satisfaction. Therefore, the high-quality development of rural tourism should take into account the needs of tourists and the demands of community residents, as well as economic, ecological and social benefits. This paper holds that the high-quality development of rural tourism mainly comes from three levels [5-6]:

1) Micro-level, that is, the resultant force formed by various stakeholders that constitute the development of rural tourism;

2) At the meso level, it refers to the synergy of industrial efficiency in optimizing the allocation of rural tourism resources;

3) At the macro level, different policies and institutional arrangements encourage, supervise and coordinate the high-quality development of rural tourism.

### **3. Construction of tourism e-commerce ecosystem**

#### **3.1. Logistics ecosystem theory**

The ecosystem includes the whole system that becomes the whole synthesis of the physical factors of the environment, and forms a natural system with the special environment [7]. Ecosystems can be divided into two parts, namely, complex species and their living environment. On this basis, some scholars believe that ecosystems provide services for social systems, including movable substances, energy and social system information suitable for people [8]. Relying on related theories such as ecosystem, industrial ecosystem and business ecosystem, e-commerce ecosystem appears. Some viewpoints simply regard the e-commerce ecosystem as a business ecosystem under the Internet environment [9].

In the traditional tourism value chain, tourism enterprises at different levels complete the process of tourism consumption through division of labor and cooperation, and realize the value-added of tourism products. Logistics ecosystem is an ecosystem composed of various subjects involved in logistics activities and social environment. Logistics ecosystem is also similar to natural ecosystem. In order to maintain its own stability, it is necessary for all species to participate in logistics activities, develop and revise constantly, and all species are interdependent and cooperative, so as to maintain the stable development of logistics ecosystem.

#### **3.2. Stratification of tourism e-commerce ecosystem**

The tourism e-commerce ecosystem is not a simple closed system, but a very open system, which needs to keep close contact with the outside world at all times. The internal subjects of the whole system should cooperate for a long time and exchange all kinds of information, materials and energy with the outside of the system, so as to ensure the ecological balance and have lasting vitality. Because of the variety of transactions on the platform, the interaction between the main bodies is frequent, resulting in the diversity and diversity of the platform system. However, the complexity will not lead to the collapse of the ecosystem, and even the ecosystem can ensure balance and maintain stability. The users of the mobile tourism e-commerce platform include users, tour operators and managers, etc. They actively promote the management, establish a database, and formulate different publicity schemes and user experiences for different users.

According to the hierarchy theory of business ecosystem, combined with the specific situation of tourism e-commerce ecosystem, its ecosystem can be divided into five levels (as shown in Figure 1): core layer, support layer, derivative layer, environment layer and competition layer.

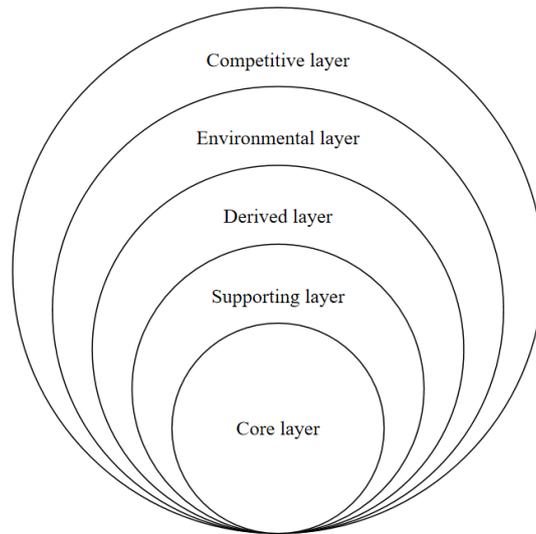


Figure 1 Hierarchical structure of tourism e-commerce ecosystem

The core layer is the operating core of the whole ecosystem, and it is also the foundation of the whole ecosystem. The support layer is built on the basis of the core layer, which is the guarantee for the healthy and normal operation of the whole ecosystem, and also the support for the core layer to finally realize the transaction. Derivative layer is a complex layer, including many biological and abiotic components. The environmental layer mainly refers to the fact that each biological component of the ecosystem will choose to actively adapt to the environment for better development. The competition layer mainly refers to the competition between various agent tourism e-commerce ecosystems and other ecosystems.

### 3.3. System construction

The formation of tourism e-commerce ecosystem is to realize the horizontal integration of e-commerce tourism value chain by integrating resources around market demand in scenic spots. The formation of e-commerce ecosystem is an evolutionary process from germination to development to maturity. The structure of tourism e-commerce ecosystem is shown in Figure 2:

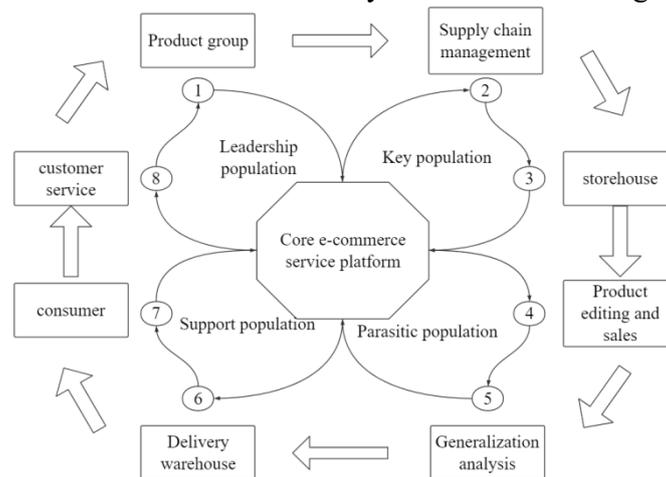


Figure 2 Structure of tourism e-commerce ecosystem

During the construction and implementation of tourism e-commerce ecosystem, we should fully integrate rural natural ecology, social culture and other resources, provide a digital and intelligent guarantee mechanism for protection and development with the construction of rural tourism e-commerce ecosystem, and promote the reform and upgrading of tourism industry development mode; With the protection and development of resources, it will provide global and sustainable vitality for the rural tourism e-commerce ecosystem, establish a green development mode of rural cultural tourism integration, and promote the optimization and upgrading of rural tourism industrial

structure.

The development achievements of the construction and implementation of tourism e-commerce ecosystem should ensure the acquisition and sharing of farmers, promote the common prosperity of farmers, stimulate and attract the initiative and enthusiasm of local farmers and foreign talents to participate in rural tourism development, and then realize the revitalization of talents. The role, position and function in the ecosystem are different. A good ecosystem is the continuous optimization of the relationship between different species, thus promoting the development of the whole ecosystem in the direction of harmonious symbiosis. Small and medium-sized tourism enterprises, as the key group of business ecosystem, can only form an e-commerce ecosystem in tourist attractions by cooperating with superior enterprises in business, turning competition into alliance and pursuing a win-win development model.

## **4. Implementation path**

### **4.1. Improve rural e-commerce infrastructure construction**

First of all, increase the local government's capital investment in rural areas, strengthen the construction of network telecommunications equipment in rural and remote areas with imperfect network communication, erect cables and lay optical fibers between rural areas and towns, realize the smooth network between urban and rural areas, and create a rural network "village to village".

Secondly, speed up the road construction in rural areas, make use of specialized technical personnel, rationally plan the layout of traffic routes, improve traffic conditions, improve the rural road network, and realize "every village has access to roads".

Finally, enterprises, banks and the government should be encouraged to establish a cooperative mechanism, which should complement each other and build a security system including organization, funds and policy support to provide all-round support for infrastructure construction in rural areas.

### **4.2. Integrating favorable resources to build a professional rural tourism e-commerce platform**

The widespread homogenization of rural tourism leads to consumers' aesthetic fatigue and deepens the oversupply. Realizing the differentiated development strategy, promoting the structural reform of the supply side of rural tourism and maintaining the characteristics of localized resources are the ways for rural tourism to seek common ground while reserving differences in the stimulated industry competition. The high-quality development of rural tourism must be based on product characteristics as endowment conditions, market as basis, location advantages as basis and other comprehensive considerations, tap the endowment of rural tourism resources, and build different differentiated development models of rural tourism.

It is necessary to effectively integrate and utilize local tourism resources and e-commerce development conditions to form a rural tourism e-commerce development platform, which has become the basic premise and important support for rural tourism development. We can make full use of big data technology to analyze the behavior and consumption preferences of potential tourists, and launch personalized products or customized rural tourism products and services, such as research tourism products or sports tourism products for children, and rural tourism products with nostalgia or historical and cultural connotations for middle-aged and elderly people. Provide convenience for tourists' travel activities and continuously expand the influence of e-commerce websites in rural tourist attractions.

### **4.3. Perfecting the external environment of tourism e-commerce ecosystem**

Symbiosis environment is an important component of tourism e-commerce ecosystem, and it is also an important external condition to promote the symbiotic evolution of tourism e-commerce ecosystem. The ecosystem institutions of emerging industries can integrate the internal functions of enterprises with external environmental resources, providing a favorable symbiotic environment for

the development of tourism e-commerce ecosystem [10].

At the same time, the tourism e-commerce platform can upgrade the logistics function through big data, cloud computing, blockchain and other technologies, and improve the convenience of transaction and payment settlement through credit payment and other means. By improving industry standards, we will continuously optimize the environment of tourism e-commerce logistics ecosystem, and then promote the development of the ecosystem. Take advantage of the favorable symbiotic environment, constantly consolidate its own niche, actively interact and cooperate with other symbiotic units, and promote the symbiotic evolution of tourism e-commerce ecosystem.

The new financing mode and service mode are becoming more and more diversified. Consumers can pay by credit installment, and they can also evaluate the credit rating of tourists according to the big data in the business ecosystem, and approve tourists with different quotas according to the evaluation results. Starting from the needs of tourists, this paper integrates the existing tourism e-commerce platforms in rural areas, integrates the advantages of each tourism e-commerce platform, and builds a comprehensive tourism e-commerce platform integrating food, accommodation, travel, transportation, entertainment and shopping.

#### **4.4. Increase the training of e-commerce talents**

Talent is the key to improve the quality of rural tourism. We should make full use of various educational resources, such as training institutions, schools, online platforms, etc., to conduct all-round training for rural tourism practitioners, improve their overall quality and professional and technical level, and then improve the service quality to meet the highest expectations of tourists as much as possible.

On the one hand, the government should attach importance to training rural e-commerce talents and set up special training courses for rural e-commerce talents so that they can have certain professional skills. On the other hand, actively promote the exchange of rural e-commerce talents between regions, promote talents to "bring in and go out", encourage outstanding e-commerce talents in cities to start businesses in rural areas, bring advanced technology to rural areas, strengthen the exchange of online merchants between rural areas and cities, and realize the benign interaction between urban and rural e-commerce. Organize scattered e-commerce, cultivate and develop leading agricultural enterprises, and enhance the scale efficiency and market competitiveness of agricultural products.

### **5. Conclusions**

Tourism is a comprehensive industry, with a long industrial chain and intersection with many industries. As a branch of tourism, rural tourism also needs the support of many industries and industries. The tourism e-commerce ecosystem is not a simple closed system, but a very open system, which needs to keep close contact with the outside world at all times. The internal subjects of the whole system should cooperate for a long time and exchange all kinds of information, materials and energy with the outside of the system, so as to ensure the ecological balance and have lasting vitality. Under the background of promoting rural revitalization in an all-round way, the analysis of the composition, evolution, coordination mechanism and evaluation system of tourism e-commerce ecosystem has certain reference value for local governments and competent departments in scenic spots to formulate development plans and develop e-commerce in scenic spots.

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