



The Influence of Inflation Rates on International Tourist Arrivals via Air Gateways in Indonesia During 2017-2024

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Abstract. This study aims to analyze the effect of the inflation rate on the number of Wismanto Indonesia Via Air Gateway. The data used covers the period from January 2017 to September 2024, focusing on the relationship between inflation as a macroeconomic factor and the number of tourists visiting Indonesia. The data analysis used in this study is regression analysis, supported by descriptive analysis of each variable. The regression analysis results show that the inflation rate has a significant positive effect on the number of international tourist arrivals. The regression coefficient of 156,266 indicates that every 1% increase in inflation has the potential to increase the number of international tourists by 156,266 individuals. The significance value of 0.000 indicates that this relationship is statistically significant at the 95% confidence level. These findings provide an understanding that although inflation is often associated with rising prices of goods and services, in the context of Indonesian tourism, inflation can be linked to other factors, such as exchange rate fluctuations, which increase Indonesia's appeal as a tourist destination. This study recommends that the government and stakeholders in the tourism sector consider the impact of inflation in tourism development strategies, while maintaining economic stability and international competitiveness. Further studies are recommended to explore other mediating variables, such as exchange rates and tourism promotion policies, in order to understand this relationship more comprehensively.

Keywords: inflation, international tourists, regression, air transportation, Indonesian tourism.

1. INTRODUCTION

The tourism sector is one of the main driving forces of the Indonesian economy. Its contribution to Gross Domestic Product (GDP) and job creation makes tourism a strategic sector in national development. The arrival of foreign tourists through air ports (wisman), such as international airports, serves as an important indicator reflecting Indonesia's attractiveness as a destination in the eyes of the world. However, global and domestic economic dynamics, including inflation rates, can potentially affect the number of tourists visiting.

Inflation, which reflects a general increase in prices of goods and services, has both direct and indirect impacts on the tourism sector. Domestically, high inflation can increase prices for goods and services, including air transport, accommodation, and other tourism services, thereby reducing Indonesia's tourism competitiveness. Meanwhile, globally, inflation in tourists' home countries can also affect their purchasing power, ultimately influencing their decision to travel abroad.

The period from 2017 to 2024 is particularly interesting for research as it encompasses several significant phases in Indonesia's economy. This includes a stable economic growth period (2017–2019), the impact of the COVID-19 pandemic that struck

globally during 2020–2021, and efforts for economic and tourism recovery from 2022 to 2024. The pandemic has had a substantial impact on international mobility, including a drastic decline in foreign tourist numbers. Additionally, inflation dynamics during this period—resulting from global factors like geopolitical tensions as well as domestic factors—pose additional challenges for the tourism sector.

Several studies indicate a negative relationship between foreign tourist arrivals and various macroeconomic indicators such as inflation rates, exchange rates, and interest rates. For instance, research by Arief and Rahmawati (2018) shows that inflation negatively correlates with tourist arrivals because rising prices for goods and services at destinations tend to diminish tourism competitiveness during the period from 2010 to 2017.

This study aims to analyze the effect of inflation on the number of foreign tourists arriving through air ports in Indonesia during the period from 2017 to 2024. By utilizing data from the Central Statistics Agency (BPS), Bank Indonesia (BI), and other relevant institutions, this research is expected to provide a deeper understanding of the relationship between inflation and the tourism sector. The findings are anticipated to serve as a reference for government officials and stakeholders in formulating effective economic and tourism policies to maintain Indonesia's appeal as a global tourist destination.

2. LITERATURE REVIEW

A. Inflation

1) Definition of Inflation

Inflation, according to Lenher, is a condition where there is excess demand (excess demand) for goods in the economy as a whole (Gunawan, 2003). This excess demand can be interpreted as an excess level of spending for final commodities compared to the maximum output level that can be achieved in the long term with certain production resources.

According to (Putong, 2013), inflation is the general rise in commodity prices caused by the mismatch between the commodity procurement system program (production, pricing, money printing, and so on) and the level of income owned by society. According to (Sukirno, 2015), inflation can be defined as a process of rising prices occurring in an economy.

2) Factor Causing Inflation

The issue of rising prices occurring in various countries is caused by many factors. According to (Sukirno, 2015), the factors causing inflation are as follows :

- a. The level of aggregate spending exceeding companies' capacity to produce goods and services
- b. Jobs in various economic activities demanding wage increases
- c. The rise in prices of imported goods
- d. The excessive increase in the money supply not followed by an increase in production and supply of goods
- e. Political and economic turmoil due to irresponsible governance
- f. Inflation symptoms represent the occurrence of excess demand (excess demand) at the macro level when viewed from economic theory, so it can be concluded that all or almost all industries in the economy experience excess demand (Rahardja, 2008).

3) Policies to Address Inflation

Inflation can cause several adverse effects on individuals, society, and economic activities. Several forms of government policy are used to control the country's economy. According to (Sukirno, 2015), the government policies to address inflation are as follows:

a. Fiscal Policy

The policy carried out by the government to address inflation is by increasing taxes and reducing government spending.

b. Monetary Policy

The policy carried out by the government to address inflation by reducing the money supply to increase interest rates. This step is expected to lower investments and subsequently reduce aggregate spending, thus reducing inflation.

c. Supply-side Policy

The policy implemented by the government to address inflation through income policies aims to control demands for wage increases, thereby preventing excessive income levels. Another aspect of this policy focuses on enhancing workers' motivation to work, which is achieved by reducing the income of high-income groups in society. Emphasis is also placed on encouraging entrepreneurs to improve the efficiency of their production activities. In this regard, the government

provides incentives to entrepreneurs who innovate to improve the quality of the goods they produce.

4) Inflation Indicators

According to (Sukirno, 2015), the most commonly used inflation indicators are :

a. Consumer Price Index (CPI)

The CPI is used to measure changes in the price levels of a group of goods and services regularly purchased by households, measured based on changes in the prices of specific goods and services over time considered representative of the consumption patterns of society.

b. Producer Price Index (PPI)

c. The PPI is an early indicator because it reflects the price of goods at the producer level before reaching consumers. This indicator often serves as an early warning of inflation because changes in prices at the producer level usually affect the prices of goods at the consumer level.

d. Essential Goods Price Indicators

Essential goods prices represent changes in the prices of essential goods such as food and energy, which significantly contribute to inflation, especially because the consumption of these goods dominates household expenditures.

B. Foreign Tourists (Wisman)

1) Definition of Foreign Tourists

Foreign tourists are individuals traveling to another country with the purpose of visiting, not for engaging in paid work in the visited country, and staying in that country for a year or less. Foreign tourists can be identified by their travel status and the type of currency they spend. The number of foreign tourist visits can be determined by the number of foreign tourists directly entering from abroad through major entry points, whether by air or sea routes (Andriansyah, 2008).

According to (Yoeti O. A., 2008), foreign tourists are individuals traveling outside their country for specific purposes, such as vacation, business, or other reasons, with a temporary stay duration, not for the purpose of settling or seeking permanent work in the destination country. In the context of international tourism, foreign tourists contribute to the country's foreign exchange earnings through the consumption of goods and services during their visits.

The longer tourists stay in a tourist destination area, the more money they spend in that area. The consumptive activities of foreign tourists will increase revenue

in the tourism sector of an area. Therefore, the higher the flow of tourist visits, the greater the tourism sector revenue in the area (W, 2016).

According to (Trisnadi, 1997), the factors influencing the number of foreign tourist visits are divided into two groups, namely:

- a. External Factors: Security issues, health, and global political stability
- b. Market Strength Factors: Demand, supply, product distribution, and tourism services.

Efforts that need to be made to meet the needs and desires of foreign tourists include : (Isdarmanto, 2017)

- a. Clear and accurate information, promotion, and marketing.
- b. Facilitating the entry of foreign tourists by easing visa requirements, visa-on-arrival facilities, and sufficient gateways (multi-gate).
- c. Improving accommodation, accessibility, amenities, and IT networking infrastructure.
- d. Enhancing security and comfort.
- e. Making tourists happy to stay by providing facilities that match their home country's conditions.
- f. Increasing the number of attractions that are appealing and liked by tourists.

2) Indicators

According (Yoeti O. A., 2016) the number of foreign tourist visits is one of the main indicators of the success of a country's tourism sector. Measurements are made by considering several aspects, namely:

a. Immigration Data

Includes official records regarding the inflow and outflow of tourists through a country's entry points. Tourist inflow and outflow records are processed based on data from immigration offices at major entry gates, including international airports.

b. Air Gate

Represents the dominant mode of transportation used by foreign tourists, especially in countries with advanced tourism infrastructure. Most foreign tourists enter through air gates, so data obtained from flight records is the primary source.

c. Visitation Patterns

Represents the behavior and preferences of tourists during their travel to a destination, identifying the main goals of tourists to provide an overview of visitation patterns.

3. METHODS

This study uses data on the inflation rate and the number of WismanVia Air Gateway from January 2017 to September 2024. The data collected is time series data with a monthly unit of measurement. The data was obtained from the website of the Central Statistics Agency (BPS). Air transportation entry points include international airports such as Ahmad Yani, Adi Sucipto, Lombok International Airport, Husein Sastranegara, Hasanuddin, Juanda, Kualanamu, Minangkabau, Ngurah Rai, Sam Ratulangi, Soekarno-Hatta, Sultan Syarif Kasim II, Supadio, Sultan Badaruddin II, Sultan Iskandar Muda, and other air entry points (Central Statistics Agency, 2024). In this study, a descriptive analysis will be conducted to understand how inflation affects the number of Wismanto Indonesia Via Air Gateway. Additionally, a linear regression analysis will be performed to determine the extent of the contribution of the inflation rate to the number of Wismanto Indonesia Via Air Gateway.

4. RESULTS

The number of Wisman is one of the key indicators of success in the tourism sector. One factor that is believed to influence the number of Wismanto Indonesia is the inflation rate. Inflation is an important macroeconomic indicator for economists in analyzing the economic conditions of a country. Inflation has a significant impact on the success of macroeconomic policy objectives, such as economic growth, employment opportunities, and income distribution, including income from the tourism sector. Therefore, it is important to understand how the inflation rate in Indonesia affects the number of WismanVia Air Gateway.

The data used in this study consists of monthly inflation rates and the number of WismanVia Air Gateway in Indonesia, from January 2017 to September 2024. This data is secondary, obtained from Bank Indonesia. The variable acting as the response variable is the number of Wismanto Indonesia Via Air Gateway, while the predictor variable in this study is the inflation rate. The following is a descriptive analysis of the inflation data and the number of Wismanto Indonesia Via Air Gateway from January 2017 to December 2024, along with the variables that influence it.

Table 1. Descriptive Statistics of Inflation Rate and Number of Wisman to Indonesia Via Air Gateway (Period of January 2017 – September 2024)

Variable	Statistics					
	Mean	Median	Variance	Std Deviation	Min	Max
Inflation Rate	3.03	3.07	1.23	1.11	1.32	5.95
Number of International Tourist Arrivals	536391	704006	1288360	358937	506	1073385

Based on Table 1, it is known that the average inflation rate in Indonesia from January 2017 to August 2024 is 3.03% with a variation of 1.23%. The number of Wisman to Indonesia during the period from 2017 to September 2024 averages 536,391 people, with a variation of 1,288,360 people. The highest inflation rate occurred in September 2022, at 5.95%, while the lowest inflation rate occurred in August 2020, at 1.32%. The highest number of Wisman to Indonesia was 1,073,385 people, which occurred in July 2018, while the lowest number of Wisman was 506 people, which occurred in May 2020, during the COVID-19 pandemic.

Table 2. Correlation Analysis between the Inflation Rate and the Number of Wisman to Indonesia Via Air Gateway

Relationship Between Variables	Correlation Coefficient	Sig.
Inflation Rate - Number of Wisman	0.482	0.000
*significance at the 5% level		

Based on Table 2, it is known that the correlation coefficient between the inflation rate and the number of Wisman Via Air Gateway is 0.482, with a significance value of 0.000. This means that the inflation rate has a positive and significant relationship with the number of Wisman to Indonesia. An increase in the inflation rate will lead to an increase in the number of Wisman to Indonesia Via Air Gateway.

Table 3. Regression Analysis between the Inflation Rate and the Number of Wisman to Indonesia Via Air Gateway

Independent Variable	Dependent Variable	Regression Coefficient	Sig.
Constant		62074	0.522
Inflation Rate	Number of Wisman	156266	0.000*
*significance at the 5% level			

Table 3 shows the results of the regression analysis between the inflation rate and the number of Wisman to Indonesia through air transportation, with a regression coefficient of 156,266 and a significance value of 0.000. This means that for every 1% increase in inflation, the number of Wisman in Indonesia increases by 156,266 individuals.

5. DISCUSSION

The results of the regression analysis show that there is a significant relationship between the inflation rate and the number of Wisman to Indonesia via Air Gateway. The regression coefficient of 156,266 with a significance value of 0.000 indicates that the inflation rate has a positive effect on the number of Wisman. This means that for every 1% increase in inflation, the number of Wisman in Indonesia increases by 156,266 individuals.

Statistically, the significance value (p-value) of 0.000, which is smaller than the commonly used significance level ($\alpha = 0.05$), indicates that the relationship between the inflation rate and the number of Wisman is significant. Therefore, the null hypothesis (H_0), which states that there is no effect of inflation on the number of tourists, can be rejected. However, these results provide an interesting interpretation and require a deeper understanding of this phenomenon. In general, rising inflation is often associated with higher prices for goods and services, which may reduce the attractiveness of a tourist destination for international visitors. However, in this context, the positive relationship found may be due to several factors, including: Exchange rate effect: Inflation in Indonesia may coincide with the depreciation of the Rupiah against foreign currencies, making Indonesia a more affordable destination for foreign tourists, thereby increasing its appeal. Promotion policies and economic recovery: During the study period (2017–2024), there were significant efforts by the Indonesian government to boost tourism, such as through tourism promotion programs and post-pandemic recovery initiatives. These efforts could mitigate the impact of inflation and attract more tourists. Tourism demand: International tourists visiting Indonesia may belong to market segments that are less sensitive to price changes, such as tourists from developed countries with higher purchasing power.

These results suggest that inflation can affect Indonesia's tourism sector in a complex way. The government and stakeholders in the tourism sector need to consider more holistic strategies to maintain the appeal of tourist destinations, especially by maintaining the stability of goods and services prices and taking advantage of opportunities presented by fluctuations in foreign exchange rates

6. CONCLUSION

Based on the results of the study, it can be concluded that there is a significant relationship between the inflation rate and the number of Wisman to Indonesia via air transportation. The regression coefficient of 156,266 with a significance level of 0.000 indicates that inflation has a positive effect on the number of international tourist arrivals. This means that every 1% increase in the inflation rate in Indonesia can drive an increase of 156,266 international tourists. These findings suggest that inflation in Indonesia, within the context of this study, does not always have a negative impact on the tourism sector. One possible explanation is the positive effect of the depreciation of the Rupiah against foreign currencies during the study period, making Indonesia a more affordable destination for foreign tourists. Additionally, the impact of tourism promotion programs and post-pandemic recovery efforts may have also played a role in attracting more tourists.

However, even though inflation has a positive relationship with tourist arrivals, efforts are still needed to maintain economic stability and the competitiveness of Indonesia's tourism sector. The government and stakeholders in the tourism industry need to consider other factors, such as exchange rates, the prices of goods and services, and infrastructure, to ensure sustainable tourism growth. Further research is needed to identify other factors that mediate the relationship between inflation and the number of tourists, such as exchange rates, tourists' income levels in their countries of origin, or tourism promotion policies. The government must maintain inflation stability and implement tourism policies that support Indonesia's competitiveness as a premier tourist destination.

7. LIMITATION.

Although the results of this study show a positive and significant relationship, further research is needed to understand the causal mechanisms. Other variables, such as exchange rates, tourism promotion, and the income levels of tourists in their countries of origin, should also be considered as mediating or moderating factors in further analysis. Additionally, from an analytical perspective, more complex analyses, such as ARIMA modeling.

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