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Introduction

Smart tourism is already the main development trend of future tourism. Using cloud computing, internet, and other new technologies, through mobile internet devices, you can actively collect tourism resources or activities and other information, and even publish, understand, arrange and adjust in time travel plans to achieve the intelligent perception and utilization of various.

The modern era is in an era of vigorous development of smart tourism. This generation of seniors who have received a good education are more enthusiastic about traveling than the previous generation .Groups of senior citizens are also called "new seniors".

According to the phenomenon, under the environment of smart tourism, in terms of the technological environment new seniors perceive, is it possible to hinder their participation in the travel of the smart tourism? It is the research problem that this study intends to solve.

Methodology

Due to the Labor Law, whoever have had worked for 15 years long and above and have reached the age of 55 can apply for retirement. Therefore, this study defines "senior" who is 55-year-old and above as the research subjects.330 questionnaires were issued and there are 325 valid questionnaires with 98% effective recovery. This study uses SPSS (Statistical Package for the Social Science) for Windows software package. The analysis methods mainly include reliability, validity measurement, descriptive statistics, correlation analysis, regression analysis, and variance analysis.

Results

According to statistics, the Cronbach's α value of self-efficacy is 0.941, the perceptual usefulness values 0.929, the perceived ease of use values 0.942, and the travel constraint values 0.874. The Cronbach's α value of each dimension of travel constraint: internal constraint is 0.750, structural constraint is 0.822, and interpersonal constraint is 0.764.

TABLE 1
Reliability and Validity Analysis of Formal Questionnaires for Various Variables

	KMO Sampling suitability measure	Bartlett Spherical test significance
Self-Efficacy.	0.785	*** 0.000
Perceived Usefulness	0.761	*** 0.000
Perceived Ease of Use	0.822	*** 0.000
Travel Constraints	0.857	*** 0.000
Internal Constraints	0.701	*** 0.000
Structural Constraints	0.791	*** 0.000
Interpersonal Constraints	0.727	*** 0.000

$P < 0.05$；$**P < 0.01$

Kaiser (1974) said (Kaiser -Meyer-Olkin measure of sampling adequacy; KMO) criterion for determining the KMO value is 9 or higher, which means it is very suitable for factor analysis, 0.8 or higher means it is suitable for factor analysis, and 0.7 higher means that factor analysis is still possible, 0.6 The above can barely be used for factor analysis, but above 0.5 and below are not suitable for factor analysis .All of the above meet the requirements of reliability and validity.

A. Correlation analysis

The variables and dimensions are significantly correlated with each other, the correlation degree is 0.118 to 0.903.

The correlation coefficient of self-efficacy and perceived usefulness is the highest (R=0.338, P=0.000<0.01), and the correlation coefficient of perceived ease of use is the second (R=0.334, P=0.000<0.01). The number of internal constrain is the lowest (R=0.118, P=0.034<0.05).

Perceived usefulness and the structural constrain is correlated (R=0.278, P=0.000<0.01).

Perceived ease of use and structural barriers have the highest correlation coefficient (R = 0.324, P = 0.000 <0.01), and travel constrain has the second highest correlation coefficient (R = 0.313, P = 0.000 <0.01). The number of internal constrain relates the lowest (R=0.219, P=0.000<0.01).

B. Regression analysis

This study proceeds the regression analysis and finds out those β values of all variables and dimensions which can be shown is figure 1-3. Hypotheses are partially supported.

Fig.1 Regression analysis of technology perception (perceived usefulness), self-efficacy and travel constraints.
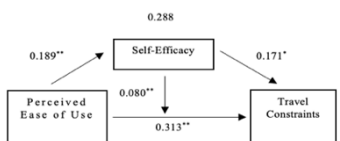
Fig. 2 Regression analysis of technology perception (perceived ease of use), self-efficacy and travel constraints.
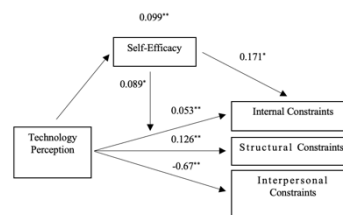
Fig.3 Regression analysis of technology perception, self-efficacy and 3 dimensions of the travel constraint

C. ANOVA Analysis

According to the ANOVA table of the estimated results shows that the significance test p-value is less than the significance level of 0.05, indicating that there are significant differences of age in technology perception, and partly supports the hypothesis.

TABLE 2
ANALYSIS OF THE VARIANCE OF AGE IN TRAVEL CONSTRAINTS, SELF-EFFICACY, PERCEIVED USEFULNESS, AND PERCEIVED EASE OF USE

	F	Significance
Technology Perception	3.262**	.022
Perceived Usefulness	0.276	.843
Perceived Ease of Use	1.121	.755
Self-Efficacy	0.341	.520
Travel Constraints	1.101	.349

$* P < 0.05$；$**P < 0.01$

According to Table 3, the ANOVA table of the estimated results shows that the p-value of the test of significance is less than the significance level of 0.05, indicating that there are significant differences of whether the mobile phone is a smartphone in " Perceived Usefulness" and "Perceived Ease of Use", which partially supports the hypothesis.

Table 2 The analysis of the variance of whether the mobile phone is a smartphone in Travel Constraints, Self-Efficacy, Perceived Usefulness, and Perceived Ease of Use.

TABLE 3
THE ANALYSIS OF THE VARIANCE OF WHETHER THE MOBILE PHONE IS A SMARTPHONE IN TRAVEL CONSTRAINTS, SELF-EFFICACY, PERCEIVED USEFULNESS, AND PERCEIVED EASE OF USE

	F	Significance
Technology Perception.	0.109	.741
Perceived Usefulness	6.330**	.012
Perceived Ease of Use	9.125**	.003
Self-Efficacy.	3.018	.083
Travel Constraints.	0.382	.537

$* P < 0.05$；$**P < 0.01$

There is no difference of "Whether to use smartphones during travel "and "the main ways to surf the Internet during travel" in Travel Constraints, Self-Efficacy, and Technology Perception, which hypothesis are not supported.

Conclusion

1. When senior citizens use smart technology and feel higher usefulness and ease of use, the obstacles to travel will be reduced
2. The seniors are not repulsive to learning in the use of smart technology
3. The seniors may overestimate their own self-efficacy, so they actually have a higher status in the travel constraints
4. The seniors find it convenient and easy to use when using smart technology, but their lack of integration ability in tourism has caused travel constraints for the seniors
5. The perception of science and technology may show differences in the age of senior citizens, and there are different perceptions of travel constraints
6. The perception of science and technology may show differences in the degree of smart tourism of senior citizens, and there are different perceptions of travel constraints
7. The older seniors who use smartphones do not necessarily think that they are easy to use and convenient to use

Suggestions

1. Promote more humane and smart sightseeing
2. Offering courses related to smart technology
3. Enriching tourism products
4. Establish a platform and a friendly interface for the elderly tourism zone
5. Propose different travel plans according to different age groups
6. Develop scientific and technological software that helps seniors travel

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