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Relationship Between Attitudes Toward Tourism Interaction and Motivations for Migration

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ABSTRACT

Japan's declining population, falling birthrates, and rapid aging of society are long-term and rapid. This has made it difficult for some regions to even sustain themselves. Under these situation, the increase and decrease in the number of people in a region and the interactions that bring them to the region have a significant socioeconomic impact on each region. Therefore, the mechanisms of movement, such as tourism and migration, must be elucidated. In this study, we focused on tourism interaction and migration, and aimed to clarify the relationship between attitudes and motives regarding movement. For each type of movement, we conducted a cluster analysis of the factors, and confirmed the similarity of each factor. The results show a high degree of commonality between the two movement ideas: tourism interaction and migration. It is quantitatively clear that people are willing to make moves such as tourism and migration according to their individual preferences.

Keywords: Movement of people, Urban development, Community revitalization, Questionnaire

INTRODUCTION

Population decline in Japan is long-term, rapid, and unstoppable. Within Japan, many people are migrating, and the impact of this migration on local communities is manifold. Migration is related to the increase or decrease of the local population, which, as residents, has a significant socioeconomic impact on those areas. In addition, tourism interaction differs from settlement in that it involves a medium- to short-term stay in the area being visited. This is because tourism has a wide range of impacts, including on local employment and economy, as well as on local vitality. Under these situations, there is a need to elucidate the mechanisms of these movements.

This study aims to clarify how attitudes and motivations related to movements are related to each other. In other words, tourism interaction and migration are both movements of people between regions, and we will clarify what people think about these movements. This is the basic analysis in clarifying the behavioral mechanism of human mobility. Specifically, the following analyses will be conducted. Regarding attitudes toward tourism and motivations for migration, we will analyze the importance of each item in tourism and migration, as well as the importance of each item in the selection of tourist destinations, using a questionnaire. In addition to the previous

analysis of attitudes toward tourism, a covariance structure analysis will be conducted to clarify the relationship between each factor and the factors. A cluster analysis will be conducted on the relationship between awareness of tourism interaction and motivations for migration, targeting each of the factors. This will elucidate the relationship based on the results of how they are categorized.

EXISTING STUDIES AND CHARACTERISTICS OF THIS STUDY

We review existing studies on tourism interaction and migration, which are closely related to this study, and summarize the characteristics of this study.

First, with regard to tourism interaction, some studies have analyzed the structure of tourism behavior using factor analysis and logit models; the impact of the pandemic under COVID-19 on tourism-related firms was clarified using a logit model (Haisheng et al., 2021). Another study was also found to identify mobility factors using tourism information publication status and transportation convenience for inbound tourism (Kondo et al., 2017). Kondo et al. (2024) found that the effects of tourism factors on behavior were revealed by a factor analysis of tourism and the impact of each factor on behavior.

In addition, a number of studies have identified migration mechanisms; Zenou (2010) analyzed the relationship between urban employment growth and regional transportation and migration. The results show that urban transportation improvements can increase urban employment despite inducing migration from rural areas. Andris et al., also found that although intercity migration is modeled in terms of job availability, wages, etc., these do not capture the diversity of information flows and social networks within a city. Therefore, they explored the possibility of using migration network degree to distinguish cities that are attractive to migrants Kondo et al. (2010) developed a population mobility model that takes into account inter-regional interactions. In this study, they constructed an interaction model based on the interregional utility disparity theory and the profit maximization theory of firms for tourism and business interactions, respectively. Furthermore, by introducing them explicitly into the migration model, the relationship between interregional migration and interregional interaction is clarified.

As described above, research results on tourism interaction and migration are diverse. However, there are no results that clarify the relationship between them, focusing on the ideas that motivate and cause people to move, such as attitudes toward tourism interaction and motivations for migration. By clarifying the relationship between these two from this perspective, we will also examine the influence of people's ideas on their behavior.

TOURISM INTERACTION AND MIGRATION IN JAPAN

This section examines the current status of tourism interaction and domestic migration in Japan based on long-term time-series data. For tourism interaction, we use "International Travelers in Japan" data published by Japan National Tourism Organization (JNTO). For the number of

migrations, data from the "Annual report on the internal migration in Japan derived from the basic resident registers" provided by the Ministry of Internal Affairs and Communications (MIC) will be used, and for the total population, data from the "Population estimates; Long-term time-series data" provided by the MIC. Population estimates: Population as of October 1 of each year. Figure 1 shows the number of foreigners visiting Japan and the number of Japanese leaving Japan, and Figure 2 shows the population and migration in Japan.

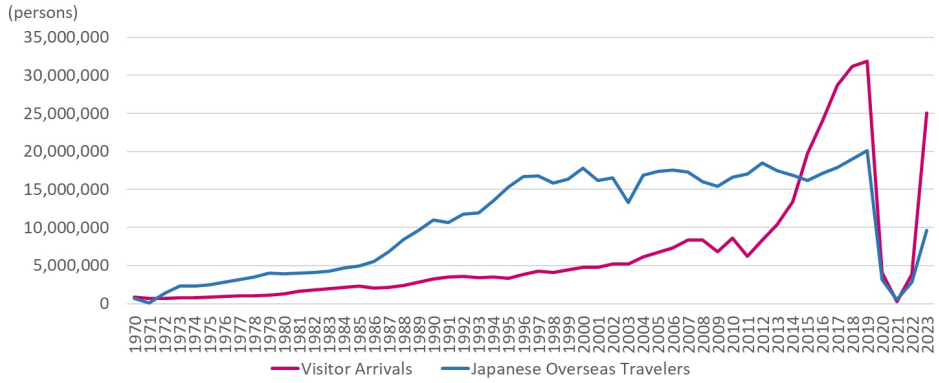

Figure 1: The number of visitor arrivals and Japanese overseas travelers in Japan.

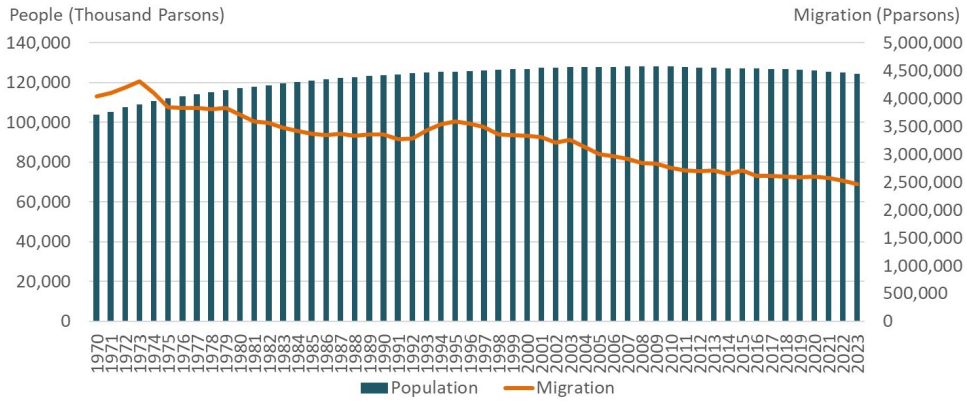

Figure 2: The population and migration in Japan.

Combined with the global expansion of demand for overseas travel, the number of inbound tourists to Japan has shown steady growth, and in 2015, the number of inbound tourists to Japan exceeded the number of Japanese leaving the country. In recent years, the number of inbound tourists has been increasing year by year, meaning that the impact of inbound tourism in Japan on each region is becoming increasingly significant. However, with the global spread of COVID-19 infection, restrictions on international travel

and growing resistance to travel have become global conditions, and the number of inbound tourists to Japan has plummeted. The current decline in the number of inbound tourists had serious repercussions on many fronts in Japan. Today, inbound tourism has surpassed the pre-pandemic level, and domestic tourism is also on the road to recovery.

OUTLINE OF THE QUESTIONNAIRE

In this study, a questionnaire was conducted to determine attitudes toward tourism and each factor in tourism objectives and destination selection, as well as motivations for migration. Web-based questionnaires were conducted twice, in March and June 2023, covering the entire country in Japan. A summary of the results and the distribution of respondents are shown in Table 1. The results of these two surveys will be added together for further analysis. In the questionnaire, respondents were asked to respond to each item by selecting from the following six options. The options were "1: Very important (2 points)," "2: important (1 point)," "3: Neutral (0 point)," "4: Not very important (-1 point)," "5: Not important (-2 points)," and "6: Other (0 point). The number in parentheses () is the score used to score the responses. Not indicated at the time of the question.

Table 1. Questionnaire summary.

Period | March 13, 2023–March 20, 2023 Number of Responses: 1,101				Period | June 28, 2023–June 29, 2023 Number of Responses: 1,036			
Characteristic	**Sample**	**Characteristic**	**Sample**	**Characteristic**	**Sample**	**Characteristic**	**Sample**
Gender		Occupation		Gender		Occupation	
Male	547	Public employee	42	Male	518	Public employee	35
Female	554	Executive	16	Female	518	Executive	14
Age group		Company employee(clerical)	144	Age group		Company employee(clerical)	121
Under 15	88	Company employee(technical)	89	Under 15	0	Company employee(technical)	114
15–19	170	Company employee(other)	114	15–19	172	Company employee(other)	138
20–29	172	Self-employee	43	20–29	174	Self-employee	37
30–39	170	Freelance	37	30–39	174	Freelance	9
40–49	170	Housewife/ Househusband	128	40–49	172	Housewife/Househusband	119
50–59	161	Part-time job	118	50–59	172	Part-time job	150
Over 60	170	Student	260	Over 60	172	Student	194
		Other	110			Other	105

ATTITUDE TOWARD TOURISM INTERACTION

In this study, the respondents were asked about their attitudes toward tourism interactions, with respect to the importance of tourism objectives and attractions. For each of these items, respondents were asked to choose from the six options described above. The results of these responses have already been published (Kondo et al., 2024). Table 2 shows the results of the factor analysis conducted using the results of those responses. For the factor extraction method, the maximum likelihood method was applied, and for the rotation method, the Promax method with oblique rotation was employed. In this case, $\chi^2 = 1144$, with a significance probability $p<0.0001$.

Table 2. Results of factor analysis of tourism attraction importance.

Factor	Variables	Factor1	Factor2	Factor3	Factor4
	Experience tourism (Agriculture, forestry, and fisheries)	**.927**	−.087	.031	−.053
	Experience tourism (Local Daily Life)	**.856**	−.059	−.057	.079
experience/activity	Experience tourism (Traditional culture)	**.820**	−.083	.129	.020
	Experience tourism (Entertainment)	**.644**	.145	−.120	.179
	Watching sports	**.430**	.324	.032	−.192
	Events	−.036	**.856**	−.061	.048
	Theme parks	−.051	**.785**	−.066	.086
active	Theater/Music appreciation	.265	**.408**	.231	−.213
	Shopping	.023	**.342**	.042	.296
	Visiting family, friends, or acquaintances	.127	**.298**	−.007	.280
	Culture/Art	.024	.025	**.752**	−.041
	Nature	−.047	−.125	**.671**	.161
art/culture	Shrines/Temples	.098	−.016	**.635**	−.046
	Scenery	−.063	−.095	**.487**	.430
	Museums/Zoos/Aquariums	.087	.253	**.439**	−.044
	Staying overnight itself (Rest, Hotel use)	.050	−.014	−.146	**.753**
	Atmosphere different from daily life	.022	.005	.039	**.661**
relaxation	Food	−.168	.072	.109	**.543**
	The means of transportation itself, such as boats or trains	.177	.040	−.030	**.540**
	Hot Springs	−.016	.038	.227	**.368**
	Factor contribution	5.262	4.450	4.402	3.672
	Factor contribution rate	26.312	22.251	22.008	18.360
	Cumulative contribution	26.312	48.563	70.571	88.931
	Correlations of the primary factors				
	Factor1	1.000	.653	.567	.329
	Factor2	.653	1.000	.465	.361
	Factor3	.567	.465	1.000	.465
	Factor4	.329	.361	.465	1.000

From the pattern matrix of the factor analysis, the first factor represents "experience/activity" the second factor represents "active" the third factor represents "art/culture" and the fourth factor represents "relaxation" respectively. Based on the results of the factor analysis, an attempt was made to model the relationship between the four extracted factors and the latent variables. The results of the structural equation model are shown in Figure 3.

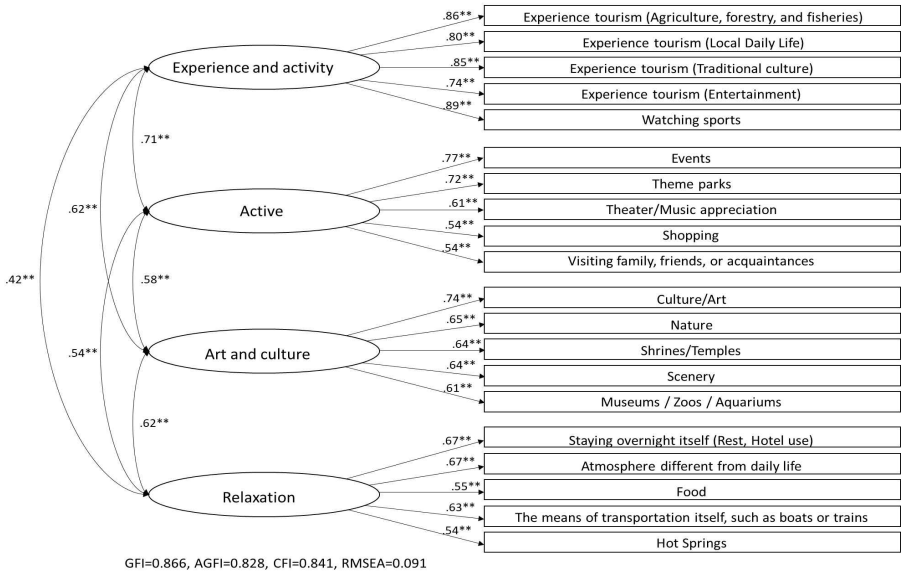

Figure 3: Attitude structure mode of the importance tourism attractions.

TOURISM DESTINATION SELECTION FACTORS

As with the tourism objectives and attractions, we asked the respondents to answer questions about the level of importance when choosing a tourist destination. Using the results of those responses, a factor analysis was conducted, and the results are shown in Table 3. The factor extraction method is also the same. In this case, $\chi^2 = 530$, with a significance probability of $p<0.0001$. From the pattern matrix of the factor analysis, the first and second factors represent "attractiveness and safety" and "transportation convenience" respectively. Based on the results of the factor analysis, an attempt was made to model the relationship between the two extracted factors and latent variables. The results of the structural equation model are shown in Figure 4.

Table 3. Attitude structure model of the importance of deciding on a tourist destination.

Factor	Variables	Factor1	Factor2
attractiveness and safety	Availability of discount promotions Experience tourism (Local Daily Life)	**.699**	−.032
	Cost of living in the destination	**.663**	.025
	Measures for tourists in the event of a disaster	**.572**	.101
	Ease of getting around by private car	**.545**	−.096
	Climate	**.532**	.133
	Atmosphere different from daily life	**.500**	.091
	Food, nature, events, scenery, and other attractions of tourist destinations	**.322**	.221
transportation convenience	Ease of use of public transportation to and from the destination	−.190	**.991**
	Ease of access to public transportation in the destination	.085	**.668**
	Time required for round-trip transportation	.167	**.517**
	Cost of round-trip transportation	.271	**.447**
	Factor contribution	3.570	3.380
	Factor contribution rate	770.991	729.852
	Cumulative contribution	770.991	1,500.844
	Correlations of the primary factors		
	Factor1	1.000	.667
	Factor2	.667	1.000

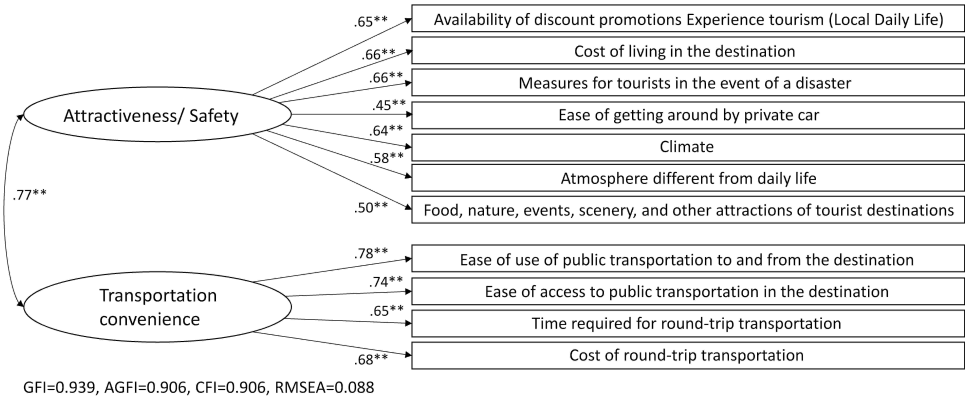

Figure 4: Attitude structure model of the importance of deciding on a tourist destination.

MOTIVATIONS FOR MIGRATION

As with tourism objectives and attractions, respondents were asked and responded to questions about the importance of these factors when choosing a place to live. Figure 5 shows the distribution of the level of importance when choosing a place to live. The results of those responses have already been published (Kondo et al., 2024). Using these results, a factor analysis was conducted, and the results are shown in Table 4. The same method of factor extraction was used. In this case, $\chi 2 = 4224$, with a significance probability $p<0.0001$. From the pattern matrix of factor analysis, the first factor represents "work/ housing" the second factor represents "education/ childrearing" the third factor represents "nature/ culture" the fourth factor represents "convenience of living" and the fifth factor represents "urbanity" respectively.

Figure 5: Importance of motives in choice of place to live.

Table 4. Factor analysis of the importance of motives for choosing a place to live.

Factor	Variables	Factor1	Factor2	Factor3	Factor4	Factor5
work/housing	Many job opportunities are available in the area where you live, and information is provided.	**.901**	−.013	−.185	.029	−.034
	Employment support from the municipality where you live is available.	**.857**	−.044	−.036	−.007	−.057
	Housing counseling (including information on vacant houses) is available in the area where you live.	**.808**	−.036	−.038	.035	.045
	Housing support (loans, renovation, remodeling, new construction, etc.) is available in the area where you live.	**.773**	−.008	−.084	.082	.088
	The municipality where you live provides good support for starting a business.	**.632**	.052	.177	−.192	−.126
	Low land prices in the place of residence.	**.534**	.017	.013	.033	.089
	Average annual income is high in the area where I live	**.512**	.115	.110	−.082	− .178

(Continued)

Table 4. Continued

Factor	Variables	Factor1	Factor2	Factor3	Factor4	Factor5
education/ childrearing	There are many elementary and junior high schools in the neighborhood, and they offer good educational content and assistance.	−.026	**.926**	−.081	.085	.135
	The number of day-care centers and kindergartens in the area where you live is large and educational assistance is available.	−.045	**.906**	−.030	.090	.172
	Plenty of high schools in the area with good educational content and assistance.	−.011	**.891**	−.025	.023	.001
	The educational content of universities, colleges of technology, and other institutions of higher education in the area of residence is excellent.	.018	**.797**	.052	−.069	−.227
	Large number of vocational schools, universities, colleges of technology, etc.in the area of residence.	−.012	**.792**	.101	−.131	−.233
	The location provides childcare assistance and consultation services.	.050	**.791**	.023	.053	.162
	The educational support provided by the university, college of technology, or other institution of higher education in the area of residence is excellent.	.018	**.791**	.031	−.016	−.157
nature/ culture	Want to live in the countryside	−.096	.021	**.746**	−.217	.087
	There are many other migrants living in the area	.029	−.004	**.693**	−.135	−.068
	Well-developed cultural and art facilities and cultural and art clubs	−.034	.004	**.659**	.012	−.123
	Distance from residence to major airport is close	−.037	−.070	**.631**	.091	−.272
	Rich natural environment	−.046	.012	**.624**	.077	.121
	Well-developed sports facilities and sports clubs	−.025	.049	**.571**	.034	−.116
	Public transportation from residence to major airports is well developed.	−.116	−.040	**.430**	.378	−.269
	The community has a supportive environment with a close relationship with its neighbors.	.299	.100	**.371**	.022	.054
	The place of residence has good support for immigration (subsidies, employment support, etc.).	.274	−.018	**.350**	.258	.009
	Other support for immigration at the place of residence.	.284	−.005	**.305**	.269	−.002
convenience of living	Public transportation system from a station near the residence to the main station is well maintained.	−.003	−.011	−.178	**.864**	−.216
	Distance from the nearest bus stop or train station is close to the residence.	−.010	.004	−.169	**.818**	−.308
	Distance from nearby train station to main train station is close to the residence	−.045	−.030	−.076	**.779**	−.292
	Well-developed medical and welfare facilities such as hospitals and clinics	−.010	.040	.038	**.711**	.037
	Good shopping facilities, such as supermarkets.	−.021	−.008	−.037	**.707**	.010
	Local countermeasures against natural disasters such as earthquakes are taken on a daily basis in an easy-to-understand manner, even during tourism	.052	.033	.127	**.612**	.056
	Local countermeasures against natural disasters, such as earthquakes, are in place and information is provided	.086	.033	.100	**.572**	.118
	Good telecommunications environment	.140	.145	.018	**.434**	.035
urbanity	There are many other migrants living in the area	−.004	−.026	.104	.227	**−.379**
	Factor contribution	9.422	9.202	9.014	7.714	1.575
	Factor contribution rate	28.551	27.886	27.314	23.376	4.772
	Cumulative contribution	28.551	56.437	83.752	107.127	111.900
	Correlations of the primary factors					
	Factor1	1.000	.607	.675	.568	−.148
	Factor2	.607	1.000	.644	.403	−.192
	Factor3	.675	.644	1.000	.493	−.233
	Factor4	.568	.403	.493	1.000	−.047
	Factor5	−.148	−.192	−.233	−.047	1.000

RELATIONSHIP OF EACH ATTITUDE TO TOURISM INTERACTION AND MIGRATION

The purpose of this study is to clarify the relationship between people's awareness of tourism interaction, such as the purpose and attractiveness of tourism and the decision of where to visit, and their awareness when choosing a place to live. Thus, a cluster analysis of the 11 factors extracted as a result of each factor analysis conducted thus far will be conducted to clarify how each awareness and motivation can be categorized. The results of the cluster analysis are shown in Figure 6.

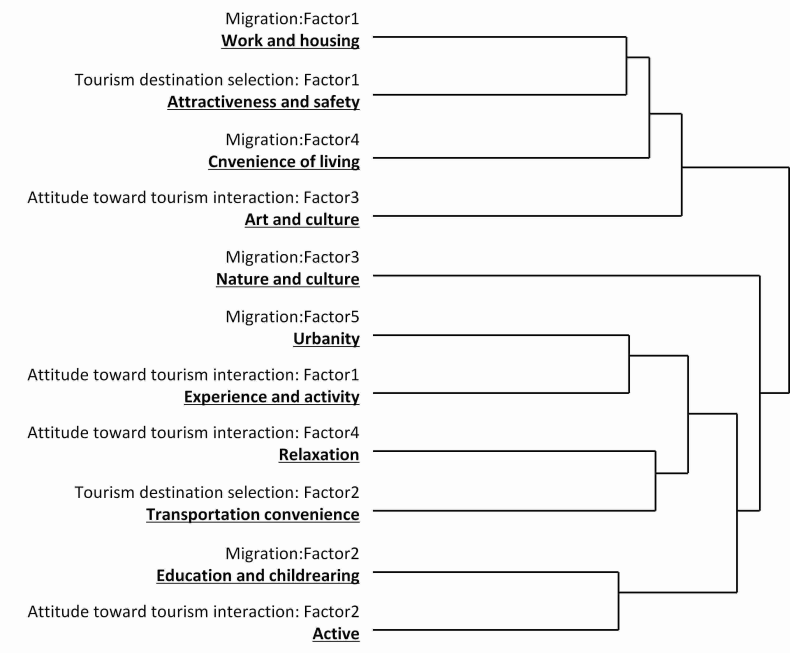

Figure 6: Results of cluster analysis of attitudes toward tourism interaction and motivations for migration.

CONCLUSION

In this study, we focused on tourism interaction and migration, and analyzed them with the aim of clarifying how attitudes and motivations related to movement are related to each other. Regarding attitudes toward tourism interaction, four factors were identified: "experience/activity," "active," "art/culture," and "relaxation." Regarding the choice of tourist destination, the results consisted of two factors: "attractiveness and safety" and "transportation convenience. Regarding the motivation for migration, the results consisted of five factors: "work/housing," "education/childrearing," "nature/culture," "convenience of living," and "urbanity". A cluster analysis was conducted to see how these relationships could be classified and similarities confirmed. The results revealed that the two movement ideas, tourism interaction and migration, have many items in common. These results quantitatively revealed that people are willing to move for tourism and migration according to their personal preferences.

ACKNOWLEDGMENT

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