

A Study on the Satisfaction of Typical Villages in Mingshan District under the Background of Rural Revitalization

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Abstract: In the context of consolidating the strategy of poverty alleviation and rural revitalization, this study took two typical villages in Mingshan District as the survey objects, and randomly selected dozens of villagers to investigate their satisfaction with the ecology, life, infrastructure, culture, talent, land and economy of their villages, and the satisfaction score was based on the Likert 5-level scoring method. SPSS software was used to calculate the weights of relevant indicators, and it was found that the Cronbach coefficient of the scale was 0.977, the KMO test result was 0.814, the approximate chi-square was 2664.767, the degree of freedom was 528, and the significance was $0.000 < 0.001$. The villagers were more satisfied with the village life and cultural dimensions, but less satisfied with the ecological, infrastructure, human resources, land and economic dimensions. Finally, corresponding enhancement or improvement measures are proposed at different levels to promote the sustainable development of the two villages in these seven dimensions.

Keywords: Rural Revitalization; Satisfaction; Infrastructure; Descriptive Analytics

1. Background

When poverty eradication has been successfully completed, consolidating the results of poverty eradication, implementing the rural revitalization strategy and realizing common prosperity at an early date have been put on the agenda in turn. The "five revitalizations" point out five specific paths for the rural revitalization strategy, namely, promoting the revitalization of rural industries, talents, culture, ecology and organizations. The "five revitalizations" are consistent with

the overall requirements of industrial prosperity, ecological livability, civilized rural customs, effective governance and affluent living, and have become the concrete handholds and fundamental objectives for the implementation of the rural revitalization strategy.

The construction and development of industry, talent, culture, ecology and organization play a leading role in the rural revitalization strategy, and the coordination of the five contents is indispensable. The reason why rural areas are poor and backward and need to be revitalized is mostly because of the backwardness or even shortage of soft and hard conditions mainly in these five aspects. The rural revitalization strategy is a multi-level, multi-subject, and multi-objective development strategy and system engineering involving the participation of multiple subjects such as the government, enterprises, social organizations, and rural households. Therefore, it is necessary to build a sound organizational system. Organizational revitalization is not only one of the goals of rural revitalization, but also the fundamental guarantee of the other four revitalizations [1].

This study surveyed the villagers' satisfaction with the village at all levels to judge its development effectiveness, identify the weak aspects and put forward corresponding improvement measures, so as to promote the further development and revitalization of the village.

2. Research Status on Rural Revitalization and Villager Satisfaction

Yang Yiwu et al. found that the "one-shoulder-to-shoulder" system of village-level organization leaders improved villagers' life satisfaction by enhancing the village's collective action capacity, improving the relationship between cadres and the masses, and strengthening the village economy, but

this improvement effect decreased during the comprehensive promotion period [2]. Wei Feng et al. studied the satisfaction of poverty alleviation households with rural revitalization construction, and found that the satisfaction of poverty alleviation households with rural revitalization construction was significantly lower than that of rural households without poverty alleviation experience, and the main reasons for the low satisfaction of poverty alleviation households were their strong income risk perception, higher degree of financial constraints, and lower subjective economic status identity [3]. Yuan Meng et al. studied the satisfaction of the living environment in traditional villages from the perspective of multiple subjects, and pointed out that the attributes such as educational background and type of residence time have a significant impact on the satisfaction of the living environment, and the satisfaction of local villagers is higher than that of urban immigrants, and the higher the satisfaction of local villagers with stronger geographical attributes [4]. Fang Juntang et al. used factor analysis and structural equation model to calculate the satisfaction and influencing factors of rural construction in Guangdong Province, and found that affluent life, thriving industry, civilized rural customs, ecological livability, and effective governance all had a positive and significant impact on rural construction satisfaction [5]. Liu Xu et al. used principal component analysis (PCA) to extract principal component factors, and used linear regression model to analyze the satisfaction with the integrated development of rural tourism and ginseng industry in Fusong County, and put forward corresponding countermeasures from three aspects: perceived value, technology, and sustainable development, which has helped the revitalization of rural industry in Fusong County [6].

3. Analysis of the Current Situation of Typical Villages

Due to the limitations of subjective and objective conditions, this study only selected the dragon riding village in Hongxing Town, Mingshan District, and the Jiefang Village in Baizhang Town. After the assessment of relevant departments, these two villages were rated as Sichuan Provincial Demonstration

Villages for the Implementation of Rural Revitalization Strategy in 2020 and Sichuan Rural Revitalization Demonstration Villages in 2021 respectively. The survey of villagers from these two villages is representative to a certain extent. Through the on-site visits of the research team and the data collected on the official website of the municipal government, the overview of the two villages and the efforts made in rural revitalization are analyzed and summarized.

3.1 Qilong Village

In January 2024, the latest data of Qilong Village was collected: there are 726 households and a registered population of 2,320, of which 510 are over 65 years old, which calculates that its aging population is 21.98%. At the level of cultural revitalization, the village disseminates policies and guidelines, agricultural technology, and government services to all households through the implementation of radio-and television village-communication, and builds a rural bookstore to display more than 2,000 cultural books such as agriculture and forestry, science and technology, legal system, and political economy. At the level of ecological revitalization, Qilong Village pays attention to ecological and environmental protection, recycles toxic and hazardous garbage and recyclable garbage by opening a "moral ecological supermarket" and exchanges garbage for points and points for affordable goods; At the level of talent revitalization, the village and Sichuan Mengdingshan Cooperative Development Training Institute have established a cooperation mechanism for talent training for rural revitalization. Through "village-school co-construction" and "village-lodging joint construction", undertake training on topics such as agricultural industry and rural tourism, cultivate local talents such as wealthy leaders and rural craftsmen, and help rural economic development; At the level of industrial revitalization, the village has established a rural development and operational platform company in Qilong Village through the village collective economic organization and market entities, revitalized village-level assets and resources such as idle homesteads, vigorously attracted investment, built a boutique homestay group, and promoted the integrated development of

tea and tourism.

3.2 Jiefang Village

In January 2024, the latest population data of Jiefang Village was collected. There are 1,052 households and a registered population of 3,685, of which 543 are over 65 years old, so it can be estimated that the degree of aging is 14.74%. At the level of industrial revitalization, the village relies on the advantages of having a national 4A-level scenic spot to carry out the tertiary industry. In recent years, the characteristic homestay group in the Moon Lake area has been cultivated around the scenic spot, and more than 30 characteristic homestays and farmhouses have been built, forming a tea tourism industry system with the integrated development of multiple industries of "production, processing, research, marketing and tourism", and has been rated as the third batch of provincial rural tourism key villages in 2022. At the level of ecological revitalization, the village comprehensively rectified non-point source pollution and decisively terminated lake fishery farming, strengthened the effective treatment of domestic sewage, and organized volunteer service teams to carry out continuous cleanup of garbage pollution, forming "small wetland + environmental governance", "small wetland + protection and utilization", and "small wetland +". characteristic industries"; At the level of organizational revitalization, give full play to the role of people's congress deputies as a spokesperson for the people and as a bridge, actively build a platform for deputies to perform their duties, and put forward reasonable rectification measures in line with the actual situation through extensive visits to the masses and in-depth front-line research.

4. Descriptive Analysis of the Current Situation of Satisfaction in Typical Villages

4.1 Questionnaire Design and Data Collection

According to the relevant data and literature, we learned from the existing relatively complete survey questionnaire to design various indicators that meet the needs of this study. The questionnaire is divided into two parts, the first part is to count the demographic characteristics of the respondents; The second part is filled in by the respondents with

satisfaction with the seven dimensions of ecology, life, infrastructure, culture, population, land and industrial economy. The second part of the questionnaire uses a five-point Likert scale with a total of 33 questions. Due to the constraints of inconvenient transportation and limited funds, the survey adopted the method of online questionnaire star, and the cadres of the two villages sent the questionnaire link to the WeChat group of the villagers in their villages. This method borrows the prestige of the village cadres to ensure the authenticity and validity of the questionnaire. A total of 58 questionnaires were collected in this questionnaire distribution.

The demographic characteristics of the respondents are as follows: 27 of the survey groups are from Qilong Village, and 31 are from Jiefang Village; The gender ratio is roughly the same, with a slightly higher number of women; The age group is mostly between 30 to 40 years old and 40 to 60 years old, with the least number of people aged 18-30 and over 60 years old. The identity of the interviewed households is mainly the masses.

4.2 Indicator Design

4.2.1 Ecological level

Ecology is closely related to people's production and life, and ecological revitalization is also mentioned in the "Five Revitalizations". In the process of rural construction and rural revitalization, great attention should be paid to the ecological environment, and the problems and weaknesses in the ecology can be found by understanding the villagers' satisfaction with the ecological environment of the village. There are three ecological indicators in this study, namely satisfaction with the water quality of the village, satisfaction with the air quality of the village, and satisfaction with the overall ecological environment of the village, and their item numbers are A1~A3 in the order of A1~A3.

4.2.2 Life level

Man is the sum total of social relations, and it is impossible for anyone to be separated from the social family in which he lives. The quality of the daily living environment will have different degrees of impact on the physical and mental health of residents. There are a total of

5 life indicators in this study, which are the satisfaction with the neighborhood relationship of the village, the satisfaction with the public security environment of the village, the satisfaction with the number of garbage dumping points in the village, the satisfaction with the capacity of the garbage dumping points in the village, and the satisfaction with the cleaning frequency of the garbage dumping points in the village, and their item numbers are B1~B5 in order.

4.2.3 Infrastructure level

Infrastructure construction is one of the important levers for stable economic growth. Improving infrastructure construction can increase government investment and public expenditure, thereby expanding national income, and infrastructure achievements are also conducive to promoting the improvement and development of related industrial chains. From five links and one level to seven links and one leveling, each of them plays an important role in the sustainable and healthy development of the local economy and the happy and peaceful life of residents. There are a total of 11 infrastructure indicators in this study, which are the satisfaction with the medical care of the village, the satisfaction with the coverage rate of the cement road in the village, the satisfaction with the accessibility of the cement road in the village, the satisfaction with the number of bus stations in the village, the satisfaction with the frequency of bus departures in the village, the satisfaction with the number of bus lines in the village, the satisfaction with the network speed of the village, the satisfaction with the gas quality of the village, and the satisfaction with the voltage stability of the village. The degree of satisfaction with the water supply facilities of the village and the satisfaction with the drainage facilities of the village are numbered C1~C11 in the order of C1~C11.

4.2.4 Cultural aspects

Culture, which exists as ideology, is the sum total of the material and spiritual production capacity and the material and spiritual wealth created by human beings in the process of social practice. The geography of each region is different, resulting in different cultures. Rural revitalization also emphasizes "cultural revitalization", that is, through the material civilization and spiritual civilization together, to prosper rural culture. There are three

cultural indicators in this study, which are the satisfaction with the village rules and regulations, the satisfaction with the villagers' customs and folk activities, and the satisfaction with the village's characteristic history and culture, and the question numbers are D1~D3.

4.2.5 Demographic level

Man can use his own subjectivity to transform the world. A dynamic and fast-growing region must be one with a large number of talented people or a large population [7]. Population agglomeration can attract more businesses to develop here and drive local economic growth, promote the formation of industrial chains, and attract government policy support. The "talent revitalization" in rural revitalization also emphasizes that the key to rural revitalization lies in people, and it is necessary to cultivate a group of high-quality rural revitalization talents. There are a total of 5 topics in this study, which are the satisfaction with the number of left-behind children in the village, the satisfaction with the number of left-behind women in the village, the satisfaction with the number of left-behind elderly in the village, the satisfaction with the number of existing agricultural technology experts in the village, and the satisfaction with the number of intellectuals in the village, and the item numbers are E1~E5.

4.2.6 Land level

Rural areas have relatively abundant land resources, and strengthening the integrated utilization of land resources is an important guarantee for firmly adhering to the red line of 1.8 billion mu of cultivated land. With the emergence of more and more part-time farmers and migrant workers, land circulation has gradually become the choice of more and more farmers. There are a total of 4 topics in this study, which are the satisfaction with the idle rate of the village's homestead, the satisfaction with the abandonment rate of the village's homestead, the satisfaction with the utilization rate of farmland in the village, and the satisfaction with the land circulation price in the village, and the item numbers are F1~F4 in order.

4.2.7 Industrial economic level

The "industrial revitalization" in rural revitalization is to make villagers rich and improve economic conditions through the development of primary, secondary and

tertiary industries. Industrial revitalization is the first of the "five revitalizations", the foundation of rural revitalization, and the primary task of rural revitalization. There are two economic indicators in this study, which are respectively satisfied with the number of factories in the village and satisfied with the effect of the factories in the village in increasing farmers' income, and the item numbers are G1 and G2 respectively.

4.3 Descriptive Analysis

SPSS26.0 software was used to calculate the relevant indicators of each dimension and the question. Generally, when the absolute value of skewness is less than 3 and the absolute value of kurtosis is less than 10, the sample data can be considered to be basically in accordance with the normal distribution. Using the five-point Likert scale method, the satisfaction level was divided into five levels: very dissatisfied, relatively dissatisfied, fair, relatively satisfied, and very satisfied, and the scores were assigned to 1-5 respectively. According to the mean of the 33 items, it can be found that the mean value of all the items only in the life and culture dimensions is > 4 , indicating that the development effect of the two villages in the life and culture level is much more outstanding than that of the other dimensions.

The indicators that did not reach a score of 4 at each level were as follows: at the ecological level, only satisfaction with water quality was below 4; At the infrastructure level, it includes satisfaction with medical care, the number of bus stops, bus frequency, bus routes, network speed, voltage stability, water supply and drainage facilities; At the population level, there is satisfaction with the number of rural left-behind women, left-behind elderly, agricultural technology experts and rural intellectuals. At the land level, there are satisfaction with the homestead idle rate, homestead abandonment rate, and land circulation price; In terms of industrial economy, it is satisfaction with the number of factories in the village and the utility of the factories to increase the income of the villagers.

4.4 Reliability Analysis

The Cronbach coefficient of this study scale was $0.977(>0.7)$, indicating that the

consistency and stability of each factor were high. At the same time, in order to improve the reliability of each hypothetical component, the reliability analysis of the index variables in each dimension was also carried out, in which the ecological factor coefficient was 0.865, the life factor coefficient was 0.924, the infrastructure factor coefficient was 0.934, the cultural factor coefficient was 0.933, and the population factor coefficient was 0.925. The coefficient of land factor was 0.832 and the coefficient of industrial culture factor was 0.920, and the results showed that the coefficients were greater than 0.8, indicating that the reliability of the whole scale was very good, and the correlation between items was very strong.

4.5 Analysis of Village Satisfaction Characteristics

The factor validity test was used to measure the accuracy of the measure term, and the validity was analyzed by the KMO and Bartlett spherical tests. The results of the analysis were as follows: the KMO test result was $0.814(> 0.6)$, the approximate chi-square was 2664.767, the degree of freedom was 528, and the significance was $0.000<0.001$ ^[8].

Factor analysis is a statistical analysis method to study the dependency relationship within the correlation matrix, which seeks a few factors among the many correlation factors to comprehensively reflect most of the information of all variables, that is, a few common factors are obtained by dimensionality reduction, so that they retain as much information as possible about the original variables and are not related to each other. The importance of each factor is then determined based on the variance contribution rate of the factors^[9].

In this study, the important factors affecting villagers' satisfaction with the village were determined through factor analysis, and then the comprehensive score of the factors was calculated^[10], and the villagers' evaluation of the village in different aspects was further analyzed.

It can be seen from Table 1 that the first eigenvalue of the eigenvalue coefficient of the initial test is 19.475, which is higher than the eigenvalue of the last five factors, and the first six factors are between 1.156~19.475, and the cumulative variance contribution rate is

83.487%. The main contribution factor was extracted according to the eigenvalue of the correlation matrix, and the first six factors with the final eigenvalue greater than 1 were used as the main factors for analysis, and the orthogonal rotation was used to analyze the factor load.

After the rotation of each factor, there will be different degrees of differentiation of load size, and the attribution change of each factor will

also be obvious. It is required that the factor load coefficient after rotation should be greater than 0.5, the load factor of C10 should be less than 0.5, and the load factor of E3 and G1 showed cross load, so these three were eliminated. On this basis, the respondents' satisfaction was determined into six dimensions, namely, infrastructure (1), culture, life, infrastructure (2), population and land.

Table 1. Eigenroot and Variance Contribution Rate

variable	Factor loading					
	1	2	3	4	5	6
C1	0.8					
C3	0.797					
C8	0.705					
F3	0.659					
B2	0.608					
D1		0.743				
E4		0.723				
D3		0.638				
D2		0.606				
C1		0.595				
E5		0.56				
B1		0.546				
C10						
B5			0.838			
B4			0.832			
B3			0.809			
A3			0.769			
C6				0.787		
G2				0.727		
C4				0.642		
F4				0.603		
C7				0.588		
C5				0.512		
E2					0.699	
E1					0.69	
C9					0.669	
A1					0.641	
E3				0.555	0.637	
A2					0.603	
F1						0.837
F2						0.828
G1				0.605		0.633
C11						0.57
Common factor naming	Infrastructure (1)	culture	life	Infrastructure (2)	population	land
eigenvalue	19.475	2.458	1.666	1.433	1.363	1.156
Factor variance contribution rate%	59.015	7.447	5.048	4.342	4.132	3.504
Cumulative variance	59.015	66.462	71.51	75.852	79.983	83.487

contribution rate%						
Relative weights%	17.8	17.7	17.5	17.1	16.7	13.3

Through the investigation of the above six factors, the relative weight of infrastructure, culture, life and population is higher than that of land, which is the most important factor affecting the satisfaction of villagers.

5. Summary and Measures are Suggested

5.1 Summary

Qiding Village and Jiefang Village were respectively designated as exemplary villages for implementing the rural revitalization strategy in Sichuan Province in 2020 and exemplary villages for rural revitalization in Sichuan Province in 2021, indicating that the work of "rural revitalization" has progressed smoothly in these two areas. The satisfaction of the masses in democratic politics should be the yardstick for evaluating the achievements of the work. Therefore, we surveyed the villagers in the two villages as the research object, designed a questionnaire covering the seven dimensions of ecology, life, infrastructure, culture, population, land, and economy, with a total of 33 questions, to investigate the degree of satisfaction of the villagers in these seven dimensions of their village, and propose corresponding improvement and enhancement measures based on the degree of satisfaction.

5.2 Recommendations for Measures

Based on the above data, it can be found that the respondents are more satisfied with life and culture than with the rest of the respondents. Therefore, the following measures are proposed.

5.2.1 Stay motivated and keep improving

Adhere to the deep cultivation at the cultural level. Improve the local village rules and regulations, and take the essence and eliminate the dross in accordance with the principle of adapting measures to the times, so that the village rules and regulations can give full play to their positive value, not only at the level of regulations and constraints. Enrich and carry forward the excellent culture with local characteristics, rely on traditional festivals to carry out characteristic folk activities, use culture to stimulate the cohesion of local villagers, enhance the stickiness of villagers to their hometowns, and start from culture to let

more talents return to their hometowns for construction.

At the level of daily life, we will create a better public security environment in a steady and progressive manner, dispatch patrols from time to time, especially in remote areas with few people, and strengthen the registration and statistical management of the permanent population and the floating population in the village to ensure the safety of the villagers. With the continuous improvement of living standards, the quantity and types of domestic waste are gradually increasing, and strengthening the classified collection and treatment of domestic waste is also a strong guarantee for the sustainable development of the rural ecological environment.

5.2.2 Find weaknesses and face problems

At the ecological level, local villagers are satisfied with the overall ecological environment and air quality, but are less satisfied with water quality, so they should pay attention to river basin management and strengthen river improvement, and regularly send people to clean up river garbage. At the same time, we pay attention to the control of drinking water and domestic water to ensure the water safety and health of villagers.

At the infrastructure level, we regularly carry out medical care for the people in the villages, invite doctors to go to the countryside to check the pulse, measure the "three highs" and other basic physical examinations, so that the elderly in the village who often have no children to accompany them can also understand their physical conditions in a timely manner, so that the children who go out to work and study can rest assured. "If you want to get rich, build roads first", the importance of roads to regional development is self-evident, and respondents showed low satisfaction with the content about buses. Therefore, the government should pay more attention to the construction and improvement of the village-level public transport system, increase the number of bus stations and bus routes appropriately, and increase the frequency of bus departures to facilitate the travel of villagers. Negotiate with local telecom mobile operators at the speed level to improve network quality. At the voltage level, professionals are sent to regularly inspect and

repair aging circuits, and strengthen the education and publicity of villagers on safe electricity use. In terms of water supply and drainage, reasonable and effective drainage canals should be built, maintenance and inspection of aging equipment should be carried out, and the treatment of waste water and sewage in the village should be strengthened.

At the economic level, preferential policies have been introduced to encourage capable villagers to rely on their own advantages to set up factories, and to attract capable entrepreneurs from other places to build factories in the local area, so as to promote local economic development. At the same time, when recruiting employees, enterprises try to recruit qualified local villagers to engage in corresponding types of work, so that villagers can have additional income and enjoy the benefits of economic development and local factory construction.

At the level of talent construction, we should strengthen the government's capital investment, establish a sound talent introduction policy, attract learned people with "one understanding and two loves" to shine here, and form a bridge connecting villages with advanced civilizations such as artificial intelligence, the Internet, modern development, innovative industries, and effective governance.

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