Müjdat Ertürk<sup>1</sup>

<sup>1</sup>(Faculty of Tourism, Department of Tourism Management, Ankara Hacı Bayram Veli University, Türkiye)

**ABSTRACT:** This study investigates the impact of tourism revenues on Türkiye's Gross Domestic Product (GDP) between 1950 and 2023 by analyzing long-term trends, structural changes, and the influence of economic and political events. These findings indicate that the contribution of tourism to GDP in Türkiye has grown significantly over the past few decades, albeit with notable fluctuations caused by domestic crises and global shocks. Between 1950 and 1980, the share of tourism revenues in GDP remained minimal, reflecting the sector's underdeveloped structure. The period from 1980 to 2000 marked a substantial increase in tourism's economic contribution, driven by liberal economic policies, infrastructure investments, and international promotion. In particular, 1994 and 2002 mark turning points, with tourism revenues exceeding 3% and 5% of GDP, respectively. However, crises such as the 1999 earthquake and the 2001 financial meltdown caused temporary declines. From 2000 to 2019, tourism maintained a strong position in the economy, peaking in 2019 at 5.64% share of GDP. Events such as the 2016 political crisis and the COVID-19 pandemic in 2020 severely affected the sector, but the recovery between 2021 and 2023 was rapid, culminating in a record USD 55.8 billion in tourism revenues in 2023. The study concludes that factors such as infrastructure development, tourism diversification, sustainable tourism policies, and global competitiveness significantly influence tourism's economic impact. For developing countries like Türkiye, focusing on high value-added tourism segments and enhancing resilience through sustainability are critical for ensuring the sector's long-term contribution to GDP. Strengthening data collection and adopting adaptive policy frameworks are also recommended to optimize tourism's role in national economic development.

**KEYWORDS -** GDP, Tourism Revenues, Türkiye

I.

# INTRODUCTION

Gross Domestic Product (GDP) is a fundamental indicator of a country's economic growth and performance. Representing the market value of all final goods and services produced within a country over a specified period, GDP serves as a primary tool for economic analysis by governments and international organizations.

The tourism sector is one of the fastest-growing global industries and is important to modern economies. It is recognized as a key driver of economic growth and development in many countries, particularly in developing economies. The contribution of tourism to economic growth is not limited to generating foreign exchange income; it provides various economic benefits, such as employment creation and regional development. Globally, the tourism sector has considerable economic potential and contributes significantly to the GDP of many nations. According to a report by the World Travel and Tourism Council (WTTC, 2020 [1]), before the pandemic, the tourism sector accounted for approximately 10% of global GDP in 2019.

The economic impact of tourism is particularly evident in small and medium-sized economies. In these countries, the tourism industry plays a critical role in balancing foreign trade and increasing employment. Studies conducted in Mediterranean countries reveal the positive effects of tourism on GDP. In countries such as Spain, Greece, and Italy, tourism is a major source of income, and its contribution is particularly prominent in coastal regions. However, the long-term impact of tourism on economic growth in these countries varies depending on the diversity of sectors and the implementation of sustainable development policies. Although developed countries receive a substantial share of global tourism revenues, their more diversified economic structures render tourism only one part of their overall economic growth. For instance, in countries like the United States and Germany, the tourism sector constitutes about 2%–3% of GDP; however, due to their strong industrial, technological, and financial sectors, tourism plays a less determining role (Mules, 2015 [2]).

This study aims to analyze the impact of tourism revenues on GDP in Türkiye. In this context, the definition of GDP, calculation methods, and significance in economic analysis are first addressed. Subsequently, the contribution of the tourism sector to Türkiye's economic growth will be discussed based on both theoretical frameworks and empirical findings. This study explores how tourism contributes to the economy through factors such as employment, foreign exchange earnings, and sectoral spillover effects.

\**Corresponding Author: Müjdat Ertürk*<sup>1</sup>

### II. CONCEPTUAL FRAMEWORK

2.1. Gross Domestic Product (GDP)

Gross Domestic Product (GDP) refers to the total monetary value of goods and services produced within a country during a specified period (Mankiw, 2020 [3]). Alternatively, GDP can be defined as a broad measure of economic activity, representing the total market value of all final goods and services produced within a country's borders over time (United Nations, 2009 [4]). The final goods and services are those consumed at the end of the production process. GDP is commonly used as a primary indicator to assess economic growth and the level of national welfare. It is considered a fundamental measure of a country's economic health and plays a critical role in shaping economic policies (Krugman & Wells, 2019 [5]). However, academic circles have raised criticism regarding GDP's limitations in fully reflecting social welfare (Stiglitz, Sen, & Fitoussi, 2010 [6]).

The GDP can be calculated using three different approaches:

•Production Approach: This method is also known as the value-added approach and is based on the total value of all final goods and services produced in the economy. The method involves subtracting intermediate goods from gross output for each sector (Krugman & Wells, 2020 [5]). This approach is particularly useful for analyzing the contributions of different economic sectors to overall growth.

•Income Approach: This method sums all income earned from economic activity. It includes wages, interest, rents, and corporate profits. Depreciation and indirect taxes are also added, while subsidies are subtracted (Samuelson & Nordhaus, 2015 [7]).

•Expenditure Approach: This approach measures total spending on final goods and services. The main components of the model include household consumption, government expenditures, investment spending, and net exports (exports minus imports) (Blanchard, 2017 [8]). The expenditure method is particularly important for analyzing aggregate demand.

Although GDP is a key indicator of economic growth, it has several limitations. First, GDP does not account for environmental degradation, income inequality, or informal economic activities (Stiglitz et al., 2010 [6]). Second, it excludes many economically valuable activities such as volunteer work and household production (Coyle, 2014 [9]). Although GDP is an important indicator of economic performance, it does not fully capture economic well-being. Therefore, complementing GDP with other indicators can enable more comprehensive economic analyses.

2.2. Tourism Revenues

Tourism revenues refer to the expenditures made by international visitors to a country for accommodation, transportation, food and beverages, entertainment, and other services (World Tourism Organization [UNWTO], 2021 [10]). These revenues are not confined solely to the tourism sector; rather, they also contribute indirectly to other areas such as transportation, agriculture, construction, and various service industries (Brida & Risso, 2010 [11]). Tourism revenues play a particularly important role in generating foreign exchange, thereby making a positive contribution to a country's current account balance. In developing countries, the tourism sector is a significant source of income within the framework of export-led growth models.

Tourism revenues provide several important benefits, especially for developing economies, such as reducing trade deficits, creating employment, and supporting large-scale infrastructure investments (Balaguer & Cantavella-Jordá, 2002 [12]). Tourism revenues play a critical role in narrowing current account deficits and ensuring macroeconomic stability (Katircioglu, 2009 [13]). Investments directed toward the tourism sector contribute to economic growth sustainability and help improve the standard of living by increasing local incomes (Eugenio-Martin, Morales, & Scarpa, 2004 [14]). Furthermore, the tourism sector stimulates various economic activities and strengthens integration with the industrial, agricultural, and commercial sectors. Therefore, the economic impact of tourism should be regarded not only in terms of its direct contribution to GDP but also as a comprehensive element of economic development (Kim, Chen, & Jang, 2006 [15]).

2.3. Impact of Tourism Revenue on Gross Domestic Product (GDP)

The direct and indirect contributions of the tourism sector are significant in the calculation of Gross Domestic Product (GDP) (Song, Dwyer, Li, & Cao, 2012 [16]). Investments in the service sector, particularly those related to tourism, positively contribute to overall economic growth. The tourism sector influences both domestic consumption and foreign trade, thereby supporting GDP growth. In developing countries, investments in tourism are especially crucial for the sustainability of economic growth (Sequeira & Nunes, 2008 [17]).

One of the most critical factors determining the impact of tourism on GDP is infrastructure investment. Infrastructure significantly affects tourists' travel and accommodation experiences. Modern transportation networks, high-quality accommodation, and accessibility to tourist regions play a vital role in increasing tourism revenues. Dyer et al. (2007 [18]) emphasized that infrastructure development increases tourist arrivals and satisfaction, thereby enhancing tourism's contribution to GDP. Moreover, infrastructure improvements create spillover effects on local economies and promote regional development.

The economic impact of tourism depends not only on the sector's size but also on the diversity of tourism activities. Different types of tourism generate varying levels of revenue and economic benefits. Investments in niche areas such as cultural tourism, health tourism, ecotourism, and adventure tourism, contribute to economic growth in diverse ways. In developed countries, targeting high-income tourists through specialized markets yields more permanent and sustainable impacts on GDP (Seetanah, 2011 [19]). In contrast, mass tourism in developing countries often attracts low-income tourists, resulting in shorter-term economic benefits (Dwyer et al., 2000 [20]). While such tourism may boost GDP in the short term, issues such as low revenue generation and dependency on external markets challenge its sustainability (Barros & Alves, 2013 [21]). Öztürk and Aslan (2020 [22]), in their study, examined the impact of Türkiye's investments in coastal, health, and cultural tourism on GDP and emphasized that these investments have long-term, positive effects on the national economy.

Sustainable tourism, which considers environmental, social, and economic sustainability, is a key factor in determining the long-term economic contributions of tourism. Sustainable tourism policies play an important role in conserving natural resources and benefiting local communities. Numerous studies have demonstrated that sustainable tourism practices not only reduce the environmental footprint of tourism but also attract higher-spending, longer-staying visitors (Gössling et al., 2009 [23]). Such policies positively influence economic growth in developed countries and are implemented in developing nations to support broader development goals.

Another factor shaping the impact of tourism on GDP is international competition and market demand. The global competitive landscape affects the effectiveness of destination marketing strategies and directly influences the number of tourists. Although developed countries typically aim to attract high-income tourists, they often seek to appeal to a broader market to increase tourism revenues. Competition is closely tied to the quality of tourism infrastructure and services (Pizam & Mansfield, 2006 [24]). Therefore, the performance of national tourism sectors is directly related to their competitiveness in global markets.

Various econometric models have been employed to analyze the effect of tourism revenues on GDP. Existing studies suggest that tourism makes a substantial contribution to economic growth, with much of this impact coming through indirect channels (Oh, 2005 [25]). In particular, the long-term impact of tourism on GDP becomes more pronounced over time (Lee & Chang, 2008 [26]). Empirical studies that examine the contribution of tourism to economic growth incorporate both direct and indirect effects (Kim, Chen, & Jang, 2006 [15]). Tourism investments enhance service quality, increase a country's competitiveness, and thereby accelerate economic growth (Gunduz & Hatemi-J, 2005 [27]). Considering the spillover effects on related sectors, tourism can be seen as a powerful catalyst in the development process.

In Türkiye, the tourism sector plays a significant role in economic and GDP growth. Since the early 2000s, the country's tourism industry has experienced substantial development, offering various forms of tourism—such as cultural, nature-based, and coastal tourism—that appeal to a wide range of tourists. Yalçın (2020 [29]), in a study analyzing the impact of tourism on GDP in Türkiye, highlighted tourism as a critical sector for economic growth and noted its potential in balancing the country's trade deficit. Tourism revenues in Türkiye are particularly concentrated in the Mediterranean and Aegean regions, contributing substantially to local economies. Furthermore, the tourism sector plays a key role in job creation throughout the country.

#### III. METHODOLOGY

The primary objective of this study is to examine the share of tourism revenues in Türkiye's Gross Domestic Product (GDP) between the years 1950 and 2023. The research employs panel data analysis, a qualitative research method, to analyze long-term trends. GDP data were obtained from the Presidency of the Republic of Türkiye Strategy and Budget Directorate, using national economic indicators, national income, and production statistics. Tourism revenue data for the period between 1950 and 2003 were collected from the Turkish Statistical Institute's (TÜİK [30]) Annual Tourism Statistics, while data for 2004 to 2023 were sourced from the Ministry of Culture and Tourism's Tourism Statistics.

In this study, both GDP and tourism revenues are presented in U.S. dollar (USD) terms to ensure consistency and comparability. Subsequently, the proportion of tourism revenues within GDP was calculated for each year, and the findings were presented in tabular form and interpreted accordingly. The scope of the study is limited to the period 1950–2023, and data are analyzed in 15-year intervals.

#### IV. FINDINGS

Table 1 presents the GDP and tourism revenue figures for the period of 1950–1964, along with the calculated share of tourism revenues in GDP.

Years	Gross Domestic Product (Million \$)	Tourism Income (Million \$)	Share of Tourism Income in GDP
1950	3.469,46	6,00	0,17
1951	4.167,18	15,00	0,36
1952	4.793,18	7,00	0,15
1953	5.584,93	8,00	0,14
1954	5.699,57	7,00	0,12
1955	6.853,89	3,00	0,04
1956	7.908,57	3,00	0,04
1957	10.517,57	3,00	0,03
1958	12.552,07	2,60	0,02
1959	15.686,82	5,40	0,03
1960	9.931,69	6,00	0,06
1961	5.511,80	7,10	0,13
1962	6.402,20	8,30	0,13
1963	7.401,58	7,70	0,10
1964	7.871,87	8,32	0,11

 Table 1. Share of Tourism Revenues in GDP Between 1950 and 1964 (in Million USD)

**Source**: Gross Domestic Product figures were obtained from the *Presidency of the Republic of Türkiye, Strategy* and Budget Directorate, Basic Economic Indicators: National Income and Production Statistics. Tourism revenue figures were retrieved from the *Turkish Statistical Institute (TÜİK), Annual Tourism Statistics*.

#### Analysis of the Period Between 1950 and 1964

In 1950, Türkiye's Gross Domestic Product (GDP) stood at USD 3,469 million, rising to USD 7,871 million by 1964. Although there was a general upward trend in GDP during the 1950s, a significant decline occurred in 1960, with GDP declining from USD 15,686 million to USD 9,931 million. This sharp contraction may be associated with economic and political developments during that period. In 1961, GDP fell further to USD 5,511 million; however, from 1962 onwards, GDP entered a recovery trend once again.

Tourism revenues during this period exhibited a fluctuating pattern. Starting at USD 6 million in 1950, it rose sharply to USD 15 million in 1951. However, this was followed by a steep decline, reaching as low as USD 2.6 million in 1958. After 1960, a recovery in tourism revenues can be observed, with earnings reaching USD 8.32 million in 1964.

The share of tourism revenues in GDP was 0.17% in 1950, peaking at 0.36% in 1951—the highest level recorded during this timeframe. However, in subsequent years, this share fell to below 0.1%. In 1961 and 1962, the share rebounded slightly to 0.13%, whereas during the 1957–1958 period, it declined to as low as 0.03%–0.02%.

These figures indicate that although tourism revenues showed volatility in the early 1950s, their overall contribution to GDP remained quite limited. The lowest share of tourism revenues in GDP occurred during 1957–1958, suggesting that the country failed to generate sufficient income from tourism due to economic or political constraints during that period. Despite the sharp drop in GDP in 1960, tourism revenues experienced a slight increase. In 1961 and 1962, tourism revenues improved modestly, with their share of GDP reaching 0.13%. By 1964, the tourism sector had begun to show signs of recovery, although its share in GDP remained relatively low.

In conclusion, these findings demonstrate that tourism was not a significant part of the Turkish economy during 1950–1964. However, signs of recovery became evident in the mid-1960s, suggesting that greater importance began to be placed on tourism in subsequent years.

Table 2 presents GDP and tourism revenue figures for the period 1965–1979, along with the calculated share of tourism revenues in GDP.

Years	Gross Domestic Product (Million \$)	Tourism Income (Million \$)	Share of Tourism Income in GDP
1965	8.418,51	13,76	0,16
1966	9.997,30	12,13	0,12
1967	11.143,77	13,22	0,12
1968	18.008,00	24,08	0,13
1969	20.128,00	36,57	0,18
1970	18.825,00	51,60	0,27
1971	16.847,00	62,86	0,37
1972	21.319,00	103,73	0,49
1973	26.854,00	171,48	0,64
1974	36.985,00	193,68	0,52
1975	46.300,00	200,86	0,43
1976	52.996,00	180,46	0,34
1977	60.613,00	204,88	0,34
1978	66.277,00	230,40	0,35
1979	80.960,00	280,73	0,35

Table 2. Share of Tourism Revenues in GDP Between 1965 and 1979

**Source**: Gross Domestic Product (GDP) figures were obtained from the *Presidency of the Republic of Türkiye*, *Strategy and Budget Directorate, Basic Economic Indicators: National Income and Production Statistics*. Tourism revenue data were retrieved from the *Turkish Statistical Institute (TÜİK), Annual Tourism Statistics*.

Analysis of the Period Between 1965 and 1979

In 1965, Türkiye's Gross Domestic Product (GDP) stood at USD 8,418 million, rising steadily to USD 80,960 million by 1979. This period was characterized by continuous economic growth, with a noticeable acceleration beginning after 1968. For instance, GDP increased from 11,143 million USD in 1967 to 18,008 million USD in 1968. After 1973, growth further accelerated, and by 1979, GDP had increased nearly 10-fold compared to 1965. However, in the second half of the 1970s, the global oil crisis and economic fluctuations led to more volatile growth patterns.

During 1965–1967, tourism revenues remained relatively low, fluctuating between USD 12 and \$14 million. Beginning in 1968, tourism income began to rise significantly, reaching USD 24 million in 1968, USD 36 million in 1969, and USD 51 million in 1970. The year 1972 appears to have been a turning point for Türkiye's tourism industry, with revenues increasing from USD 62.86 million in 1971 to USD 103.73 million in 1972. Between 1973 and 1979, tourism revenues experienced substantial growth, reaching USD 171 million in 1973, USD 200 million in 1975, and USD 280 million in 1979.

From 1965 to 1967, the share of tourism revenues in GDP ranged between 0.12% and 0.16%. Starting in 1970, the tourism sector's share of the economy began to rise. This share reached 0.27% in 1970, 0.37% in 1971, 0.49% in 1972, and peaked at 0.64% in 1973, marking the highest contribution of tourism to GDP during the period. Although tourism revenues continued to increase after 1973, the rapid expansion of GDP meant that tourism's relative share stabilized at approximately 0.34%-0.43%. Between 1975 and 1979, the share of tourism in GDP remained steady at approximately 0.35%-0.43%.

These findings indicate that between 1965 and 1970, tourism revenues remained relatively low, but from 1970 onward, a notable upward trend began. The years 1972–1973 saw the highest proportional contribution of tourism revenues to GDP. During this time, Türkiye appears to have placed greater emphasis on the development of its tourism sector. After 1974, although tourism revenues continued to grow in absolute terms, their share in GDP declined slightly because of the more rapid expansion of the overall economy.

In summary, the 1965–1979 period represents a phase during which Türkiye began investing more in the tourism sector and experienced increasing contributions from tourism to economic growth. In particular, after the 1970s, tourism began to play a more significant role in Türkiye's economic structure.

Table 3 presents GDP and tourism revenue data for the period 1980–1994, along with the calculated share of tourism revenues in GDP.

Years	Gross Domestic Product (Million \$)	Tourism Income (Million \$)	Share of Tourism Income in GDP
1980	67.457,00	326,65	0,48
1981	70.419,00	381,27	0,54
1982	63.485,00	370,32	0,58
1983	60.373,00	411,09	0,68
1984	58.643,00	840,00	1,43
1985	66.408,00	1.482,00	2,23
1986	75.018,00	1.215,00	1,62
1987	85.638,00	1.721,12	2,01
1988	90.495,00	2.355,30	2,60
1989	106.123,00	2.556,53	2,41
1990	149.195,00	3.225,00	2,16
1991	149.156,00	2.654,00	1,78
1992	156.656,00	3.639,00	2,32
1993	177.332,00	3.959,00	2,23
1994	131.639,00	4.321,00	3,28

Table 3. Share of Tourism Revenues in GDP Between 1980 and 1994

**Source**: Gross Domestic Product (GDP) figures were obtained from the *Presidency of the Republic of Türkiye*, *Strategy and Budget Directorate, Basic Economic Indicators: National Income and Production Statistics*. Tourism revenue data were retrieved from the *Turkish Statistical Institute (TÜİK), Annual Tourism Statistics*.

Analysis of the Period Between 1980 and 1994

Between 1980 and 1990, Türkiye's Gross Domestic Product (GDP) generally exhibited an upward trend, rising from USD 67,457 million in 1980 to USD 149,195 million in 1990. However, a decline occurred between 1983 and 1984, as GDP declined from USD 60,373 million to USD 58,643 million. A major drop was also recorded in 1994, when GDP declined sharply from USD 177,332 million to USD 131,639 million because of a national economic crisis.

Tourism revenues remained relatively low between 1980 and 1983, increasing only slightly from USD 326 million in 1980 to USD 411 million in 1983. However, a significant surge began in 1984, with revenues reaching USD 840 million in that year, followed by USD 1,482 million in 1985 and USD 1,215 million in 1986. From 1987 onward, tourism revenues consistently increased, reaching USD 2,355 million in 1988, USD 3,225 million in 1990, and ultimately peaking at USD 4,321 million in 1994.

The share of tourism revenues in GDP was relatively low between 1980 and 1983, ranging between 0.48% and 0.68%. After 1984, however, the contribution of tourism to the national economy increased significantly, rising to 1.43% in 1984 and 2.23% in 1985. By 1988, that share had reached 2.60%, 2.41% in 1989, and 2.16% in 1990. In 1994, the share of tourism in GDP climbed to 3.28%, marking its highest recorded level during the period.

These findings indicate that during 1980–1983, tourism revenues remained limited. However, starting in 1984, economic policies began to favor tourism development. The liberalization policies of the Özal administration, coupled with hotel investments and tourism incentives, significantly increased the sector's contribution to GDP. Between 1985 and 1990, tourism revenues rose consistently, reinforcing the sector's role in national economic growth. Although tourism revenues slightly declined during 1991–1993 because of the Gulf War, they began to recover by 1992. In 1994, despite an economic crisis that caused a sharp contraction in GDP, tourism revenues continued to rise, and for the first time, the sector's share of GDP exceeded 3%, reaching 3.28%.

Overall, the 1980s–1994 period reflects a phase during which the importance of tourism in the Turkish economy significantly increased. Following 1984, tourism revenues experienced substantial growth, reaching record levels by 1994. This period marks the beginning of Türkiye's recognition of tourism as a strategic economic development sector.

Table 4 presents GDP and tourism revenue figures for the period 1995–2009, along with the calculated share of tourism revenues in GDP.

Years	Gross Domestic Product (Million \$)	Tourism Income (Million \$)	Share of Tourism Income in GDP
1995	168.080,00	4.957,00	2,95
1996	181.077,00	5.962,10	3,29
1997	188.735,00	8.088,55	4,29
1998	277.668,32	7.808,94	2,81
1999	254.119,12	5.203,00	2,05
2000	273.085,45	7.636,00	2,80
2001	202.503,48	10.450,73	5,16
2002	238.145,15	12.420,52	5,22
2003	316.560,97	13.854,87	4,38
2004	407.020,78	17.076,61	4,20
2005	504.753,78	20.322,11	4,03
2006	552.366,85	18.593,95	3,37
2007	683.020,24	20.942,50	3,07
2008	782.864,98	25.415,07	3,25
2009	651.543,40	25.064,48	3,85

Table 4. Share of Tourism Revenues in GDP Between 1995 and 2009

**Source**: Gross Domestic Product (GDP) data were obtained from the *Presidency of the Republic of Türkiye*, *Strategy and Budget Directorate, Basic Economic Indicators: National Income and Production Statistics*. Tourism revenue data for the years **1995–2003** were retrieved from the *Turkish Statistical Institute (TÜİK)*, *Annual Tourism Statistics*, and for the years **2004–2008** from the *Ministry of Culture and Tourism, Tourism Statistics*.

Analysis of the Period Between 1995 and 2009

Between 1995 and 1997, the Turkish economy exhibited steady growth. The GDP increased from USD 168 billion in 1995 to USD 188 billion in 1997. However, due to a series of economic crises and the 1999 Marmara Earthquake, fluctuations were observed between 1998 and 2001. Although a significant surge occurred in 1998, with GDP reaching USD 277 billion, it declined to USD 254 billion in 1999. The 2001 economic crisis dealt a severe blow to the economy, resulting in a drop in GDP to USD 202 billion. Between 2002 and 2008, the Turkish economy recovered and entered a period of stable growth. The GDP rose to USD 316 billion in 2003, USD 407 billion in 2004, USD 504 billion in 2005, USD 683 billion in 2007, and USD 782 billion in 2008. However, the 2009 global financial crisis caused GDP to shrink to USD 651 billion.

Tourism revenues increased steadily between 1995 and 1997, rising from USD 4.9 billion in 1995 to USD 5.9 billion in 1996 and then to USD 8.08 billion in 1997. Due to the economic crisis and the Marmara Earthquake, tourism revenues declined in 1998–1999, falling from USD 7.8 billion in 1998 to USD 5.2 billion in 1999. Interestingly, during the 2001 crisis, tourism revenues rose significantly, reaching USD 10.4 billion in 2001 and USD 12.4 billion in 2002. Between 2003 and 2008, tourism revenues continued to grow steadily, reaching USD 13.8 billion in 2003, USD 17 billion in 2004, USD 20.3 billion in 2005, and USD 25.4 billion in 2008. In 2009, a slight decline was observed due to the global financial crisis.

Between 1995 and 1997, the share of tourism revenues in GDP increased steadily—from 2.95% in 1995 to 3.29% in 1996 and 4.29% in 1997. In 1998 and 1999, this share decreased to 2.81% and 2.05%, respectively, due to the economic crisis and the earthquake. During the 2001 crisis, while the overall economy contracted, tourism revenues increased, pushing the sector's share of GDP to 5.16% in 2001 and 5.22% in 2002, marking a historical peak. From 2003 to 2008, the contribution of tourism to GDP followed a fluctuating pattern, with 4.38% in 2003, 4.20% in 2004, 3.37% in 2006, and 3.25% in 2008. In 2009, the contraction in GDP due to the global financial crisis led to a renewed rise in tourism's share, reaching 3.85%.

These figures indicate that the 1995–1997 period witnessed continued expansion of the tourism sector, with an increasing share in GDP. However, the 1998–1999 crisis and the Marmara Earthquake caused a downturn in tourism revenues. During the 2001 crisis, tourism proved resilient and expanded even as the broader economy contracted, elevating its share in GDP above 5% for the first time. Between 2002 and 2008, the sector grew alongside the recovering economy, although the rapid growth in GDP caused a slight decline in

tourism's proportional contribution. In 2009, the global financial crisis led to a fall in GDP, whereas tourism revenues remained stable, resulting in an increase in the sector's GDP share.

In conclusion, the 1995–2009 period marks a phase in which tourism became increasingly significant in the Turkish economy. The sector demonstrated resilience despite crises and exhibited substantial growth, particularly after the 2001 economic crisis.

Table 5 presents GDP and tourism revenue data for the period 2010–2023, along with the calculated share of tourism revenues in GDP.

Years	Gross Domestic Product (Million \$)	Tourism Income (Million \$)	Share of Tourism Income in GDP
2010	777.460,51	24.931,00	3,21
2011	837.924,29	28.115,69	3,36
2012	877.675,61	35.717,34	4,07
2013	958.125,30	40.186,33	4,19
2014	939.922,88	41.316,83	4,40
2015	867.071,41	37.700,92	4,35
2016	869.240,57	26.359,00	3,03
2017	859.055,28	31.253,84	3,64
2018	797.728,00	35.920,91	4,50
2019	760.359,00	42.851,78	5,64
2020	717.141,00	15.169,38	2,12
2021	807.924,00	30.309,72	3,75
2022	905.814,00	49.857,03	5,50
2023	1.130.009,00	55.874,18	4,94

Table 5. Share of Tourism Revenues in GDP Between 2010 and 2023

**Source**: Gross Domestic Product (GDP) data were obtained from the *Presidency of the Republic of Türkiye*, *Strategy and Budget Directorate, Basic Economic Indicators: National Income and Production Statistics.* Tourism revenue data were retrieved from the *Ministry of Culture and Tourism, Tourism Statistics.* 

#### Analysis of the Period Between 2010 and 2023

Between 2010 and 2013, the Turkish economy exhibited stable growth. The GDP increased from USD 777 billion in 2010 to USD 958 billion in 2013. However, growth slowed in 2014–2015, with GDP declining to USD 939 billion in 2014 and USD 867 billion in 2015. From 2016 to 2019, the economy showed a fluctuating trend, with USD 869 billion in 2016, USD 859 billion in 2017, USD 797 billion in 2018, and USD 760 billion in 2019. During the 2020 pandemic, the combined impact of the global economic crisis and COVID-19 caused GDP to decline to 717 billion USD. From 2021 to 2023, the economy recovered rapidly, reaching an all-time high of USD 1.13 trillion in 2023.

Tourism revenues increased steadily from 2010 to 2014, growing from USD 24.9 billion in 2010 to USD 28.1 billion in 2011, USD 35.7 billion in 2012, USD 40.1 billion in 2013, and USD 41.3 billion in 2014. However, the sector was adversely affected in 2015 and 2016 due to a series of crises, including the Russia-Türkiye jet incident and domestic terrorist attacks. As a result, tourism revenues dropped from 37.7 billion USD in 2015 to 26.3 billion USD in 2016. Between 2017 and 2019, the tourism sector rebounded significantly, with revenues reaching USD 31.2 billion in 2017, USD 35.9 billion in 2018, and USD 42.8 billion in 2019, setting a new record. In 2020, the COVID-19 pandemic dealt a severe blow to the sector, with revenues plummeting by 64% to 15.1 billion USD. From 2021 to 2023, the tourism industry recovered rapidly, rising to USD 30.3 billion in 2021, USD 49.8 billion in 2022, and USD 55.8 billion in 2023, once again breaking previous records.

The share of tourism revenues in GDP increased steadily between 2010 and 2014, from 3.21% in 2010 to 3.36% in 2011, 4.07% in 2012, 4.19% in 2013, and 4.40% in 2014. In 2015 and 2016, the share declined because of external shocks, falling to 4.35% in 2015 and 3.03% in 2016. From 2017 to 2019, the share rose again, reaching 3.64% in 2017, 4.50% in 2018, and 5.64% in 2019. The pandemic-induced crisis in 2020 caused the share to drop sharply to 2.12%, the lowest level in 20 years. The sector rebounded quickly, with its share of GDP rising to 3.75% in 2021, 5.50% in 2022, and 4.94% in 2023.

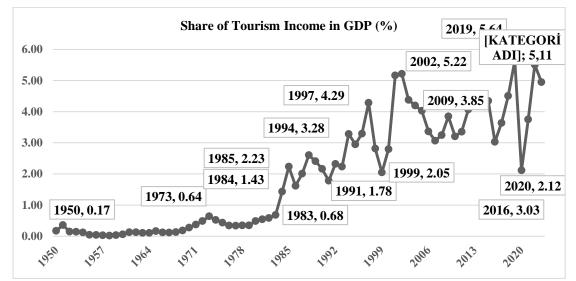
These figures indicate that from 2010 to 2014, the tourism sector grew robustly and contributed increasingly to the economy. However, crises in 2015–2016, particularly geopolitical tensions with Russia and

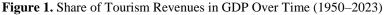
\**Corresponding Author: Müjdat Ertürk*<sup>1</sup>

domestic security issues, severely impacted the sector, causing a nearly 30% decline in revenues. Between 2017 and 2019, the sector recovered strongly, reaching historic highs in 2019. The COVID-19 pandemic in 2020 had a much harsher impact than the 2016 crisis, with revenues dropping by 64%. From 2021 to 2023, the industry experienced a rapid comeback, achieving record levels by 2023.

In conclusion, the period between 2010 and 2023 marked a phase in which tourism gained increasing importance in the Turkish economy. However, global crises, diplomatic tensions, and pandemics have left significant marks on this sector. By 2023, tourism revenues and GDP had reached historical highs.

Figure 1 illustrates the annual share of tourism revenues in Türkiye's GDP from 1950 to 2023. The graph shows that while tourism's contribution to the economy has generally increased over the long term, it has been periodically disrupted by crises.





When analyzed by period, the years 1950–1980 reveal a low and slow increase in the share of tourism revenues in Türkiye's GDP. In 1950, tourism accounted for only 0.17% of GDP. Although this share increased to 0.64% in 1973, it remained low throughout the pre-1980 period. By 1983, tourism's share was still only 0.68%, indicating that the sector played a relatively minor role in the national economy and exhibited limited growth during this time.

Between 1980 and 2000, there was a significant expansion in tourism revenues, albeit with notable fluctuations. The sector's contribution rose to 1.43% in 1984, 2.23% in 1985, and 3.28% in 1994, indicating a sharp increase in tourism's economic importance. By 1997, it peaked at 4.29% and declined to 2.05% in 1999 because of the economic crisis. In 2002, tourism revenues reached 5.22% of GDP, the highest level recorded up to that time. This period marked the transformation of tourism into a key economic sector, particularly in the 1990s. Nevertheless, the 1999 earthquake and the 2001 financial crisis had adverse effects on the sector.

During the 2000–2019 period, the sector followed a volatile but upward trajectory. The 2009 global financial crisis reduced tourism's share of GDP to 3.85%, but by 2019, the sector had reached an all-time high of 5.64%. In 2016, the sector suffered a severe blow from terrorism, political tensions, and the jet crisis with Russia, causing its GDP share to drop to 3.03%. Nevertheless, the chart suggests that since the early 2000s, tourism has held a strong position in the Turkish economy, despite temporary setbacks caused by political and economic turbulence.

From 2020 to 2023, the impact of the COVID-19 pandemic was clearly visible. In 2020, the share of tourism revenues in GDP fell sharply to 2.12%, one of the lowest levels in the last 2 decades. However, the sector rebounded strongly, rising to 5.11% in 2022, reflecting a rapid and resilient recovery. The pandemic was one of the most damaging events for the tourism industry, but the swift post-crisis rebound highlighted the sector's adaptive capacity.

#### V. CONCLUSION

The impact of tourism on Gross Domestic Product (GDP) varies according to each country's economic structure and tourism strategies. While the tourism sector tends to play a less decisive role in developed economies, it has a more significant impact on economic growth and GDP in developing countries. In the case of Türkiye, the tourism sector contributes substantially to GDP. However, to ensure that this contribution remains long-term and balanced, greater emphasis should be placed on sustainable tourism development and diversification within the sector. Strategic investments in these areas would enhance the sector's resilience

\**Corresponding Author: Müjdat Ertürk*<sup>1</sup>

against external shocks and improve its overall contribution to economic stability and inclusive growth.

Tourism's impact on GDP is determined by a wide array of interrelated factors. Infrastructure investments, sustainable tourism policies, local economic conditions, tourism diversification, and international competitiveness are among the key elements that shape this impact. The balance among these factors plays a critical role in determining the sector's long-term contribution to economic growth. While developing countries aim to enhance tourism's economic benefits through sustainability-oriented strategies and infrastructure development, developed countries tend to focus on high value-added and diversified tourism segments to maximize economic returns.

A review of previous studies on the impact of tourism on GDP and its determining factors reveals that tourism has a significant effect on economic growth. However, the degree and sustainability of this effect depend not only on the size of the tourism sector but also on various other factors, such as sectoral investments, infrastructure development, sustainable tourism policies, local economic conditions, and global competition. In developed economies, the impact of tourism on GDP is often more pronounced, as these countries tend to generate greater economic benefits by focusing on high-income tourist segments and diverse tourism offerings.

In developing countries such as Türkiye, tourism's impact on GDP is more closely associated with mass tourism. Investments in coastal, health, and cultural tourism have contributed to increasing the sector's contribution to GDP. However, the economic impact of tourism in such countries tends to be more seasonal and more vulnerable to external shocks and macroeconomic fluctuations.

The impact of tourism on GDP is directly related to sectoral diversity and the implementation of sustainability-oriented policies. Sustainable tourism practices not only reduce environmental pressures but also attract higher-spending, longer-staying tourists. These approaches help ensure the long-term economic contribution of the sector. Infrastructure investments are another key determinant. High-quality transportation networks, accommodation facilities, and accessible tourist areas enhance visitor satisfaction, increase arrivals, and thereby expand the sector's economic contribution.

For countries like Türkiye, promoting sustainable tourism policies is essential to strengthen their longterm economic impact. Sustainable tourism not only protects environmental and cultural assets but also ensures a more equitable distribution of tourism income. Investments in infrastructure, particularly transportation and accommodation, should continue to boost tourist satisfaction and increase arrivals.

Developing countries should also diversify their tourism offerings to target higher value-added segments. Sectors such as cultural, health, and nature tourism offer the potential to attract wealthier tourists, making the sector's contribution to GDP sustainable over time. Creating a more competitive tourism industry in global markets is vital and can be achieved through the renewal of marketing strategies, innovation-driven investments, and improvements in service quality to meet evolving tourist expectations.

Finally, in order to more accurately assess the economic impacts of tourism, it is essential to develop systematic and reliable data collection mechanisms. High-quality data will enable a better understanding of tourism's role in economic development and support evidence-based policymaking for the sector's future.

### REFERENCES

- [1]. Balaguer, J., & Cantavella-Jorda, M. (2002). Tourism as a long-run economic growth factor: The Spanish case. *Applied Economics*, 34(7), 877-884.
- [2]. Barros, C. P., & Alves, A. C. (2013). Tourism and economic growth: The case of Portugal. *Journal of Travel Research*, 52(2), 263-275.
- [3]. Blanchard, O. (2017). Macroeconomics. Londra: Pearson Education.
- [4]. Brida, J. G., & Risso, W. A. (2010). Tourism as a determinant of long-run economic growth. *Journal of Policy Research in Tourism, Leisure and Events,* 2(1), 15-28.
- [5]. Coyle, D. (2014). GDP: A brief but affectionate history. New Jersey: Princeton University Press.
- [6]. Dwyer, L., Forsyth, P., Madden, J., & Spurr, R. (2000). Economic impacts of inbound tourism under different assumptions regarding the macroeconomy. *Current Issues in Tourism*, 3(4), 325–363.
- [7]. Dyer, P., Gursoy, D., Sharma, B., & Carter, J. (2007). Structure and scale of the tourism industry and its economic impact. *Tourism Economics*, 13(3), 281-299.
- [8]. Eugenio-Martin, J. L., Martín Morales, N., & Scarpa, R. (2004). Tourism and economic growth in Latin American countries: A panel data approach (FEEM Working Paper No. 26.2004). Fondazione Eni Enrico
- [9]. Gössling, S., Hall, C. M., & Weaver, D. (2009). Sustainable tourism futures: Perspectives on systems, restructuring and innovations. Londra: Routledge.
- [10]. Gunduz, L., & Hatemi-J, A. (2005). Is the tourism-led growth hypothesis valid for Turkey? *Applied Economics Letters*, *12*(8), 499–504.
- [11]. Katircioglu, S. T. (2009). Revisiting the tourism-led-growth hypothesis for Turkey using the bounds test and Johansen approach for co-integration. *Tourism Management*, *30*(1), 17–20.

- [12]. Kim, H. J., Chen, M. H., & Jang, S. C. (2006). Tourism expansion and economic development: The case of Taiwan. *Tourism Management*, 27(5), 925–933.
- [13]. Krugman, P., & Wells, R. (2019). Macroeconomics. Broadway: Worth Publishers.
- [14]. Lee, C. C., & Chang, C. P. (2008). Tourism development and economic growth: A closer look at panels. *Tourism Management*, 29(1), 180-192.
- [15]. Mankiw, N. G. (2020). Principles of economics. Boston: Cengage Learning.
- [16]. Mules, T. (2015). Tourism and international trade balances: The role of tourism in mitigating the effects of current account deficits. *International Economics Journal*, 29(3), 273-292.
- [17]. Oh, C. O. (2005). The contribution of tourism development to economic growth in the Korean economy. *Tourism Management*, 26(1), 39-44.
- [18]. Öztürk, İ., & Aslan, A. (2020). Investigating the nexus between CO<sub>2</sub> emissions, economic growth, energy consumption and pilgrimage tourism in Saudi Arabia. *Economic Research-Ekonomska Istraživanja*, 35(1), 3083–3098.
- [19]. Pizam, A., & Mansfield, Y. (2006). Hospitality and tourism management. Amsterdam: Elsevier.
- [20]. Samuelson, P. A., & Nordhaus, W. D. (2015). Economics. New York: McGraw-Hill Education.
- [21]. Sequeira, T. N., & Nunes, P. M. (2008). Does tourism influence economic growth? A dynamic panel data approach. *Applied Economics*, 40(18), 2431–2441.
- [22]. Seetanah, B. (2011). The economic impact of tourism at destination: The case of Mauritius. *Tourism Economics*, 17(1), 173-187.
- [23]. Song, H., Dwyer, L., Li, G., & Cao, Z. (2012). Tourism economics research: A review and assessment. Annals of Tourism Research, 39(3), 1653-1682.
- [24]. Stiglitz, J. E., Sen, A., & Fitoussi, J.-P. (2010). Mismeasuring our lives: Why GDP doesn't add up. New York: The New Press.
- [25]. TÜİK. (2024). Tourism Statistics. Turkish Statistical Institute.
- [26]. United Nations. (2009). System of national accounts 2008. New York: United Nations.
- [27]. UNWTO. (2021). World tourism barometer. United Nations World Tourism Organization.
- [28]. WTTC. (2020). Economic impact of tourism 2020. World Travel & Tourism Council.
- [29]. Yalçın, A. (2020). The impact of tourism on GNP: The case of Türkiye [Turizmin GSMH'ya etkisi: Türkiye örneği]. *Journal of Tourism Economics [Turizm Ekonomisi Dergisi]*, 12(4), 99-115.

\*Corresponding Author: Müjdat Ertürk<sup>1</sup> <sup>1</sup>(Faculty of Tourism, Department of Tourism Management, Ankara Hacı Bayram Veli University, Türkiye)