DETERMINANTS OF LAWANG SEWU TOURISM DEMAND IN SEMARANG CITY, INDONESIA

Karnowahadi, Politeknik Negeri Semarang
Endang Sulistyani, Politeknik Negeri Semarang
Suryadi Poerbo, Politeknik Negeri Semarang
Dody Setyadi, Politeknik Negeri Semarang

ABSTRACT

This article discusses the determinants of the Lawang Sewu tourist destination located in Semarang City, Central Java Province, Indonesia. The object of this research is a tourist destination in the form of a cultural heritage of buildings that are more than 50 years old. This research estimates the impact of willingness to pay, willingness to pay for other tourist destinations, visitor income, travel costs, and visitor perceptions on the demand for Lawang Sewu tourism. The demand function of Lawang Sewu Semarang is negatively influenced by the willingness to pay, the willingness to pay of other tourist destinations, and travel costs. Visitor income anf visitor perceptions have a positive influence on the demand for Lawang Sewu tourist destinations. Other tourist objects around Lawang Sewu Semarang are complementary tourist destinations of Lawang Sewu.

Keywords: Tourism demand, Tourist destinations, Travel costs, Willingness to pay, Semarang, Indonesia.

INTRODUCTION

One of Indonesia's development assets is its natural and cultural wealth and diversity. With the diversity of natural resources owned by the Indonesian people such as natural potential, flora, fauna, natural beauty and the form of an archipelago which is rich in customs, culture and language so that it has an attraction to be visited by both domestic and foreign tourists (Karnowahadi et al., 2015). The city of Semarang has various tourist destinations, both heritage tourism, religious tourism, nature tourism, culinary tours and other tours. The object of this research is a heritage tourist attraction in the City of Lawang Sewu Semarang. To reach Lawang Sewu tourism object in Semarang City, visitors can take advantage of land, sea and air transportation. Semarang City has a Bus Terminal, Train Station, Airport, and Port that is connected to all cities in Indonesia as well as access to foreign countries. Lawang Sewu tourism object is located in the center of Semarang City which is easily accessible by visitors. The tourism object of Lawang Sewu is also close to the center of Semarang's typical souvenirs, the administrative center of Semarang City, and close to various centers of Semarang City.

The number of tourists visiting Semarang City always increases from year to year. The average number of tourists in Semarang City ranges from 2 million to 2.5 million tourists per year (BPS, 2017). Lawang Sewu visitors can enjoy morning to night tours and even special midnight tours. A special midnight tour is reserved for visitors. As for the midnight tour, a special fee is charged for assistance. However, these costs have not been able to cover the cost of maintaining the Lawang Sewu tourism object which is one of the cultural heritages of the

Citation Information: Karnowahadi, Sulistyani, E., Poerbo, S., & Setyadi, D. (2021). Determinants of lawang sewu tourism demand in semarang city, Indonesia. *Academy of Entrepreneurship Journal (AEJ), 27*(5), 1-6.

archipelago. Hence, this paper aims to analyse the willingness to pay for Lawang Sewu tourism objects, willingness to pay for other destinations, visitor income, travel cost, and visitor perceptions affect to Lawang Sewu tourism demand. Moreover, it also aims to analyze the effect of willingness to pay for Lawang Sewu tourism objects, willingness to pay for other destinations, visitor income, travel cost, and visitor perceptions on Lawang Sewu tourism demand.

LITERATURE REVIEW AND HYPOTHESES

Demand for a product is strongly influenced by product prices, prices for other goods, income, tastes, and other factors (Pindyck & Rubinfeld, 2005). Likewise, tourism demand is also influenced by several of these factors. Tourism is a source of regional income with great potential to be developed. Tourism is a human activity that can increase the freshness of thoughts and feelings in such a way that it can increase humans in creating and innovating.

The attraction of a tourist destination is a non-market item. Various approaches in the economic valuation of a tourist destination are needed, including the travel cost approach, the benefit value approach, the willingness to pay approach, and so on (Carballo et al., 2015; Dharmaratne & Brathwaite, 1998; Choi et al., 2010; Hakim et al., 2011). The travel cost approach is carried out by using information about the amount of money spent and time spent to reach tourist destinations (Igunawati & Hayati, 2010). According to Hufschmidt et al. (1983) the theoretical concept of the travel cost approach assesses the benefits that consumers get in consuming a product even though they get the product for free. For tourism products, tourists who come from various regions to spend their time at tourist attractions will of course pay travel costs to reach these recreational areas. The farther someone comes to take advantage of these tourist attractions, the less expectations of users or enthusiasts of these tourist attractions. By knowing the pattern of tourist expenditure, it can be analyzed how much value tourists give to the tourist destination environment. The basic assumption used in the travel cost approach is that the use of each tourist for tourism activities can be separated (Driml, 2002).

The objective of this research is analyzing the effect of willingness to pay for Lawang Sewu tourism objects, willingness to pay for other destinations, visitor income, travel cost, and visitor perceptions affect to Lawang Sewu tourism demand on Lawang Sewu tourism demand. Based on the description and formulation of the problem, the hypotheses of this research are:

H_1: *There is a negative influence between Willingness to Pay (WTP) of Lawang Sewu on Lawang Sewu tourism demand.*

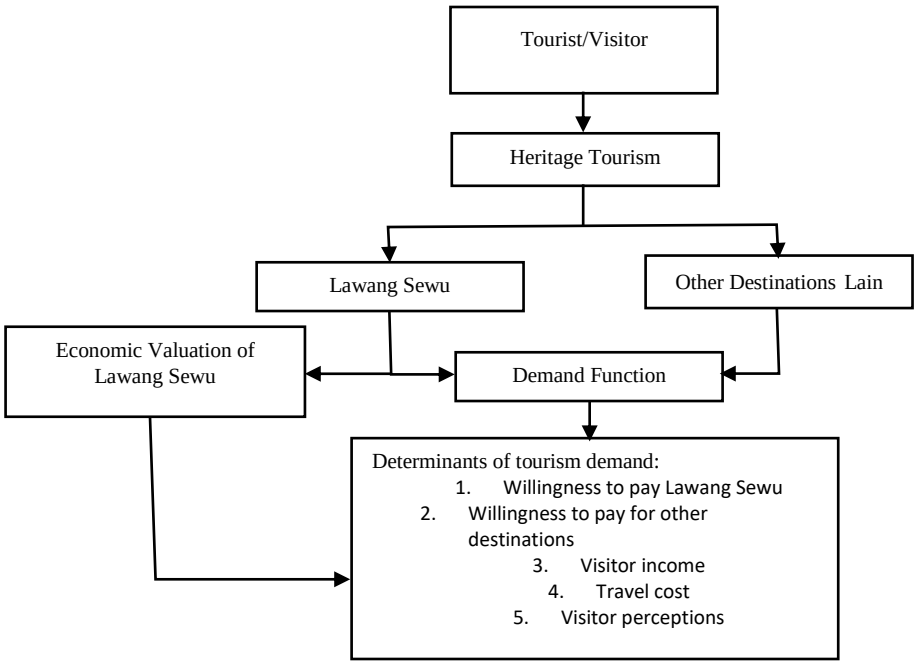
H_2: *There is an influence between Willingness to Pay (WTP) to other destinations on Lawang Sewu tourism demand.*

H_3: *There is an influence between visitor incomes on Lawang Sewu tourism demand.*

H_4: *There is an influence between travel costs on Lawang Sewu tourism demand.*

H_5: *There is an influence between visitor perceptions on Lawang Sewu tourism demand.*

Citation Information: Karnowahadi, Sulistyani, E., Poerbo, S., & Setyadi, D. (2021). Determinants of lawang sewu tourism demand in semarang city, Indonesia. *Academy of Entrepreneurship Journal (AEJ), 27*(5), 1-6.



Source : McFadden (2001), Tuan (2007), Varahrami (2012), Chea (2013)

FIGURE 1
RESEARCH FRAMEWORK

RESEARCH METHODS

The population of this research is the average number of visitors to the Lawang Sewu Semarang area during the last three years. While the number of samples taken is based on the average of previous studies which ranged from 100 to 300 respondents (Chea, 2013). In this research, the number of samples determined by the researcher was 125 respondents. This amount was obtained from the Lawang Sewu area (Figure 1).

The types of data taken in this research are primary data and secondary data. Primary data is in the form of interview data and questionnaire results. Meanwhile, secondary data is in the form of various reports on tourist destinations in the Semarang area and its surroundings. Sampling was conducted using purposive sampling technique, namely by selecting respondents aged more than 16 years. The selection of respondents was based on the assumption that visitors aged more than 16 years were able to make decisions about traveling.

The method used in this research is the Single Bounded Contingent Valuation (CVM) Method and Multiple Linear Regression. The two methods are complementary. Detail the models used in this research are:

$$JKW = b_0 + b_1LogWTP + b_2LogWTPowl + b_3LogPDPT + b_4LogBP + b_5Persp + e$$

Explanations : JKW=The number of visitor to Lawang Sewu Semarang; b_0=Constant b_i=Coefficient; WTP=Willingness to Pay; WTPowl = Willingness to Pay other destinations; PDPT =Visitor income; BP=Travel Cost; Persp= Visitor Perceptions.

Citation Information: Karnowahadi, Sulistyani, E., Poerbo, S., & Setyadi, D. (2021). Determinants of lawang sewu tourism demand in semarang city, Indonesia. *Academy of Entrepreneurship Journal (AEJ), 27*(5), 1-6.

RESULTS

Statistical analysis was performed using statistical data processing software (SPSS under Windows). The output generated from multiple regression analysis includes the correlation value, the value of determination, the results of the F test analysis, and the results of the t test analysis. The results of the correlation and determination analysis are presented in Table 1.

Table 1
RESULTS OF CORRELATION AND DETERMINATION ANALYSIS

R	R Square	Adjusted R Square	Std. Error of the Estimate
656a	430	400	613
Predictors (Constant), LogWTP, LogWTPowl, LogPDPT, LogBP, LogPersp			

Table 1 shows that willingness to pay for Lawang Sewu tourism destination, willingness to pay for other tourism destination, visitor income, travel costs, and visitor perceptions have a relationship with Lawang Sewu tourism demand. The correlation is indicated by an R value of 0.656. The closeness of the relationship of all independent variables includes willingness to pay for Lawang Sewu tourism destination, willingness to pay for other destinations, visitor income, travel costs, and visitor perceptions of the dependent variable of 0.400. The coefficient of determination is indicated by the value of Adjusted R Square.

Table 2 shows the results of the analysis of variance (ANOVA) which states that the results of the F test are significant. This is indicated by the magnitude of the significance value that is smaller than 0.05.

Table 2
RESULTS OF ANOVA

Model	Sum of Squares	df	Mean Square	F	Sig.
Regression	60.272	11	5.479	14.598	.000a
Residual	79.950	213	.375		
Total	140.222	224			
a. Predictors: (Constant), LogWTP, LogWTPowl, LogPDPT, LogBP, LogPersp; b. Dependent Variable: JKW					

The F value of the results of the multiple regression analysis is shown in Table 2. The F value is 14.598 with a significance level of 0.000. Because the significance value is less than 0.05, the F test value is significant. The variation of all independent variables has a significant effect on the variation in the dependent variable. If the WTP of Lawang Sewu tourism object, the WTP of other destinations, visitor income, travel costs, and visitor perceptions change together, the demand for Lawang Sewu tourism will also change.

The relationship with the determination value (0.400), the variation of all independent variables has an influence on the variation of the dependent variable by 40%. This means that there are 60% of the factors that affect changes in tourism demand in Lawang Sewu which are not analyzed in this research.

To determine the effect partially, each independent variable which includes Lawang Sewu tourism destination, willingness to pay for other destinations, visitor income, travel costs, and visitor perceptions of the dependent variable, namely Lawang Sewu tourism demand, will be explained in Table 3. From Table 3, it is known value of the influence, the direction of the influence and the significance of the influence, so that it can be explained whether the model

Citation Information: Karnowahadi, Sulistyani, E., Poerbo, S., & Setyadi, D. (2021). Determinants of lawang sewu tourism demand in semarang city, Indonesia. *Academy of Entrepreneurship Journal (AEJ), 27*(5), 1-6.

used is really a good model to predict the influence of the variable WTP Lawang Sewu, WTP of other destinations, visitor income, travel costs, and visitor perceptions of the demand for Lawang Sewu tourism.

Table 3
RESULTS OF REGRESSION ANALYSIS

Model	B Unstandardized	Std. Error	Beta	t	Sig.
(Constant)	17.067	28.362		0.602	0.548
LogWTP	-1.820	0.435	-0.365	-4.185	0.000
LogWTPowl	-1.607	0.370	-0.309	-4.346	0.000
LogPDPT	1.615	0.206	0.424	7.830	0.000
LogBP	-1.128	5.605	-0.147	-0.201	0.841
LogPERSP	1.913	2.459	0.051	0.778	0.437

From Table 3, it can be seen that the partial influence of each independent variable on Lawang Sewu tourism demand as the dependent variable can be explained that willingnes to pay in order to preserve the existence of Lawang Sewu has a significant negative effect on alpha 5% on Lawang Sewu tourism demand. This is indicated by the regression coefficient value on this variable which is -1,820, which means that if the willingness to pay increases by 1%, it will result in a decrease in the number of tourist visits by 1,820% (ceteris paribus).

The variable willingnes to pay other destinations has a significant negative effect on alpha 5% for Lawang Sewu tourism demand. This is indicated by the regression coefficient value on this variable of -1.607, which means that if the willingness to pay increases by 1% it will result in a decrease in the number of tourist visits by 1.607% (ceteris paribus).

The visitor income variable has a significant positive effect on alpha 5% on Lawang Sewu tourism demand. This is indicated by the value of the regression coefficient on this variable which is 1.615 which means that if the visitor's income increases by 1% it will result in an increase in Lawang Sewu tourism demand by 1.615% (ceteris paribus).

The travel cost variable has a negative and insignificant effect on alpha 5% on Lawang Sewu tourism demand. This is indicated by the value of the regression coefficient on this variable equal to -1,128. The variation in travel costs has no significant effect on Lawang Sewu tourism demand. This is indicated by the significance value of 0.841 (more than 0.05).

The visitor perceptions variable has an insignificant positive effect on alpha 5% on Lawang Sewu tourism demand. This is indicated by the value of the regression coefficient on this variable which is 1.913. The significance value of the visitor perceptions variable is 0.841 (more than 0.05). From the results of multiple regression analysis, it is obtained the equation model of the Lawang Sewu tourism demand function as follows:

JKW=17.067–1.820LogWTP–1.607LogWTPowl+1.615LogPDPT–1.128LogBP+1.913LogPersp

CONCLUSION

The results of multiple regression analysis state that there are several variables that have a negative influence on Lawang Sewu tourism demand, namely the WTP of Lawang Sewu, the WTP other destinations, and the travel cost variable. The visitor income variable and the visitor perceptions variable have a positive influence on Lawang Sewu tourism demand. The variable that has the highest contribution to the variation of Lawang Sewu tourism demand is the WTP of

Citation Information: Karnowahadi, Sulistyani, E., Poerbo, S., & Setyadi, D. (2021). Determinants of lawang sewu tourism demand in semarang city, Indonesia. *Academy of Entrepreneurship Journal (AEJ), 27*(5), 1-6.

Lawang Sewu variable. Meanwhile, the second contribution comes from the visitor income variable. The third position is given by the willingness to pay other destinations. The travel cost variable and visitor perceptions variable have an influence on Lawang Sewu tourism demand, but not significantly.

The results of the analysis in this research it is stated that other tourist destinations around Lawang Sewu are complementary tourist destinations. This has strategic implications for managers of tourist destinations around the Semarang city, namely policies for developing tourist destinations that support each other between tourist destinations. The outcome of this research is the need to develop a network of tourist destinations through various policies and joint activities. These policies include the need to build bus transportation for visitor services on a fixed schedule for each tourist destination.

ACKNOWLEDGEMENT

Thank you to the Business Administration Department, Politeknik Negeri Semarang for providing the support for this paper.

REFERENCES

Carballo, M.M., Araña, J.E., León, C.J., & Moreno-Gil, S. (2015). Economic valuation of tourism destination image. *Tourism Economics, 21*(4), 741-759.

Chea, C.C. (2013). The Benefits of Conserving Living Heritage in Melaka City, Melaka (Doctoral dissertation, Dissertation. Economic Faculty of University Putra Malaysia).

Choi, A.S., Ritchie, B.W., Papandrea, F., & Bennett, J. (2010). Economic valuation of cultural heritage sites: A choice modeling approach. *Tourism management, 31*(2), 213-220.

Dharmaratne, G.S., & Brathwaite, A.E. (1998). Economic valuation of the coastline for tourism in Barbados. *Journal of Travel Research, 37*(2), 138-144.

Driml, S. (2002). Travel cost analysis of recreation value in the Wet Tropics World Heritage Area. *Economic Analysis and Policy*, *32*(2), 11-26.

Hakim, A.R., Subanti, S., & Tambunan, M. (2011). Economic valuation of nature-based tourism object in Rawapening, Indonesia: An application of travel cost and contingent valuation method. *Journal of Sustainable Development, 4*(2), 91.

Hufschmidt, M.M., James, D.E., Meister, A.D., Bower, B.T., & Dixon, J.A. (1983). *Environment, natural systems, and development: an economic valuation guide.*

Igunawati, D., & Hayati, b. (2010). *Analisis Permintaan Objek Wisata Tirta Waduk Cacaban, Kabupatentegal (Doctoral dissertation, universitas diponegoro).*

Karnowahadi, K., Susilowati, I., & Santosa, P.B. (2015, September). Economic Valuation of Cultural Heritage in Surakarta City, Central Java-Indonesia. In Proceedings of International Academic Conferences (No. 2704849). *International Institute of Social and Economic Sciences.*

McFadden, D. (2001). Economic choices. *American Economic Review, 91*(3), 351-378.

Pindyck, R.S., & Rubinfeld, D.L. (2005). *Microeconomics 6th edn. New Jersey: Prentice-Hall/Pearson Education*.

Tengah, BPS Jawa. "Jawa Tengah Dalam Angka." *Badan Pusat Statistik. Semarang* (2017).

Tuan, T.H., & Navrud, S. (2007). Valuing cultural heritage in developing countries: comparing and pooling contingent valuation and choice modelling estimates. *Environmental and Resource Economics*, *38*(1), 51-69.

Varahrami, V. (2012). Valuing of cultural heritage in Iran, case study: Kakh Sadabad. *Global Journal of Human-Social Science Research, 12*(9-D).

Citation Information: Karnowahadi, Sulistyani, E., Poerbo, S., & Setyadi, D. (2021). Determinants of lawang sewu tourism demand in semarang city, Indonesia. *Academy of Entrepreneurship Journal (AEJ), 27*(5), 1-6.