Short Note

Determinants of Tourist Arrivals to Argentina from Bolivia, Brazil, and Chile: An Analytical Perspective

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Determinants of Tourist Arrivals to Argentina from Bolivia, Brazil, and Chile: An Analytical Perspective

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Abstract: This article explores determinants of tourist arrivals from neighboring countries of Bolivia, Brazil and Chile to Argentina. The research utilizes an observation data of the World Bank in the period of 1995-2016. Linear regression analysis is applied to identify the relationship between tourist arrivals to Argentina from Bolivia, Brazil, and Chile and variables including distance, common religions, tourist income, government effectiveness and political stability. The findings indicate that distance and common religions do not have any relationship with tourist flow. Tourist income form both origin and destination, government effectiveness in destination, and political stability in origin have a positive effect, while political stability in destination and government effectiveness in origin have a negative effect on tourist arrivals to Argentina. Limitations include the reliance on historical data, which may not fully predict future trends.

Keywords: Tourist arrivals; Argentina; Linear regression; Government effectiveness; Political stability; Tourist income

Introduction

Today, globalization has made tourism business grow faster than ever. Who are most likely your next visitors? You neighbors? If yes, what make them come. And if not, what stop them from coming? There are numerous studies on tourist flows but few focuses on factors that determine neighbors' travelling wills of Argentina.

Muhammad & Andrews (2008) investigate origin-specific factors on Uganda's tourist arrivals, using gravity trade model, and reveal that GDP, distance, trade, and exchange rates are playing important roles. Park & Yeon (2023) investigate data from World Development Indicators (WDI) and illustrate that countries with high air quality attract more visitors and low air quality otherwise.

This article investigates the determinants of tourist arrivals to Argentina from neighboring countries, using linear regression analysis, to identify positive and negative factors, providing insights for a better tourism business promotion.

The paper first will investigate specific variables from the data set of the World Bank observation on tourist arrivals to Argentina from Bolivia, Brazil and Chile. Then, linear regression method will be applied to analyze the impacts of distance, common religions, tourist income, government effectiveness and political stability. The findings of this study will contribute to the tourism literature and will provide insights for tourism promotion in Argentina.

Literature Review

There is a large number of studies on the tourist arrivals that have been published.

Velasquez & Oh (2013) examines Peru's tourist behavior, Using the gravity model, suggesting that positive coefficients for economic size and negative coefficients for distance are the main factors that determine the tourist arrivals. It is pointed out that the construction of transport infrastructure with its neighbor countries is needed for further development.

Gómez & Cossi (2015) reveal that the number of outbound travelers in Argentina exceeds inbound, indicating a potential market for future arrivals to the country.

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Romero et al. (2020) study the case of province Salta, Argentina, using survey data and location quotients methodology, suggesting an input-output analysis to understand the relevance of tourism promotion in the country.

Shao et al. (2020) apply network analysis to explore the international tourist flows with network, revealing that geographically close countries share similar interest in international market, suggesting an idea for neighboring countries for business partnership.

However, there is no study so far that explores the factors such distance, common religions, tourist income, government effectiveness and political stability on tourist arrivals to Argentina from its close neighbors. This study will try to fill this gap in the literature and provide insights for business sector and policy makings in the country

Methodology and Data

the study employs a linear regression model to identify the variables of distance, common religions, tourist income of origin and destination, government effectiveness and political stability of origin and destination and their impacts on tourist arrivals to Argentina, which can be expressed as follow:

$Y = ß + \alpha$ distance + $\alpha 1$ comrelig + $\alpha 2$ touristincome_orig + $\alpha 3$ touristincome_dest + $\alpha 4$ ge_ orig + $\alpha 5$ ge_dest + $\alpha 6$ pl_orig + $\alpha 7$ pl_dest +ε

Where, Y represents the dependent variable, the tourist arrivals to Argentina, and ß represents constant. The distance means the distance between Argentina and destination countries; the comrelig means the common religions; the touristincome_orig is the tourist income in origin countries; the touristincome_dest is the tourist income in destination; the ge_ orig is the government effectiveness in origin countries; the ge_dest means the government effectiveness in destination; the pl_orig represents the political stability in origin countries; the pl_dest represents the political stability in destination; and ε is the error term, which is used to improve the consistency of the regression.

This dataset is an observation record of the World Bank on tourist arrivals from Bolivia, Brazil and Chile to Argentina in the period of 1995-2016.

Table 1 is the model summary that shows the R-Squared value is 0.959, which means that the model with these variables explains 95.9% of the variation in tourist arrivals to Argentina. It illustrates that a good portion of the variation has been captured, indicating a strong explanation of the factors that influence the results.

Table 1. Model Summary.

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.979[a]	.959	.953	.176531127856485

a. Predictors: (Constant), touristincome_orig, pl_dest, distance, ge_dest, touristincome_dest, pl_orig, ge_orig, comrelig

Results and Discussion

Table 2 shows the results of linear regression analysis on the independent variables:

Table 2. Coefficients[a].

Model		Unstandardized Coefficients		Standardized Coefficients		
		B	Std. Error	Beta	t	Sig.
1	(Constant)	-7.300	5.186		-1.407	.165
	distance	-.814	.637	-.305	-1.277	.207

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	comrelig	-1.515	10.292	-.073	-.147	.884
	touristincome_dest	2.196	.427	.372	5.149	.000
	ge_dest	.314	.160	.075	1.961	.055
	pl_dest	-.314	.132	-.095	-2.383	.021
	ge_orig	-.784	.201	-.696	-3.899	.000
	pl_orig	.692	.124	.401	5.593	.000
	touristincome_orig	.892	.340	.934	2.623	.011

a. Dependent Variable: lntou

1) Distance

The distance is statistically insignificant. We accept Ho and reject Ha. There is no relationship between distance and tourist arrivals to Argentina.

Distance is an indicator that expresses the time and money one spends on travel. Bolivia, Brazil and Chile are neighbors of Argentina. For tourist of these origins, it is not a factor that has impacts on their travel plans.

2) Common religions

It is statistically insignificant, meaning that there is no relationship between common religions and tourist arrivals to Argentina.

Bolivia, Brazil, Chile, and Argentina share a lot of things in common, including religions, because of historic, cultural and geographic reasons. When they travel in these countries, they don't feel like outsiders.

3) Tourist income in destination (touristincome_dest)

The tourist income level in destination is statistically significant at 0.01 level. We accept Ha and reject Ho, meaning there is a positive relationship between tourist income level in destination and tourist arrivals. 1% increase of the tourist income level in destination tends to increase tourist arrivals by 2.1%.

Common sense tells that a higher income level in destination will lead to higher price of goods and services. This positive relationship from the World Bank observation data also reveals conversely that more tourist arrivals will bring local income higher.

4) Government effectiveness in destination (ge_dest)

The government effectiveness in destination is statistically significant at 0.1 level. We accept Ha and reject Ho, meaning there is a positive relationship between government effectiveness in destination and tourist arrivals. If 1% increase of the government effectiveness in destination, it tends to increase tourist arrivals by 0.3%.

A higher government effectiveness usually means better environment for travelers in terms of public service, security, and so so on, which will surely improve tourist experience.

5) Political stability in destination (pl_dest)

The political stability in destination is statistically significant at 0.05 level. We accept Ha and reject Ho, meaning there is a negative relationship between political stability in destination and tourist arrivals. If 1% increase of the political stability in destination, it leads to decrease tourist arrivals by 0.3%.

Theoretically, a high political stability will encourage tourist to travel more often. The observation data indicates otherwise probably because the tourism business happened to decrease for some reasons, such as economic recession, when the political stability in Argentina had been increasing slightly in the period of 1995-2016. Some other data is needed for further analysis.

6) Government effectiveness in origin countries (ge_orig)

The government effectiveness in origin countries is statistically significant at 0.01 level. We accept Ha and reject Ho, meaning there is a negative relationship between government effectiveness

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in origin countries and tourist arrivals. If 1% increase of government effectiveness in origin countries, it leads to decrease tourist arrivals by 0.7%.

Likewise with the 5th variable analysis, a high government effectiveness in origin countries is supposed to promote tourism business, but tourism is a fragile industry. Every now and then, recession, financial issues can affect tourism business apart from normal case.

7) Political stability in origins (pl_orig)

The political stability in origins is statistically significant at 0.01 level. We accept Ha and reject Ho, meaning there is a positive relationship between political stability in origins and tourist arrivals. If 1% increase of political stability in origins, it leads to increase tourist arrivals by 0.6%.

In many other places, a high political stability encourages tourist to travel more often. This observation data proves it.

8) Tourist income level in origin countries (touristincome_orig)

The tourist income level in origin countries is statistically significant at 0.05 level. We accept Ha and reject Ho, meaning there is a positive relationship between tourist income level in origin countries and tourist arrivals. If 1% increase of political stability in origins, it leads to increase tourist arrivals by 0.8%.

Obviously, when people have a higher income, they intend to travel more.

Conclusions

This article is the first empirical research that explores the determinants of international tourist arrivals to Argentina from Bolivia, Brazil and Chile based on the observation data of the World Bank in the period of 1995–2016. Linear regression method is applied to analyze the impacts of distance, common religions, tourist income of origin and destination, government effectiveness and political stability of origin and destination and their impacts on tourist arrivals to Argentina.

The results show that distance does not affect visitors from the origins since they are so close to each other. Common religions do not have any significant impacts due to similar traditions and cultures between origins and destination. Tourist income from both origin and destination seem to play an important role in tourism development in this region. Government effectiveness in destination will encourage visitors to travel more since it provides decent public services, and political stability in origin also have a positive effect. While political stability in destination and government effectiveness in origin seem to have negative effects on tourist arrivals to Argentina from the origin countries according to the data, suggesting different results probably because of some other factors like recession or financial issues, which remains as a gap for future studies.

The findings of this study hopeful can give useful assumptions to tourism sectors and policy maker in the destination and origin countries.

The study also calls for future researchers to fill this gap and limitations. For example, this paper relies on historical data, which may not fully predict future trends. And the observation data does not cover enough variables like price of goods and services in destination, which may not fully explain the determinants.

References

1. Gómez, R. E., & Cossi, C. A. (2015). Social figurations and tourist displacement in Argentina.
2. Muhammad, A., & Andrews, D. (2008). Determining tourist arrivals in Uganda: The impact of distance, trade and origin-specific factors. *African Journal of Accounting, Economics, Finance and Banking Research*, *2*(2).
3. Park, C., Kim, Y. R., & Yeon, J. (2023). Stronger together: International tourists “spillover” into close countries. Tourism Economics, 29(5), 1204-1224.
4. Romero, C. A., Mastronardi, L. J., Tarelli, J. P., & Haslop, F. (2020). The regional impact of tourism when data is scarce. An application to the Province of Salta. *Tourism Planning & Development*, *17*(4), 441-457.
5. Shao, Y., Huang, S. S., Wang, Y., Li, Z., & Luo, M. (2020). Evolution of international tourist flows from 1995 to 2018: A network analysis perspective. Tourism Management Perspectives, 36, 100752.
6. Velasquez, M. E. B., & Oh, J. (2013). What determines international tourist arrivals to Peru? A gravity approach. *International Area Studies Review*, *16*(4), 357-369.

 doi:10.20944/preprints202412.1469.v1