



WORLD  
TRAVEL &  
TOURISM  
COUNCIL

## TOURISM AS A DRIVER OF PEACE



## CONTENTS

1. EXECUTIVE SUMMARY	1
2. KEY FINDINGS	2
3. METHODOLOGY AT A GLANCE - MEASURING TOURISM AND PEACE	2
4. THE LINK BETWEEN TOURISM, VIOLENCE, AND CONFLICT	5
Trends in Tourism, Violence, and Conflict	6
Risers and Fallers in Tourism, Violence, and Conflict	9
Two Cases Compared: Poland and Nigeria	12
Tourism as a Force for Negative Peace	12
5. THE LINK BETWEEN TOURISM AND POSITIVE PEACE	13
Trends in Tourism and Positive Peace	15
Risers and Fallers in in Tourism and Positive Peace	17
Two Cases Compared: Saudi Arabia and Angola	20
Tourism as a Force for Positive Peace	21
6. THE LINK BETWEEN TOURISM AND TERRORISM	21
Trends in Tourism and Terrorism	22
Risers and Fallers in in Tourism and Terrorism	25
Two Cases Compared: Bosnia and Herzegovina and the Kyrgyz Republic	28
7. APPENDIX A: METHODOLOGICAL NOTE	29
References	38

For more information, please contact:

**ROCHELLE TURNER** | Research Director  
rochelle.turner@wttc.org

**EVELYNE FREIERMUTH** | Policy & Research Manager  
evelyne.freiermuth@wttc.org

©2016 World Travel & Tourism Council

# TOURISM AS A DRIVER OF PEACE

QUANTITATIVE ANALYSIS ON THE LINK  
BETWEEN PEACE AND TOURISM  
MAY 2016

## 1. EXECUTIVE SUMMARY

Over the last decade the world has become increasingly unequal in terms of its levels of peacefulness, with the most peaceful countries enjoying increasing levels of peace and prosperity, while the least peaceful countries are spiralling into violence and conflict. The economic costs of violence containment on the global economy are also significant and have increased, estimated at \$13.7 trillion in 2012 and \$14.3 trillion in 2014, or 13.4% of world GDP<sup>1</sup>. At the same time, tourism's contribution to GDP has been growing at a global average of 2.3% since 2005, while foreign spending on tourism measured as visitor exports has been growing at a rate of 3.4% on average globally. Additionally, international passenger arrivals around the world have increased from a global average of 828 million in 2005 to 1.184 billion in 2015. Tourism can be a major source of income and employment for many countries, particularly in the global south. However, like other means of development, tourism can also cause its share of problems such as social dislocation, loss or destruction of cultural heritage, economic dependence, and environmental degradation<sup>2</sup>. In light of this, the World Tourism Organization's (UNWTO) charter includes social and environmental responsibilities: "Tourism development shall be based on criteria of sustainability, which means that it must be ecologically bearable in the long term, as well as economically viable, and ethically and socially equitable for local communities."<sup>3</sup> In light of this global context, this report examines the links between peace and sustainable tourism.

Open and sustainable tourism can be a force for peace, with causal mechanisms operating both at the individual and state level<sup>4</sup>. Open tourism refers to the ease and extent to which tourism flows within and between countries allowing the exchange of money, ideas, and cultures. Open tourism can broaden minds and opinions so that individuals may become more informed and tolerant of their fellow human beings. The UNWTO defines sustainable tourism as "Tourism that takes full account of its current and future economic, social and environmental impacts, addressing the needs of visitors, the industry, the environment and host communities". Sustainable tourism can facilitate economic growth as cash is injected into an economy through spending, and employment as the tourism sector grows to accommodate demand. Tourism can also facilitate better diplomatic and trade relations between countries, fostering a more tolerant political climate.

This report develops a measure of tourism openness and sustainability (the Tourism Index) based on four domains: socio-cultural, economic, environmental, and political. It then investigates relationships between tourism sustainability and three measures of peacefulness: the absence of violence and conflict (negative peace), the institutions, structures and attitudes which create and sustain peaceful societies (positive peace), and the absence of terrorism.

Since 2008, the global trend has been improvements in tourism sustainability and openness, although there are significant regional differences. In 2015, the top ten countries in terms of tourism openness and sustainability were Spain, France, Germany, United States, Italy, the United

<sup>1</sup> "Global Peace Index Report 2015", Institute for Economics and Peace

<sup>2</sup> Teaching and Learning for a Sustainable Future, UNESCO, www.unesco.org

<sup>3</sup> Charter for Sustainable Tourism, World Conference on Sustainable Tourism, Santa Cruz de Tenerife, June 1995.

<sup>4</sup> D'Amore (1988)

Kingdom, Austria, Greece, Australia, and Mexico. The bottom ten performers over-represent the sub-Saharan African region: Angola, Rwanda, Togo, Bangladesh, Ethiopia, Benin, Mozambique, Tanzania, Burkina Faso and Nigeria<sup>5</sup>. At the same time, the world has become a less peaceful place with homicide rates increasing in Latin America, and increases in deaths from internal conflict in sub-Saharan Africa. Decreases in internal peace have led to increasing numbers of refugees and Internally Displaced People (IDPs), with the UN estimating that more than 50 million people are currently refugees or displaced persons, the highest level since World War Two. Peace is also becoming more unevenly distributed. While Europe has seen increasing levels of external peacefulness, the Middle East continued its trend of deterioration, further increasing the gap between the most and least peaceful regions of the world.

There is a positive relationship between open and sustainable tourism and both negative and positive peace. Short run deteriorations in peacefulness are not correlated with falls in the tourism index. While tourism is resilient to many types of violence, it is strongly impacted by entrenched conflicts. Although the average global Tourism Index score increased from 2008 to 2015, there was a clear deterioration in countries that were suffering from protracted conflicts. Tourism sustainability is resilient to deteriorating terrorism conditions in the medium term, even when terrorist acts are targeted at tourists.

The report is meant as a first step in the path toward understanding the empirical links between open and sustainable tourism and peace.

## 2. KEY FINDINGS

- Countries with more sustainable and open tourism industries tend to be more peaceful.
- In non-conflict-affected countries, tourism sustainability and openness is resilient to deteriorations in violence and conflict, and in positive peace.
- In conflict-affected countries, tourism sustainability and openness is vulnerable to even small deteriorations in violence and conflict.
- The Tourism Index is a good predictor of levels of external peace, and a reasonable predictor of overall levels of violence and conflict. This result is driven by non-conflict-affected countries.
- Both conflict-affected and non-conflict-affected countries show a correlation between the Tourism Index and higher positive peace, indicating that higher scores on the Tourism Index correlate with higher levels of positive peace. The strength of the correlation is significantly higher for non-conflict-affected countries.
- The Tourism Index is a good predictor of future levels of overall positive peace: countries that have more open and sustainable tourism sectors will likely enjoy higher levels of positive peace in the future.
- Europe and North America are historically the strongest performers on Tourism, Global Peace and Positive Peace Indexes, while sub-Saharan Africa and South Asia are the weakest performers.
- Tourism sustainability is resilient to deteriorations in terrorism, even when terrorism is targeted at tourists.
- Between 2008 and 2015 the top ten risers in tourism sustainability and openness were: Mongolia, Kazakhstan, Kuwait, Bosnia and Herzegovina, Azerbaijan, Trinidad and Tobago, Saudi Arabia, Morocco, Australia, and Malaysia.
- Between 2008 and 2015 the top ten fallers in tourism sustainability and openness were: Nigeria, Zimbabwe, Cambodia, Ethiopia, Angola, Togo, Mozambique, Zambia, Tanzania, and Bangladesh.

## 3. METHODOLOGY AT A GLANCE - MEASURING TOURISM AND PEACE

Tourism is a multifaceted domain: it is a flow of people, money, ideas, and experiences. It brings economic opportunity to host countries, but also the threat of economic exploitation and environmental damage. It promotes cultural dialogue but may also suffer because of political skirmishes. This complexity makes tourism difficult to measure by a single indicator, although to date many studies and reports have done just that, focusing on international tourism arrival data as a measure of tourism.

Acknowledging the complexity of tourism and its multifaceted causes and consequences, more recently there has been an increased focus on tourism sustainability as a goal for all countries. The World Tourism Organization defines sustainable tourism as “Tourism that takes full account of its current and future economic, social and environmental impacts, addressing the needs of visitors, the industry, the environment and host communities”. Open tourism refers to the ease and extent to which tourism flows within and between countries allowing the exchange of money, ideas, and cultures. Sustainable and open tourism can be a force for peace, and sustainable tourism is a goal of the United Nations Sustainable Development Goals<sup>6</sup>.

Measuring sustainable and open tourism is challenging. There is ongoing debate as to what indicators should be used to measure sustainable tourism, with some arguing that indicators of sustainable tourism need to be country specific because different countries operate in different contexts, while others argue for a more general approach that allows comparability. Despite this ongoing debate, there is general consensus that four domains need to be accounted for in measuring tourism sustainability and openness: socio-cultural, economic, political, and environmental<sup>7</sup>.

<sup>5</sup> These results are in-line with the findings from the World Economic Forum’s Travel and Tourism Competitiveness Report 2015.

<sup>6</sup> Sustainable Tourism features as goal 8.9 under the umbrella of goal 8: “Promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all”

<sup>7</sup> See for example the United Nations World Tourism Organization’s “Indicators on Sustainable Development for Tourism Destinations: A guidebook”, 2004.

The Tourism Index uses indicators of these four domains which allow a comparative assessment of the sustainability and openness of countries both across time and between countries. The indicators used to compile the index come from a variety of sources including the WTTC and the World Bank, with the full list of indicators listed in the methodological appendix. Using available data, the Index provides country scores for the years 2008, 2010, 2012, 2013, 2014, and 2015. The Tourism Index gives each country in each year a score between zero and ten, where ten is the best score a country can achieve, indicating maximum amounts of tourism openness and sustainability. Figure 1 shows the Tourism Index scores for countries around the world for two years, 2008 and 2015.

**Figure 1: Global distribution of the Tourism Index 2008 and 2015**

*Countries that score higher on the tourism index (a score closer to ten) have more open and sustainable tourism sectors*

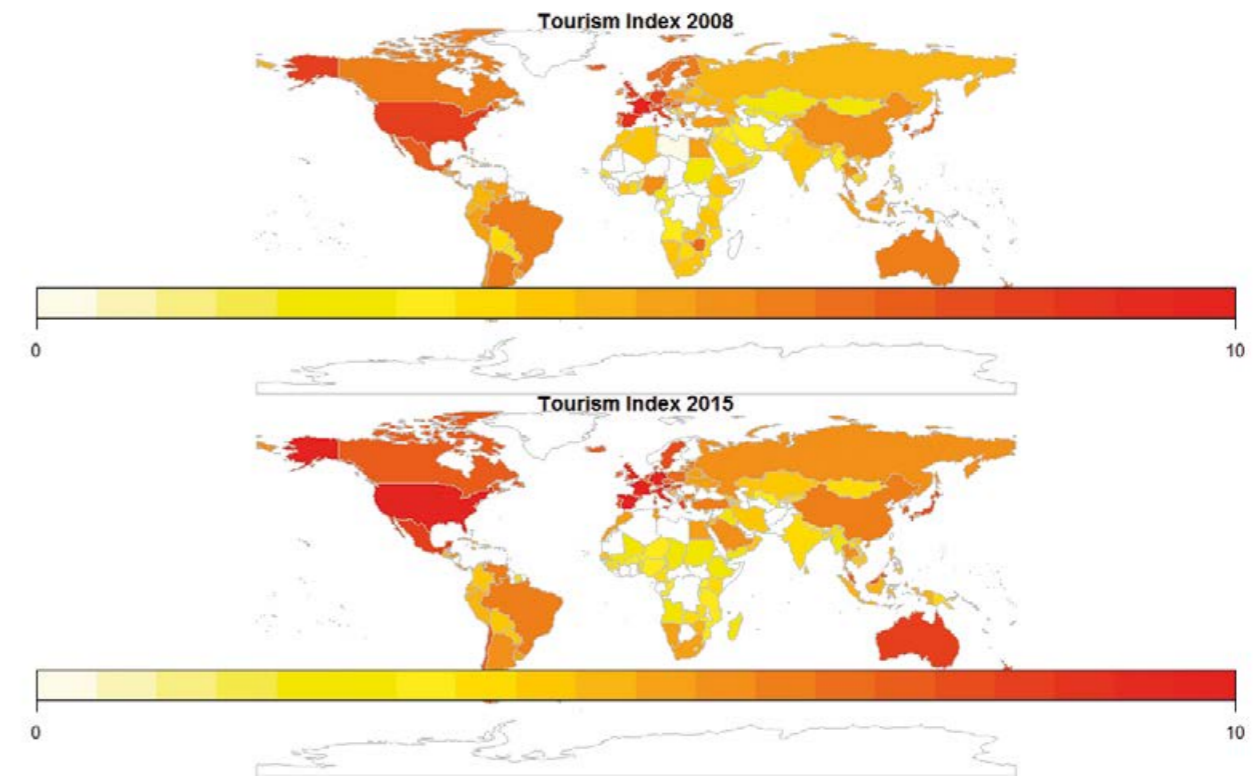


Table 1 shows the top 10 and bottom 10 non-conflict-affected countries on their Tourism Index score for 2015<sup>8</sup>.

**Table 1: Top 10 and Bottom 10 (non-conflict-affected countries) Tourism Index 2015**

TOP 10		BOTTOM 10	
	Tourism Index Score		Tourism Index Score
Spain	10	Angola	2.61
France	10	Togo	2.798
Germany	9.88	Rwanda	2.73
United States	9.50	Bangladesh	2.84
Italy	9.32	Ethiopia	2.887
United Kingdom	9.10	Benin	2.921
Austria	8.61	Mozambique	3.032
Greece	8.38	Tanzania	3.311
Australia	8.29	Burkina Faso	3.318
Mexico	8.22	Nigeria	3.374

<sup>8</sup> The complete list of country rankings is listed in the methodological appendix.

The results from the Tourism Index are consistent with results from the World Economic Forum's Travel and Tourism Competitiveness Report 2015. Seven out of ten of the top ten countries from the Travel and Tourism Competitiveness Index (TTCI) from 2015 are also in the top ten countries on the Tourism Index. A complete overlap is of course not expected as the two indexes measure slightly different aspects of tourism, with the TTCI measuring "the set of factors and policies that enable the sustainable development of the Travel & Tourism sector, which in turn contributes to the development and competitiveness of a country". The fourteen pillars of the TTCI include measures of the enabling environment such as a sound business environment and safety and security. These two factors are component measures of negative peace and positive peace. In order to examine the relationship between peace and tourism sustainability, there is a need to create a measure of tourism sustainability that does not contain measures of peace. The Tourism Index separates these factors.

Table 2 shows the top 10 risers and fallers in terms of the tourism index for non-conflict-affected countries between 2008 and 2015, as well as the corresponding changes in international arrivals.

**Table 2: Risers and Fallers (non-conflict-affected countries) on the Tourism Index 2008 to 2015**

TOP 10 RISERS			TOP 10 FALLERS		
	% Change Tourism Index	% Change in International Arrivals		% Change Tourism Index	% Change in International Arrivals
Mongolia	85%	-6.3%	Nigeria	-36.20%	-54.30%
Kazakhstan	74.2%	53.4%	Zimbabwe	-33.80%	-6.30%
Kuwait	73.9%	-	Cambodia	-29.10%	98.10%
Bosnia and Herzegovina	47.8%	64.3%	Ethiopia	-27.60%	77.80%
Azerbaijan	44.8%	104%	Angola	-25.50%	121%
Trinidad and Tobago	41.6%	-0.7%	Togo	-23.70%	341%
Saudi Arabia	39.8%	-9.3%	Mozambique	-21.20%	58.10%
Morocco	38.2%	27.5%	Zambia	-17.30%	12.70%
Australia	35.1%	14.2%	Tanzania	-13.60%	41.70%
Malaysia	33.1%	16.6%	Bangladesh	-12.60%	-68.30%

Peace is also a difficult concept to measure. The Institute for Economics and Peace collects and analyses data on three measures of peacefulness: the Global Peace Index, which measures the level of negative peace in a country (or the absence of violence); the Positive Peace Index, which measures the levels of institutions and attitudes in place to foster and promote peace; and the Global Terrorism Index, which measures the negative impact of terrorism on lives lost, injuries, and property damage.

The Global Peace Index measures a country's level of violence and conflict (negative peace) based on three domains of peacefulness: ongoing domestic and international conflict; societal safety and security; and militarisation. Together these pillars give an external measure of negative peace, an internal measure of negative peace, and an overall measure of negative peace. Internal peace taps into a measure of how peaceful a country is within its own borders and is calculated based on indicators such as level of perceived criminality in society and homicide rate. External peace taps into the state of peace beyond a country's borders and is based on indicators such as military expenditure as a percentage of GDP and nuclear weapons capabilities. Internal and External peace are weighted and combined to give the Global Peace Index – a ranking between 1 and 5, with 1 being the most peaceful.

Positive peace is defined as the attitudes, institutions, and structures which create and sustain peaceful societies. In IEP's conceptualisation, positive peace is based on eight pillars: a sound business environment; good relations with neighbours; high levels of human capital; acceptance of the rights of others; low levels of corruption; a well-functioning government; free flow of information; and, the equitable distribution of resources. These eight pillars combined give the overall Positive Peace Index – a score between 1 and 5, with 1 being the most peaceful.

The Global Terrorism Index is a score based on four indicators of the negative consequences of terrorism: the total number of terrorist incidents in a year; the total number of fatalities caused by terrorism in a given year; the total number of injuries caused by terrorism in a given year; and, the approximate level of property damage caused by terrorism in a given year. These indicators are aggregated to give an overall Terrorism Index score between 0 and 10, where a higher score represents a worse state of terrorism.

## 4. THE LINK BETWEEN TOURISM, VIOLENCE AND CONFLICT

Tourism can help support peace by putting pressure on governments to cease fighting – whether on an international front or domestically – in order to attract tourists. This is particularly important if tourism is an important sector for an economy. The tourism boycott in Guatemala led by the International Food and Allied Workers in 1979 suppressed the flow of tourism into Guatemala, which was highly dependent on tourism as a source of revenue, which "pressured the military government to desist its violation of human rights" and contributed to the reduction of the ongoing domestic violence<sup>9</sup>. Another example is cross-border tourism in Kashmir (crossing over the line of control), which is an important measure in reducing the friction between India and Pakistan over this disputed territory. By acting as a confidence-building measure for peoples on both sides of the border, cross-border tourism can facilitate better mutual understanding and respect, potentially reducing the intensity of the international dispute<sup>10</sup>. Tourism can also lead to demilitarisation of a country in order to make it a safer environment for tourists to travel. Efforts to remove land mines in Rwanda were in part driven by increasing gorilla tourism in the national parks<sup>11</sup>, and tourism was a driving force for the demilitarisation of Panama after the overthrow of Manuel Noriega in 1989<sup>12</sup>.

Figure 2 shows the relationship between tourism openness and sustainability and violence and conflict as measured by the Global Peace Index. The bivariate correlation matrix between the Tourism Index and the component measures of the Global Peace Index shows that overall the Tourism Index is correlated with lower levels of violence and conflict. There is a stronger correlation between the Tourism Index and internal peace than between the Tourism Index and external peace.

**Figure 2: Bivariate correlation matrix of tourism and measures of violence and conflict**  
The Tourism Index is correlated with lower levels of violence and conflict.

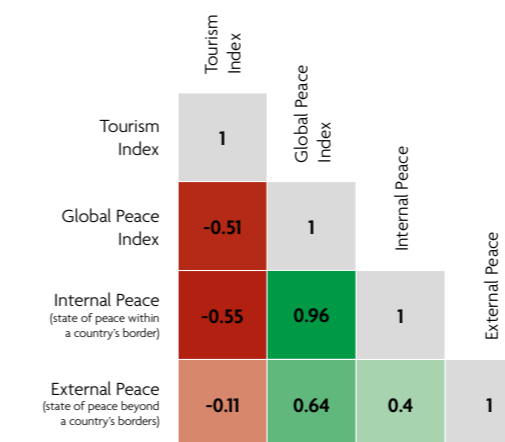


Figure 3 shows the distribution of the Tourism Index and Global Peace Index for all time periods by region of the world<sup>13</sup>. Europe is the best performer on both indicators, while the MENA region, driven by the poor performances of Iraq and Syria, suffers from generally low levels of tourism sustainability and high levels of violence and conflict, although it also shows the greatest variation in scores on both dimensions. Israel is a major positive outlier in the MENA region, with relatively open and sustainably tourism sector despite low levels of negative peace.

<sup>9</sup> Burtner and Castaneda (2010)

<sup>10</sup> Charri et al. (2011)

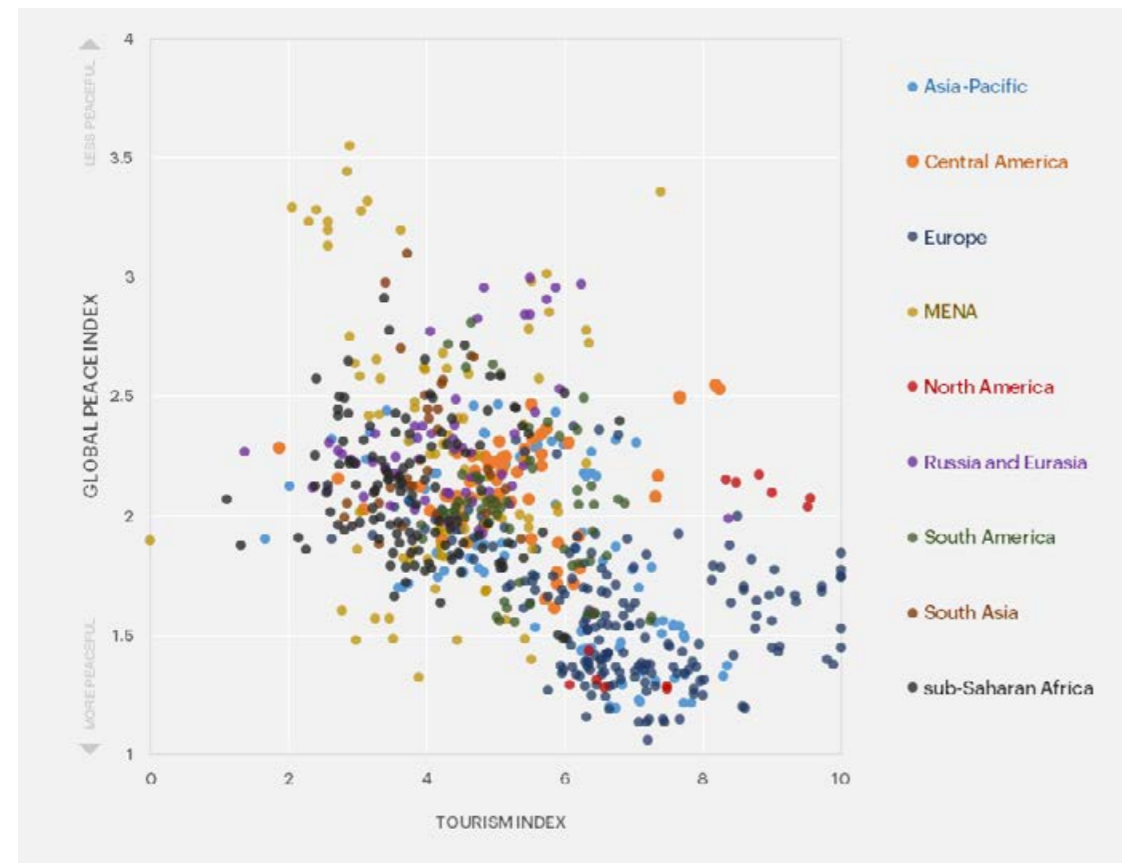
<sup>11</sup> Alluri (2009)

<sup>12</sup> Montero (2014)

<sup>13</sup> The categorisation of countries into regions can be found in the Methodological Appendix.

**Figure 3: Tourism and peacefulness by region**

Countries with more sustainable and open tourism industries tend to be more peaceful.



Asia-Pacific, Europe, MENA, South America, South Asia and sub-Saharan Africa all exhibit a correlation between the Tourism Index and lower levels of violence and conflict, with the Asia-Pacific region showing the strongest correlation at 0.56. Russia and Eurasia, North America, and Central America and the Caribbean all show a correlation between the Tourism Index and higher levels of violence and conflict, with North America having a very strong relationship with a correlation coefficient of 0.87. The United States has a relative lack of external peacefulness due to its military activities in Iraq and Afghanistan as well as high levels of military expenditure, its internal peacefulness is also affected by high levels of incarceration and homicides, all of which contribute to high scores on violence and conflict. The tourism sector of the United States remains relatively unaffected by this both because the state capacity of the United States allows the continued development of tourism openness and sustainability despite its conflicts, and also because there is an innate attractiveness of the United States as a tourism destination which is relatively immune to its foreign policy forays and domestic politics. Russia ranks strongly in the WEF Travel and Tourism Competitiveness Index 2015 as well, 45th of the 141 countries for which data is available, scoring highly on its natural and cultural heritage sites indicating some innate attractiveness of the country for tourism, regardless of the security situation<sup>14</sup>.

### Trends in Tourism, Violence and Conflict

Since 2008, the average score of the Tourism Index across all countries of the world has increased marginally from a value of 4.9 in 2008 to a value of 5.22 in 2015. Tourism's contribution to GDP has grown from a global average of 4.9% in 2005 to 5.3% in 2015, while leisure spending has grown from 3.7% to 4.2% of GDP. Tourism's contribution to employment has grown from 5.1% in 2005 to 5.4% in 2015<sup>15</sup>. And international passenger arrivals around the world has increased from 828 million in 2005 to 1.08 billion in 2013.

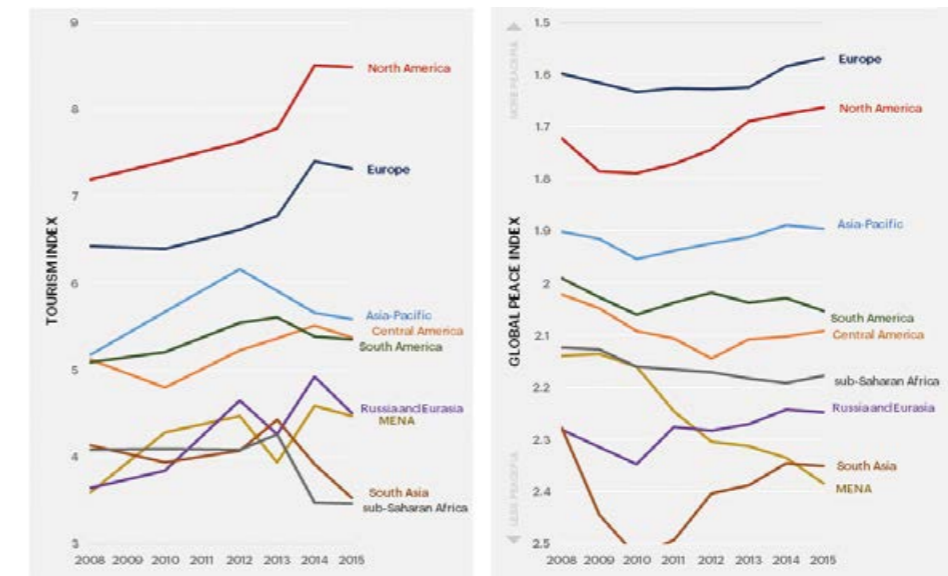
Over the same period, the world has become a more violent place, with homicide rates increasing in Latin America and increased in deaths from internal conflict in sub-Saharan Africa. Decreases in internal peace have led to increasing numbers of refugees and IDPs, with the UN estimating that more than 50 million people are currently refugees or displaced persons, the highest level since World War Two. In addition to this there has been an increase in terrorism over the last decade, with terrorist attacks affecting not just the 'usual suspects': Afghanistan, Iraq, Nigeria, Pakistan, and Syria, but otherwise peaceful countries such as France and Denmark as well<sup>16</sup>. The average score of the Global Peace Index across all countries was 1.98 in 2008, and 2.03 in 2015

<sup>14</sup> The Travel & Tourism Competitiveness Report 2015: Growth through Shocks, World Economic Forum  
<sup>15</sup> This is based on the 158 countries for which the Tourism Index Score has been computed.  
<sup>16</sup> Global Peace Index Report 2015, Institute for Economics and Peace.

Peace is also becoming more unevenly distributed. While Europe has seen increasing levels of external peacefulness, the Middle East continued its trend of deterioration, further increasing the gap between the most and least peaceful regions of the world. In fact, many European nations are seeing historically high levels of peacefulness, with homicide rates falling, military budgets decreasing, and the withdrawal of forces from Iraq and Afghanistan. Regional variation in the trends of both the Tourism Index and the Global Peace Index can be seen in Figure 4.

**Figure 4: Regional trends in tourism and peacefulness 2008 to 2015**

Europe and North America are consistently the best performers on both the Tourism and Global Peace Indexes.



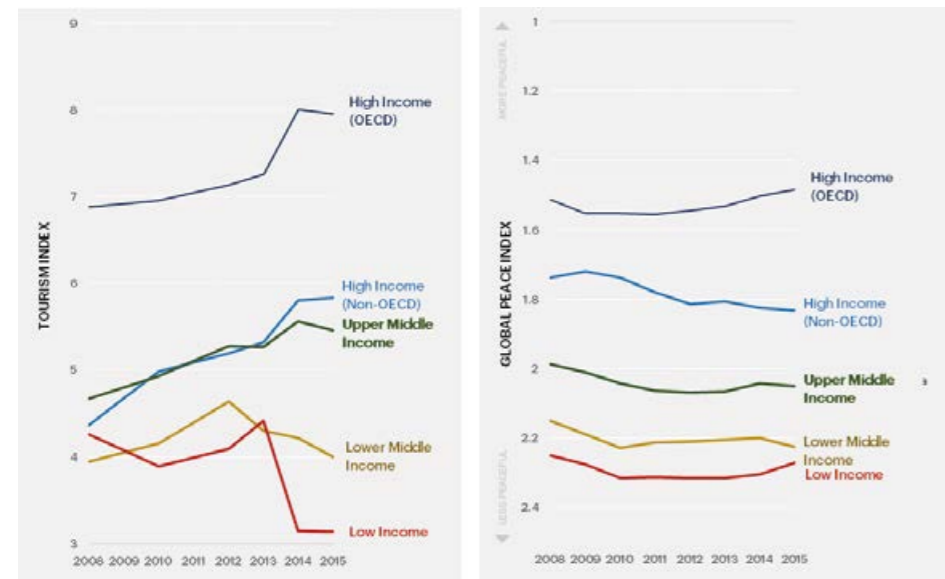
While the MENA region has seen the largest deteriorations in terms of their levels of violence and conflict over the time period due to the conflicts in Iraq and Syria and the upheavals caused by the Arab Spring, the region has seen an improvement in its Tourism Index score. This is in part attributable to the increased economic contribution of the tourism sector to the region; tourism's contribution to GDP in the MENA region increased from an average of 2.4% in 2008 to 3.2% in 2015, while contribution to employment increased mildly from 2.3 to 2.6% over the same time.

Sub-Saharan Africa and South Asia have suffered clear deteriorations in their Tourism Indexes over the last two years. Countries in South Asia faced increasing restrictions on movement; the number of countries to which citizens could travel visa free fell from 91 in 2013 to 63 in 2015. Over the same period however, both regions experienced an improvement in their Global Peace Index scores, after suffering deteriorations (in the case of South Asia quite significant) after 2008. The dramatic decline in peace levels in South Asia after 2008 is driven by Afghanistan which suffered an increase in violence at the same time that there was a massive troop surge headed by the USA, on the orders of newly elected President Obama.

Regional variation does not tell the entire story however, and Figure 5 shows the trends in the Tourism Index and Global Peace Indexes over time broken down by a country's income category.

**Figure 5: Tourism and peacefulness by income category 2008 to 2015**

High income OECD countries are the strongest performers on both the Tourism Index and Global Peace Index. Low income countries are the poorest performers on both indexes.

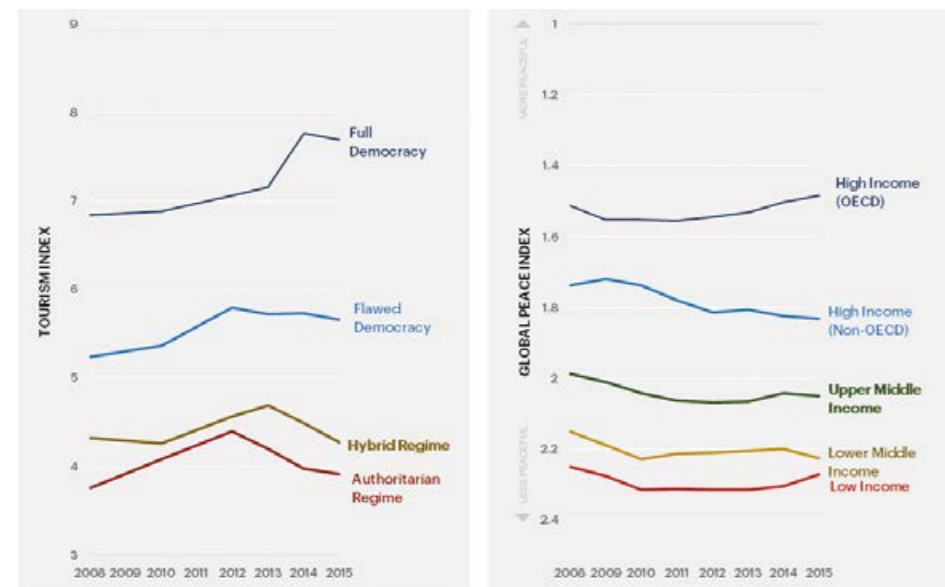


High income non-OECD countries have seen deteriorations in their Global Peace Index scores indicating an increase in violence and conflict, but at the same time have seen the biggest improvements in their Tourism Index scores from any income group. Oman, Qatar, and Saudi Arabia in particular in this group of countries, saw large rises in their Tourism Index scores, driven by increases in spending domestically.

To examine how a country's governance structures may impact tourism openness and sustainability and also violence and conflict, Figure 6 shows the development of the Tourism Index and Global Peace Indexes over time broken down by government type<sup>17</sup>.

**Figure 6: Tourism and peacefulness by government type 2008 to 2015**

Countries classified as full democracies have improved their Tourism Index scores, while hybrid regimes and authoritarian regimes have seen deteriorations in the last three years.



Authoritarian regimes have seen a steady decline in their Global Peace Index scores, and a turn toward deteriorating Tourism Index scores after 2012. Tourism's contribution to GDP fell from an average of 3.9% in 2012 to 3.1% in 2015 for authoritarian countries, and employment fell from 3.4% to 2.8% over the same time. Authoritarian countries also saw a decline in their environmental performance index scores.

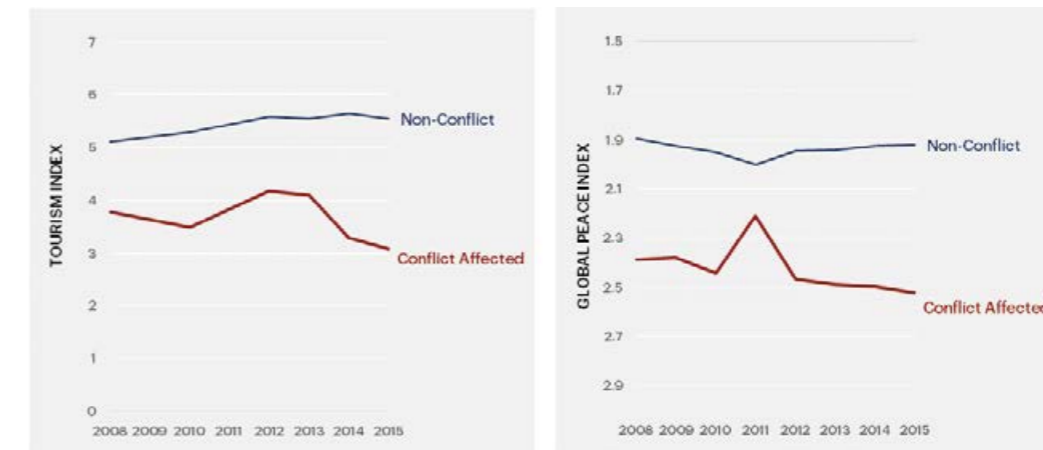
<sup>17</sup> Government type is based on the Economist Intelligence Unit's Democracy Index

Full and flawed democracies have seen the biggest gains in their Tourism Indexes, with levels of violence and conflict remaining relatively stable. While full democracies have seen an increase in the openness of their citizens to travel, with the average number of countries that can be visited without a visa rising from 91 to 98 between 2008 and 2015, flawed democracies have seen the opposite with the average declining from 91 to 84. Flawed democracies however see a greater contribution to GDP from tourism than full democracies.

The global trend of deteriorating peace and increasing peace inequality is attributable to a subset of countries which the United Nations has categorised as conflict-affected. There are 31 conflict-affected countries which are the most fragile in terms of violence and conflict. These are: Afghanistan, Burundi, Central African Republic, Chad, Comoros, Cote d'Ivoire, Democratic Republic of Congo, Guatemala, Guinea, Guinea-Bissau, Haiti, Iraq, Kosovo, Kyrgyz Republic, Lebanon, Liberia, Libya, Madagascar, Mali, Myanmar, Nepal, Niger, Papua New Guinea, Sierra Leone, Somalia, South Sudan, Syrian Arab Republic, Uganda, West Bank and Gaza Strip, and Yemen. Figure 7 breaks down the Tourism and Global Peace Indexes by whether a country is in the UN's list of 31 conflict-affected countries or not.

**Figure 7: Trends in tourism and peacefulness for conflict-affected countries 2008 to 2015**

There is a wide gap in the performance of conflict and non-conflict-affected countries on both their Tourism Index performances and their Global Peace Index performances.



Non-conflict-affected countries outperform conflict-affected countries on every indicator of tourism openness and sustainability. The group of non-conflict-affected countries has seen an improvement in average Tourism Index score while experiencing changes in their levels of conflict and violence - a deterioration post 2008 and then a slow improvement from 2011.

Conflict-affected countries have seen a deteriorating trend in both their Tourism Indexes and Global Peace Indexes since 2008, although this group of countries saw a peak in their performances on the Tourism Index in 2012 and 2013. The peak in average Global Peace Index performance for conflict-affected countries in 2011 is attributable to better performances in Iraq and Myanmar compared to 2010.

### Risers and Fallers in Tourism, Violence and Conflict

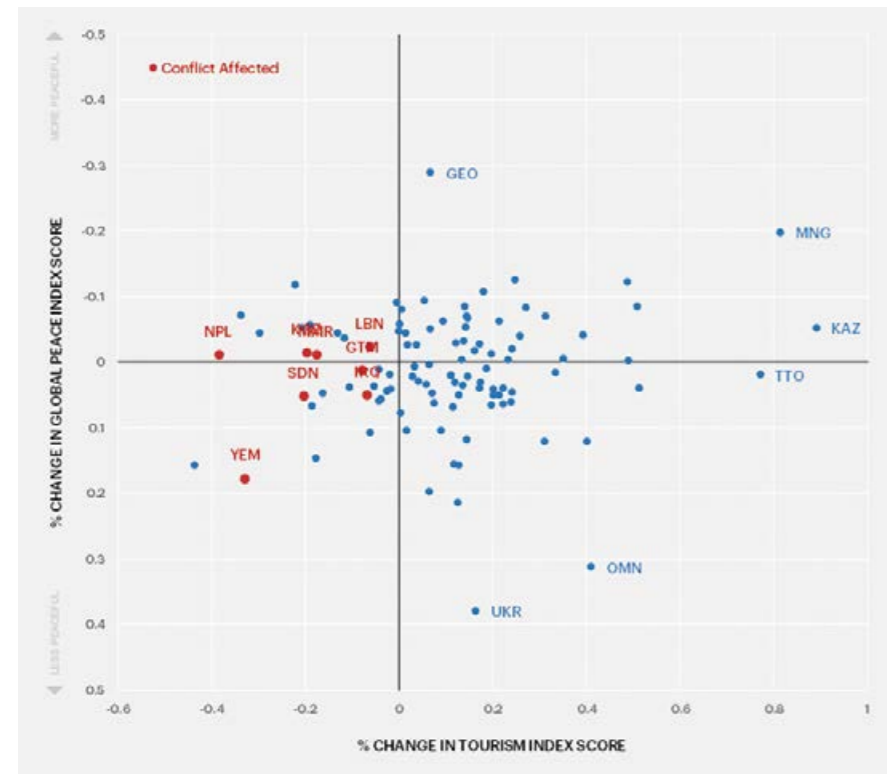
Between 2008 and 2015, of the 104 countries for which data is available, 75 countries saw an increase in their Tourism Index scores. Of these 75, 34 also saw decreases in their Global Peace Index scores (indicating lower levels of conflict and violence). The global average change between 2008 and 2015 in the Tourism Index was an improvement of 10%. Over the same time period, the global average change in the Global Peace Index was a deterioration of 2.4%. There is a weak negative correlation, at a global level, between changes in the Tourism Index and changes in the Global Peace Index, indicating that as tourism sustainability and openness improves, levels of violence and conflict decrease.

Analysing conflict-affected countries separately to the rest of the world tells a more nuanced story. Between 2008 and 2015, the average change in Tourism Index for conflict-affected countries was a deterioration of 14.8%, while non-conflict countries saw an average improvement of 12.8%. Both conflict-affected and non-conflict-affected countries saw a deterioration in their Global Peace Index scores, but the average percentage change deterioration for conflict-affected countries was 6.6%, while for non-conflict-affected countries it was only 1.4%. For conflict-affected countries there is a mild correlation between increases in the Tourism Index and deteriorations in violence and conflict.

Figure 8 shows the overall distribution of changes in Tourism Index compared to changes in violence and conflict from 2008 to 2015. A positive change on the Global Peace Index reflects a higher score which is a deterioration in levels of violence and conflict.

**Figure 8: Distribution of changes in Tourism Index and Global Peace Index 2008 to 2015**

Many non-conflict-affected countries that have seen deteriorations in their Global Peace Index scores have seen improvements in their Tourism Index scores.



There are many non-conflict-affected countries that deteriorate in their Global Peace Index scores but improve in their Tourism Index scores. This speaks again to the resilience of the tourism sector in light of worsening levels of violence and conflict. Ukraine and Oman have seen the biggest deteriorations in their Global Peace Index scores and yet have seen improvements in their Tourism Index scores. Between 2014 and 2015, Ukraine was amongst the top five countries with deteriorations in peace; the continuing war with Russia in the northeast of the country contributing to the declining scores of several indicators of negative peace especially the intensity of internal conflict and ease of access to small arms. At the same time, tourism's contribution to GDP increased from 2.65% to 4.95%. In 2015, Oman was one of the top ten countries in terms of levels of militarisation, but had opened up in terms of ability to travel with an increase in the number of countries allowing visa free access to Omani citizens from 42 in 2008 to 51 in 2015, which also saw an increase in outbound expenditure. Foreign spending in Oman also increased from 0.3 to 1.6% of exports.

Regardless of whether the conflict-affected country has seen improvements or deteriorations in its Global Peace Index score, all conflict-affected countries have seen a deterioration in their Tourism Index scores.

Table 3 shows the top ten risers and top ten fallers for non-conflict-affected states, in terms of the percentage change between 2008 and 2015 of their Global Peace Indexes, as well as the corresponding changes in Tourism Index and international arrivals. The top risers on the global Peace Index are a mix of countries representing various regions, government types and income levels. The top fallers are concentrated in Africa and the Middle East.

**Table 3: Risers and Fallers peacefulness and tourism, non-conflict-affected states 2008 to 2015**

TOP 10 RISERS	% Change Global Peace Index*	% Change Tourism Index	% Change international arrivals	TOP 10 FALLERS	% Change Global Peace Index*	% Change Tourism Index	% Change international arrivals
Georgia	-28.9%	6.5%	6.5%	Ukraine	38%	16.3%	-3.1%
Mongolia	-19.8%	81.3%	81.3%	Oman	31.2%	40.9%	12.9%
Poland	-12.6%	24%	24%	Mexico	21.4%	12.5%	5.3%
Armenia	-12.2%	48.7%	48.7%	Egypt	19.8%	6.3%	-25.4%
Benin	-11.8%	-22.1%	-22.1%	Tunisia	15.7%	12.8%	-11.1
Denmark	-10.8%	17.8%	17.8%	Nigeria	15.7%	-43.7%	-54.3%
Croatia	-9.4%	5.3%	5.3%	Cyprus	15.5%	11.7%	0%
Sri Lanka	-9.1%	-0.6%	-0.6%	Mozambique	14.6%	-17.8%	58.1%
Saudi Arabia	-8.5%	50.8%	50.8%	Cameroon	12.1%	40.1%	87%
Spain	-8.4%	14%	14%	South Africa	12%	30.9%	-0.5%

\*A negative change means an improvement, a positive change means a deterioration in peace

Eight of the top ten risers in terms of levels of negative peace saw an improvement in their Tourism Indexes between 2008 and 2015, but more interestingly, eight of the top ten fallers in terms of negative peace also saw an improvement in their Tourism Index scores. Rather than increasing levels of violence and conflict damaging a country's tourism industry, the sustainability and openness of the tourism sector is resilient in the face of worsening levels of violence and conflict.

Examining conflict-affected states alone tells a slightly different story. Table 4 shows the top four risers and fallers with the conflict-affected states group, in terms of changes in their Global Peace Index scores.

**Table 4: Risers and fallers peacefulness and tourism, conflict-affected states 2008 to 2015**

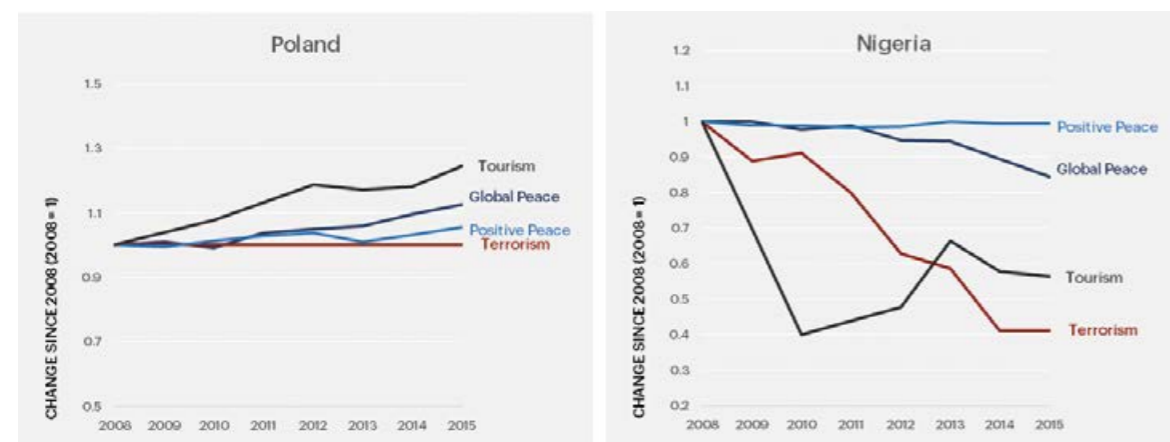
TOP 4 RISERS	% Change Global Peace Index*	% Change Tourism Index	% Change international arrivals	TOP 4 FALLERS	% Change Global Peace Index*	% Change Tourism Index	% Change international arrivals
Lebanon	-2.3%	-3.9%	-4.4%	Yemen	17.7%	-37.5%	-3.2%
Kyrgyz Republic	-1.4%	-20.7%	66.8%	Sudan	5.3%	-55%	34.3%
Myanmar	-1.1%	-17.7%	179.6%	Iraq	5.1%	-4.8%	3.2%
Nepal	-1.1%	-38.4%	59.6%	Guatemala	1.3%	-7.8%	-12.8%

## Two cases compared<sup>18</sup>: Poland and Nigeria

While Poland has made significant improvements in terms of its Global Peace Index performance and Tourism Index performance between 2008 and 2015, Nigeria headed in the opposite direction with negative growth on both fronts. Figure 9 compares the development of Poland and Nigeria over time, showing the relative changes in their scores using 2008 as a reference year. A score above one indicates an improvement in the particular peace measure.

**Figure 9: Poland and Nigeria tourism and peacefulness over time (2008=1)**

Poland has made significant improvements in terms of its Global Peace Index performance and Tourism Index performance between 2008 and 2015, while Nigeria's performance has deteriorated significantly.



Poland's Tourism Index score grew by 24% between 2008 and 2015. Poland has seen an average annual growth rate of tourism's contribution to GDP of 2.5%, and tourism's contribution to GDP is expected to grow by 4.5% per annum until 2025. Poland has also experienced increase in its visa free travel, and environmental performance. 2012 saw a spike in visitor numbers to Poland as it co-hosted the UEFA European Championships with Ukraine, which was also an instigator for increased capital investment in tourist infrastructure. Capital investment increased from approximately 3.4% of GDP in 2008 to approximately 3.6% of GDP in 2015<sup>19</sup>. On 18 August 2015, the Council of Ministers adopted a resolution approving the Tourism Development Programme until 2020, which is focused on the sustainable development of high-quality tourism. Between 2008 and 2015, Poland's Global Peace Index score fell by 12.6%. A major contributing factor to this improvement in negative peace was the reduction in the levels of perceived criminality. Poland also saw a 5.5% improvement in its Positive Peace Index score between 2008 and 2015. Both improved relations with neighbours and a better functioning government were the major drivers of this improvement.

Nigeria has seen a decline of 36% in its performance on the Tourism Index, in part due to a decreased contribution to GDP coming from tourism over the period, from 2.4% in 2008 to around 1.7% in 2015. International arrivals also declined by a dramatic 54%. Additionally, while many countries experienced an opening in terms of visa restrictions, Nigeria remained relatively stagnant on this front, with Nigerians being able to travel to only 49 countries without visas. At the same time, Nigeria saw a 15% deterioration in its levels of negative peace, in large part due to the increase impact of terrorism on the country, which is also seen in the dramatic deterioration in the Global Terrorism Index. In 2015 Boko Haram became the most deadly terrorist organisation in the world, eclipsing both ISIS and Al-Qa'ida. Nigeria suffered 23% of total terrorist related deaths in the world in 2014<sup>20</sup>. Nigeria is considered one of the countries at greatest risk of adverse effects from urbanisation in terms of societal safety and security. Between 2008 and 2015, Nigeria saw a mild decline in its Positive Peace Index score of 0.6% although it exhibited increases in the free flow of information.

## Tourism as a Force for Negative Peace

To date, there has been little systematic examination of the causal connection between tourism and violence and conflict or a lack thereof. There has been one piece of global empirical analysis done, which found that tourism is a beneficiary of negative peace rather than a predictor of it. The analysis however only considered international arrivals data as the measure of tourism which does not comprehensively capture the character of the tourism sector<sup>21</sup>.

The analysis is replicated using the Tourism Index as a measure of tourism, since it captures the sustainability and openness of the tourism sector. A simple bivariate relationship between Tourism sustainability and violence and conflict is analysed, not controlling for other factors that

<sup>18</sup> The case studies were selected based on more 'extreme' performances in terms of improvements or deteriorations in either the respective measures of peace and terrorism, or on the Tourism Index. This was done to highlight the bigger differences, and as a starting point for hopefully further research which can systematize the nuances in case trajectories.

<sup>19</sup> "Travel & Tourism: Economic Impact 2015 Poland", World Travel and Tourism Council Report 2015.

<sup>20</sup> "Global Terrorism Index Report 2015: Measuring and understanding the Impact of Terrorism", Institute for Economics and Peace Report 2015.

<sup>21</sup> Pratt and Liu (2015)

may independently affect levels of peace. If a causal relationship exists, it is not a contemporaneous one: the sustainability and openness of the tourism sector affects levels of violence and conflict at future points of time, not 'today'. The data is analysed using panel data regression which is standard practice for cross-sectional and temporal data, the specifics of which can be found in the methodological appendix.

The results from the analysis indicate that the Tourism Index is a good predictor of future levels of external peace, and a mild predictor of overall levels of violence and conflict, but it has no significant effect on future levels of internal peace. A one unit improvement on the Tourism Index this year will see a decrease of 0.03 on the Global Peace Index score (corresponding to lower levels of violence and conflict), in two years' time.

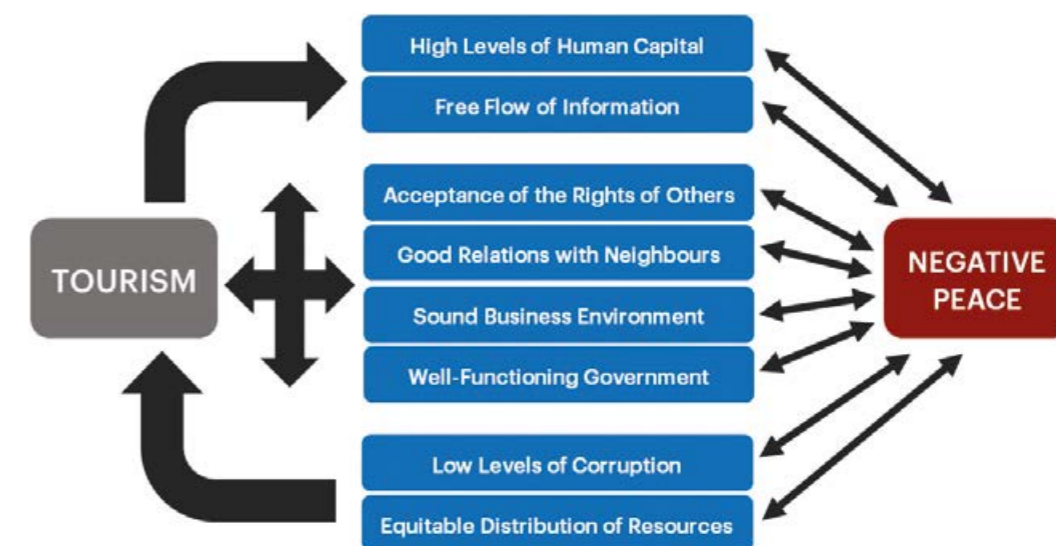
## 5. THE LINK BETWEEN TOURISM AND POSITIVE PEACE

The link between tourism and the pillars of positive peace is not uni-directional. While tourism may help to increase good relations with neighbours by promoting cross-cultural understanding, for example, having good relations with neighbours provides an enabling environment for increased tourism. Positive peace is in turn a pre-cursor to sustained decreases in violence and conflict, or negative peace. In 2015, nearly one third of 162 countries had positive peace scores that were higher than their negative peace scores, indicating a strong potential to become more peaceful. At the same time, many low income countries had positive peace scores lower than their negative peace scores indicating a potential for violence to increase. The majority of these countries are in sub-Saharan Africa.

Figure 10 summarises the relationships between open and sustainable tourism, the eight pillars of positive peace as defined by the Institute for Economics and Peace, and violence and conflict.

**Figure 10: The relationships between sustainable tourism, positive peace and negative peace**

The relationship between tourism and positive peace is not always uni-directional.



Tourism affects positive peace through a number of mechanisms. As people become more exposed to other cultures and people through Travel & Tourism, their degree of tolerance and acknowledgement of the rights of others should increase. Governments too may be forced to acknowledge the rights of local populations in working together with them to facilitate and accommodate the development of a tourism sector. In Myanmar the government responded to increasing tourism interest by developing a policy on community involvement in tourism, recognising the rights of local communities to be involved in and benefit from the tourism sector<sup>22</sup>.

Increases in tourism sustainability can lead to improvements of the functioning of governments as they respond to demand and aim to create a welcoming environment for further tourism expansion. In Nepal, the government response to increased influxes of tourists to Pokhara led to the implementation of Codes of Conduct for Peace Responsive Tourism to guide the behaviours of all stakeholders<sup>23</sup>. The Election Period Tourism Operating procedures in Kenya, set up in response to tourist fluctuations around election time, provides a platform for stakeholders to work together to promote and maintain peace during periods of heightened political tensions<sup>24</sup>.

The tourism sector has faced criticism for not contributing to the development of human-capital, employing local people only in low-skilled work which causes a paralysis in human capital development. Proponents of tourism as a force for good however claim that as tourism grows

<sup>22</sup> Hausler and Baumgartner (2014)

<sup>23</sup> Upadhyaya (2014)

<sup>24</sup> Lagat et. Al (2014)



and the tourist sector develops, a whole host of skills become necessary for local populations including languages and business skills. In Namibia, the development of the tourism sector has led to local communities developing skills such as languages and trades such as cooking, leading to increased human capital development<sup>25</sup>. 'Township tourism' in South Africa has led to both informal and formal skills acquisition by community members in Alexandra Township, Johannesburg<sup>26</sup>.

Increased tourism may lead to increases in the flow of information, both within a country and across borders as people share experiences and ideas. In Northern Ireland, political tourism has seen an increase in people travelling to the region to learn more about the conflict and history which has in turn enabled understanding and information sharing<sup>27</sup>.

Changes in relations with neighbours may also be affected by tourism. At an individual level, travelling to neighbouring countries may promote understanding and tolerance of the other. At the state level, travelling to neighbouring countries may promote mutually beneficial economic gain. For example, Israeli ecotourists visiting Jordan had positively altered their perceptions of Jordanian institutions and culture, when compared to a control group that did not travel<sup>28</sup>. Similarly, visits to Mt. Gumnang by South Koreans positively influence their views of North Korea, both at the individual level, but also at the national level<sup>29</sup>.

Figure 11 shows the bivariate correlation matrix between the Tourism Index and measures of Positive Peace. There is a strong correlation between the Positive Peace Index and the Tourism Index, reflecting a positive relationship between levels of positive peace and tourism sustainability. Of all the positive peace pillars, high levels of human capital and a sound business environment have the strongest correlations with the Tourism Index.

**Figure 11: Bivariate correlation matrix between Tourism Index and Positive Peace**  
All pillars of positive peace have strong correlations with the Tourism Index.

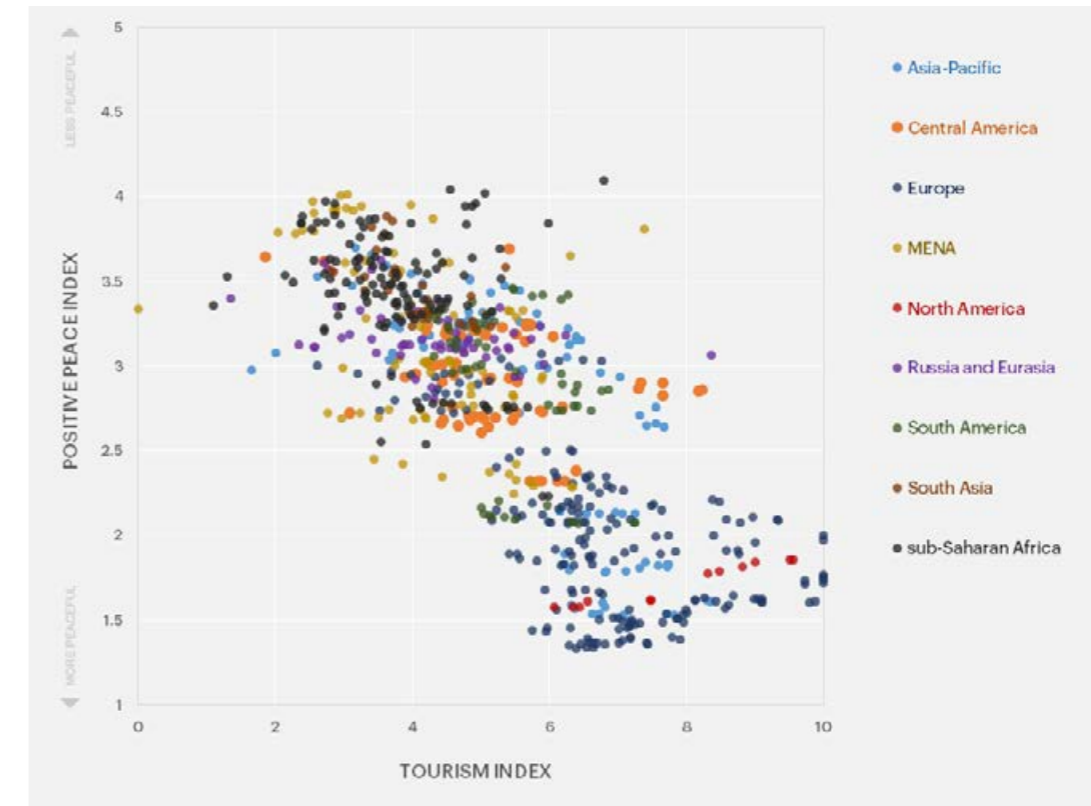
	Tourism Index	Acceptance of the Rights of Others	Equitable Distribution of Resources	Free Flow of Information	Good Relations with Neighbours	High Levels of Human Capital	Low Levels of Corruption	Positive Peace Index Overall	Sound Business Environment	Well-Functioning Government
Tourism Index	1									
Acceptance of the Rights of Others	-0.65	1								
Equitable Distribution of Resources	-0.72	0.69	1							
Free Flow of Information	-0.56	0.79	0.57	1						
Good Relations with Neighbours	-0.64	0.77	0.61	0.69	1					
High Levels of Human Capital	-0.77	0.77	0.89	0.66	0.66	1				
Low Levels of Corruption	-0.7	0.86	0.71	0.75	0.76	0.77	1			
Positive Peace Index Overall	-0.77	0.9	0.84	0.81	0.83	0.91	0.94	1		
Sound Business Environment	-0.74	0.78	0.8	0.67	0.74	0.87	0.88	0.93	1	
Well-Functioning Government	-0.67	0.76	0.73	0.64	0.69	0.8	0.89	0.9	0.84	1

25 Ashley (2000)  
26 Kaplan (2004)  
27 Simone-Charteris and Boyd (2010)  
28 Pizam et. AL (2002)  
29 Kim et. AL (2007)

The relationship between positive peace and tourism openness and sustainability is not uniform around the world. The distribution of scores on both indexes is presented in Figure 12, showing substantial variation between regions.

**Figure 12: Regional distribution of tourism and positive peace 2008 to 2015**

Europe and North America perform best on positive peace and tourism sustainability, but there is no clear laggard region – MENA, sub-Saharan Africa and South Asia have all performed poorly.



Europe and North America perform best on positive peace and tourism sustainability, but there is no clear laggard region – MENA, sub-Saharan Africa and South Asia have all performed poorly. The MENA region exhibits the greatest variation in both Tourism and Positive Peace Index scores. Bahrain in particular presents an outlier case for the MENA region with high scores on the Tourism Index but low levels of positive peace.

Each region bar North America exhibits a similar relationship between positive peace and the Tourism Index, where higher scores on the Tourism Index are associated with higher levels of positive peace. The strength of this relationship varies between regions with the Asia-Pacific region having the strongest relationship and the Russia and Eurasia region having the weakest relationship. North America's Tourism Index correlates with lower levels of positive peace. While the USA has seen large deteriorations in corruption and levels of press freedom, this has not affected its tourism sustainability and openness.

### Trends in Tourism and Positive Peace

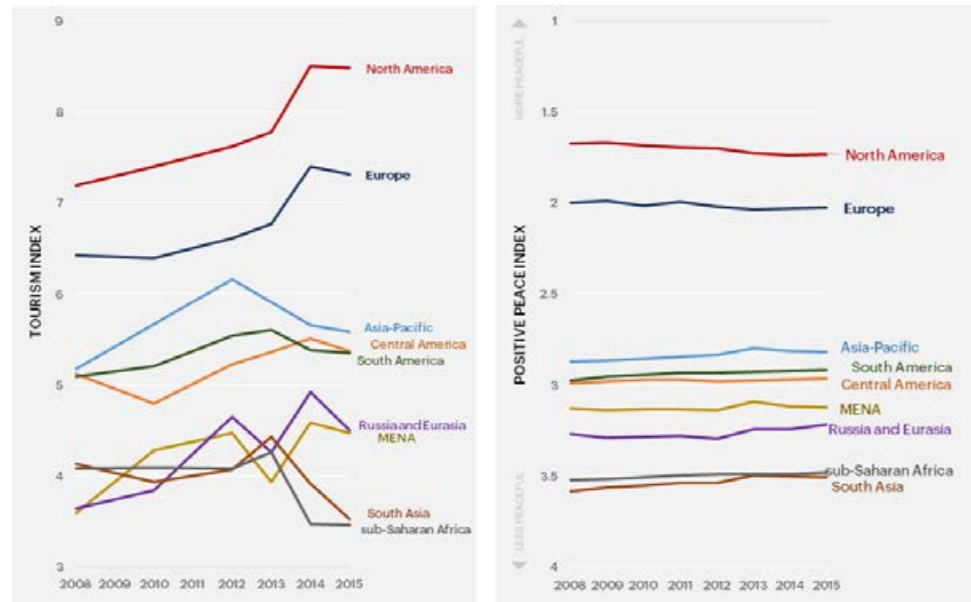
The average score of the Positive Peace Index across all countries saw very little movement, with a score of 2.95 in 2008, and a score of 2.93 in 2015. Changes in the Positive Peace Index often take a long time to emerge, but some pillars have changed more than others. Acceptance of the rights of others and free flow of information have seen the most movement since 2008, while high levels of human capital and good relations with neighbours show little movement. Low levels of corruption is the pillar that has deteriorated the most between 2005 and 2015, with 99 countries recording a deterioration compared with 62 that have seen improvements. Hungary, Greece, the United States and Iceland have recorded the largest deteriorations in positive peace scores (all by more than 5%), but in general democracies have consistently had the strongest levels of positive peace. Similarly, high income OECD countries have the highest levels of positive peace, while low income countries have the lowest levels of positive peace<sup>30</sup>.

Global variation exists in positive peace performance, as seen in Figure 13 which shows the trend over time of the Tourism Index and Positive Peace Index by region.

30 Positive Peace Report 2015, Institute for Economics and Peace.

**Figure 13: Regional trends in tourism and positive peace 2008 to 2015**

Europe and North America are the historically the strongest performers on both Tourism and Positive Peace Indexes, while sub-Saharan Africa and south Asia are the weakest performers.



While South Asia and sub-Saharan Africa have seen declines in their Tourism Index scores, these regions have also seen mild improvements in their overall levels of positive peace. Both regions made the biggest gains in free flow of information and equitable distribution of resources.

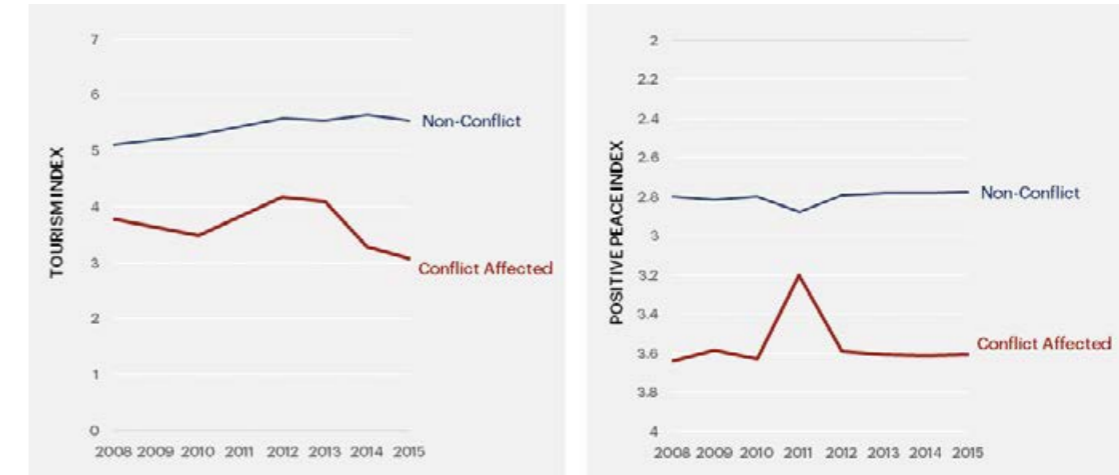
Looking at other global breakdowns, there is a substantial variation in performance on the Positive Peace Index by income group, with high income OECD countries performing the strongest, with an average positive peace score of 1.76 in 2015. This is in contrast to low income countries who have been historically the poorest performers with an average score of 3.6 in 2015. High income OECD countries did not, however, improve across all pillars of positive peace between 2008 and 2015: well-functioning government and low levels of corruption seeing deteriorations in their scores. At the same time, low income countries saw improvements in the equitable distribution of resources.

Broken down by government type, full democracies are the best performers on both Tourism and Positive Peace Indexes while hybrid regimes are the poorest performers. This variation by government type on positive peace performance is not surprising since one of the pillars of positive peace is a well-functioning government of which a key indicator is the democratic political culture. Hybrid regimes score worst on this pillar of positive peace – worse even than authoritarian regimes.

The largest divide in terms of performance on both the Tourism and Positive Peace Indexes runs between conflict-affected and non-conflict-affected countries, as seen in Figure 14. Both groups of countries show a correlation between the Tourism Index and higher levels of Positive Peace, but the strength of the correlation is significantly higher for non-conflict-affected countries.

**Figure 14: Trends in tourism and positive peace, conflict-affected countries 2008 to 2015**

There is a clear historical divide between conflict-affected countries and non-conflict-affected countries on Tourism Index scores and Positive Peace Index scores.



The positive peace divide between conflict and non-conflict-affected countries is larger than the violence and conflict divide, with conflict-affected countries having an average score of 3.55 on the Positive Peace Index versus 2.8 for non-conflict-affected countries. On the Global Peace Index the average is 2.4 for conflict-affected countries and 1.9 for non-conflict-affected countries.

### Risers and Fallers in Tourism and Positive Peace

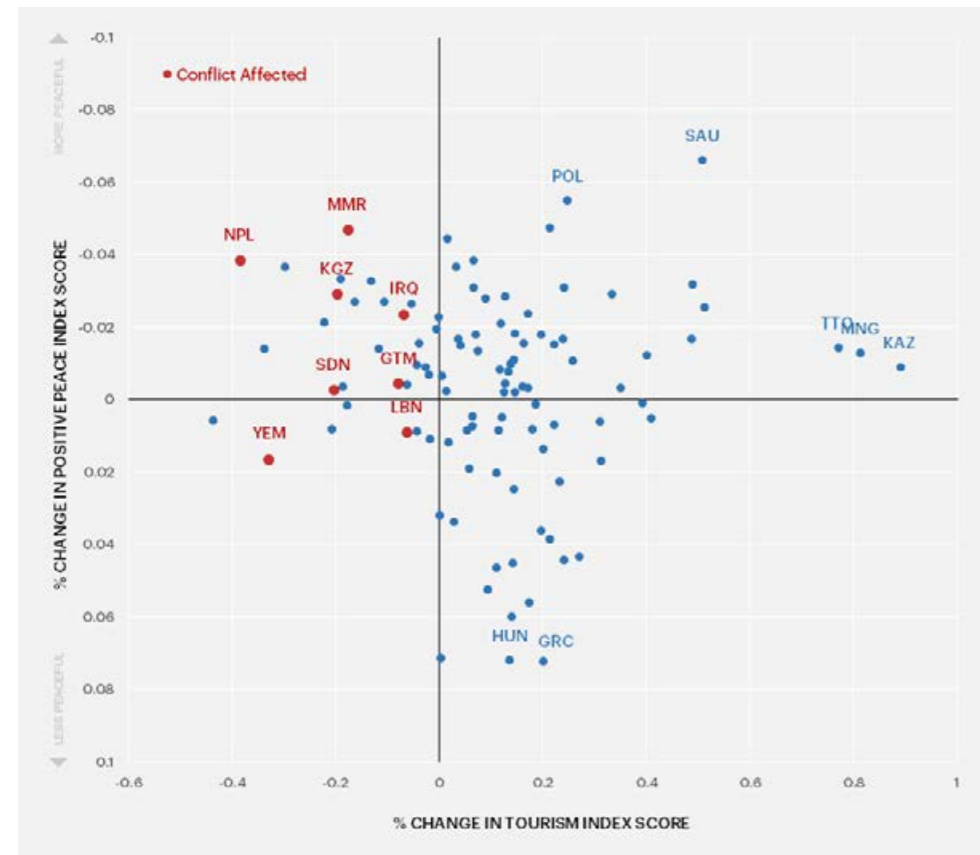
Between 2008 and 2015, of the 104 countries for which data is available, 84 countries saw an increase in their Tourism Index scores. Of these 84, 47 also saw improvements in their levels of positive peace. The global average change of 10% improvement in the Tourism Index score was accompanied by a global average change of 0.5% improvement on the Positive Peace Index score.

When disaggregated by conflict-affected country and non-conflict-affected country, the data shows a strong correlation between increases in Tourism Index and decreases in positive peace for conflict-affected countries (correlation coefficient of 0.5). There is no strong correlational relationship for non-conflict-affected countries. The average change in Positive Peace Index for conflict-affected countries between 2008 and 2015 was an improvement of 0.8%, while the average change for non-conflict-affected countries was an improvement of 0.4%.

Figure 15 shows the distribution of changes in the Tourism Index and changes in the Positive Peace Index between 2008 and 2015. On one end of the spectrum are cases such as Sudan, Nepal, and Myanmar which have seen deteriorations in their Tourism index score but improvements in their positive peace scores. But the more interesting cases see improvements in the Tourism Index scores while their positive peace scores deteriorate. Many non-conflict-affected countries fall into this category, indicating a resilience of the tourism sector to deteriorations in positive peace.

**Figure 15: Distribution of changes in Tourism Index and Positive Peace Index**

Many countries whose positive peace levels have fallen have nonetheless seen improvements in their Tourism Index scores.

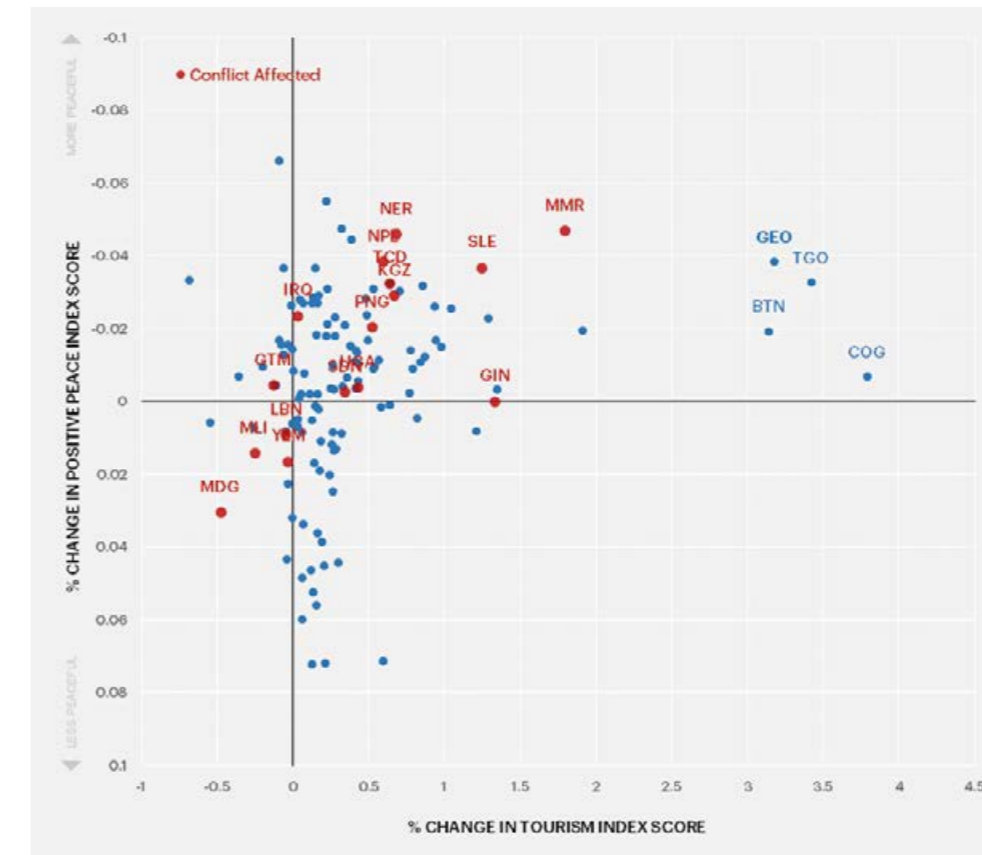


Although conflict-affected countries perform worse on average than non-conflict-affected countries in terms of positive peace scores, the majority of conflict-affected countries saw improvements in their positive peace scores over the 2008 to 2015 period. This is not true of non-conflict-affected countries.

Examining the relationship between the Positive Peace Index and international arrivals data, which provides a longer time series comparison (from 1996 to 2015), the distribution of changes in these numbers is shown in Figure 16. Almost all countries increase in their international arrivals numbers irrespective of whether they've increased or decreased in their positive peace scores<sup>31</sup>.

**Figure 16: Changes in International Arrivals and Positive Peace Index 1996 to 2015**

Most countries have seen an increase in international arrivals since 1996 regardless of whether levels of positive peace have improved or deteriorated.



The idea that the tourism sector is resilient to changes in positive peace is evidenced by looking at the top ten risers and fallers (2008 to 2015) in terms of their percentage change of the Positive Peace Index, shown in Table 5<sup>32</sup>. Six of ten countries who saw the most dramatic increases in positive peace also saw large increases in their tourism index, but more interestingly, all ten countries who saw the biggest declines in their positive peace scores still saw improvements in their Tourism Index scores as well as numbers of international arrivals.

**Table 5: Risers and fallers positive peace, non-conflict-affected countries 2008 to 2015**

TOP 10 RISERS	% Change Global Peace Index*	% Change Tourism Index	% Change international arrivals	TOP 10 FALLERS	% Change Global Peace Index*	% Change Tourism Index	% Change international arrivals
Saudi Arabia	-6.6%	50.8%	103%	Greece	6.5%	19.9%	12.4%
Poland	-5.5%	24.7%	21.9%	Hungary	7.5%	12.6%	21.1%
Chile	-4.9%	20.8%	32%	Iceland	6.4%	3.1%	59.4%
Uruguay	-4.6%	1.6%	38.4%	Spain	4.4%	24.1%	6.1%
Georgia	-3.8%	6.5%	318%	Slovenia	4.2%	11.5%	15.4%
Zimbabwe	-3.6%	-31.3%	-6.3%	Austria	5.2%	9.4%	13.1%
Brazil	-3.7%	-29.8%	15.1%	Italy	4.3%	13.5%	11.6%
Bangladesh	-3.6%	-11.5%	-68.3%	United States	4.6%	17.5%	20.3%
Togo	-3.3%	-13.1%	34%	Russia	4.4%	24%	26.9%
Qatar	-3.5%	24.1%	70.4%	Czech Republic	4.3%	27.1%	-3.9%

\*A negative change means an improvement, a positive change means a deterioration in peace

<sup>31</sup> There is only a very weak negative correlation (coefficient of -0.05) between changes in the Positive Peace Index and changes in the number of international arrivals when looking at all country data, or broken down by conflict-affected and non-conflict-affected countries.

<sup>32</sup> The countries appearing in the table are selected so that they have both a PPI score and a Tourism Index score. There are some countries which have PPI scores but do not have a Tourism Index score because of a lack of data, and these countries are excluded from the risers and fallers analysis.

The list of top fallers in positive peace is considerably different than the list of top fallers in violence and conflict, with the majority of top fallers being high-income OECD democracies. The top risers on the other hand prove to be a mixed group regionally and in terms of government type.

Table 6 examines risers and fallers for only conflict-affected countries, and finds a similar pattern as with negative peace. All countries, regardless of whether they have improved or deteriorated in positive peace, see declines in their Tourism Indexes.

**Table 6: Risers and fallers positive peace, conflict-affected countries 2008 to 2015**

TOP RISERS	% Change Global Peace Index*	% Change Tourism Index	% Change international arrivals	TOP FALLERS	% Change Global Peace Index*	% Change Tourism Index	% Change international arrivals
Myanmar	-4.7%	-17.7%	179%	Yemen	1.7%	-37.5%	-3.2%
Nepal	-3.8%	-38.4%	59.6%	Lebanon	0.9%	-3.9%	-4.4%
Kyrgyz Republic	-2.9%	-19.7%	66.8%				
Iraq	-2.3%	-6.8%	-				
Guatemala	-0.4%	-7.8%	-12.8%				

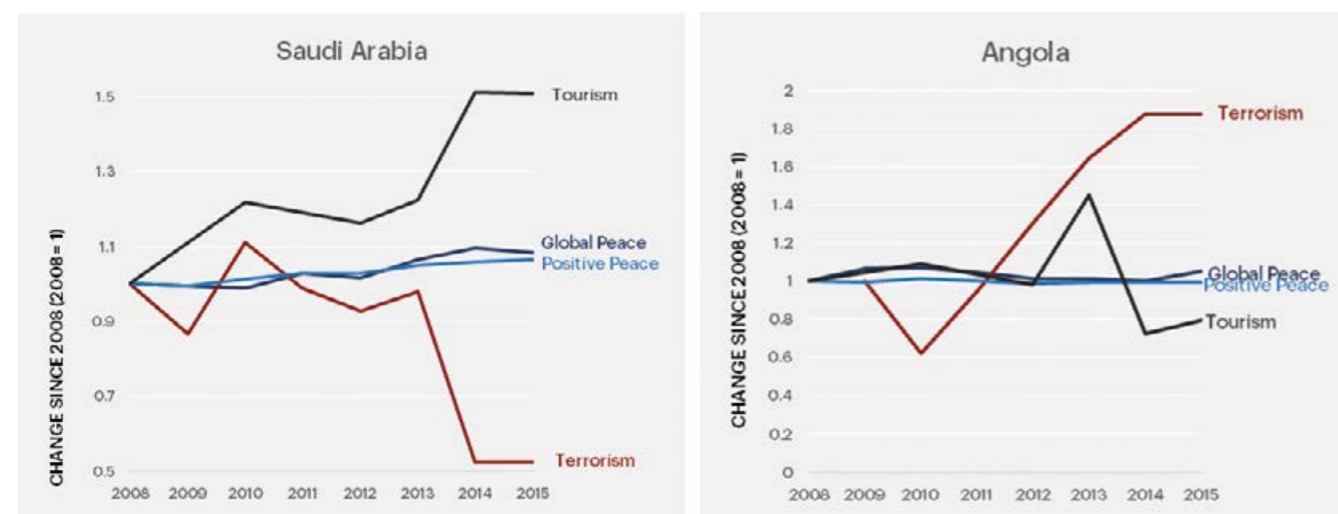
\*A negative change means an improvement, a positive change means a deterioration in peace

## Two cases compared: Saudi Arabia and Angola

Positive peace is a slow moving index where the global average change between 2008 and 2015 was an improvement of 0.5%. Given that, Saudi Arabia's improvements on both the Positive Peace Index and the Tourism Index are exceptional. Angola, on the other hand, was one of the top ten fallers in the Tourism Index, and also saw a marked deterioration in its Positive Peace Index. The development of the indexes for these two countries can be seen in Figure 17.

**Figure 17: Saudi Arabia and Angola tourism and positive peace 2008 to 2015 (2008 =1)**

Saudi Arabia has seen a steady improvement in performance on Tourism Index and Positive Peace Index, while Angola has suffered deteriorations in both.



Saudi Arabia's main form of tourism is religious tourism as millions of religious tourists every year make the pilgrimage to Mecca. Saudi Arabia's improvement in Tourism Index score can be linked to the strategic policy by the Saudi government to develop tourist infrastructure to support the tourist sector in light of increasing numbers of pilgrims to Mecca. In 2014, a decision was made to invest the equivalent of \$8.93 billion in the sector until 2020<sup>33</sup>. Inbound tourism has increased by over 100% since 2000 and Saudi outbound tourism has also increased from 2 million people in 2006 to 15.3 million people in 2011<sup>34</sup>. At the same time, Saudi Arabia's positive peace score has improved by 44%. This is in

33 E Turbo News: Global Travel industry News, "Saudi Arabia to invest nearly \$8.93 billion in tourism sector", February 27th 2014, [http://www.eturbonews.com/43167/saudi-arabia-invest-almost-\\$8.93-billion-tourism-sector](http://www.eturbonews.com/43167/saudi-arabia-invest-almost-$8.93-billion-tourism-sector)  
34 Al Arabiya, "For tourism industry, Saudis are appealing guests", March 15th 2014, <http://english.alarabiya.net/en/life-style/travel-and-tourism/2014/03/15/For-tourism-industry-Saudis-are-appealing-guests>.

part due to increases in the sound business environment and the acceptance of the rights of others. Saudi Arabia saw a 9.3% improvement in its Global Peace Index score between 2008 and 2015, making the most significant progress in its levels of internal peace. Only Saudi Arabia's militarisation domain of negative peace saw a decline in performance as it increased military expenditure. Between 2013 and 2014 Saudi Arabia saw a significant increase in its Terrorism Index, because of a terrorist attack carried out on Saudi soil by al-Qa'ida in the Arabian Peninsula – the first such attack in several years.

Meanwhile in Angola, whose Tourism Index declined by 25% between 2008 and 2015, almost all economic indicators of tourism have seen a decline since 2008 except for foreign spending as a percentage of exports. The most dramatic decline was in tourism's contribution to employment which more than halved in the time period from 3.5% in 2008 to 1.6% in 2015. Although international arrivals have increased by almost 300% since 1996 and the end of the civil war, Angola's environmental performance has also declined significantly in the time period. Angola has seen a 0.8% percent decline in its Positive Peace Index, mostly a result of decreases in its well- functioning government indicator. On the negative peace front, Angola saw a 5.2% deterioration in its Global Peace Index, due to a decrease in its safety and security situation. Angola's terrorism score saw a spike in 2010 with the bus attack on the Togo National Football team at the Africa cup in January 2010.

## Tourism as a force for Positive Peace

To date, there has been no systematic examination of the causal connection between tourism and the institutions, attitudes and structures that create and sustain peaceful societies. As a first step to fill this gap in research, a simple bivariate relationship between tourism sustainability and positive peace is analysed, not controlling for other factors that may independently affect levels of peace. Similarly to violence and conflict, if a causal relationship exists, it is not a contemporaneous one: the sustainability and openness of the tourism sector affects the institutions, attitudes and structures that undergird peace at future points of time, not 'today'. The data is analysed using panel data regression, which is standard practice for cross-sectional and temporal data, the specifics of which can be found in the methodological appendix.

The results from the analysis indicate that the Tourism Index is a good predictor of future levels of overall positive peace: countries that have more open and sustainable tourism sectors will likely enjoy higher levels of positive peace in the future. An increase of one unit on a country's Tourism Index score this year will lead to a decrease in the Positive Peace Index (an improvement in levels of positive peace), of 0.012 in two years' time. While the magnitude of this effect may not seem large at first, it must be remembered that the actualised range of scores on the PPI is between 1.33 and 4.27, and that the index moves very slowly over time.

## 6. THE LINK BETWEEN TOURISM AND TERRORISM

Terrorists often target tourists deliberately, as in the case of the bombing of a Russian airliner in Egypt in 2015, or the Tunisia beach shootings the same year. At other times, tourists are indirectly affected by terrorist acts such as the 9/11 attacks in New York.

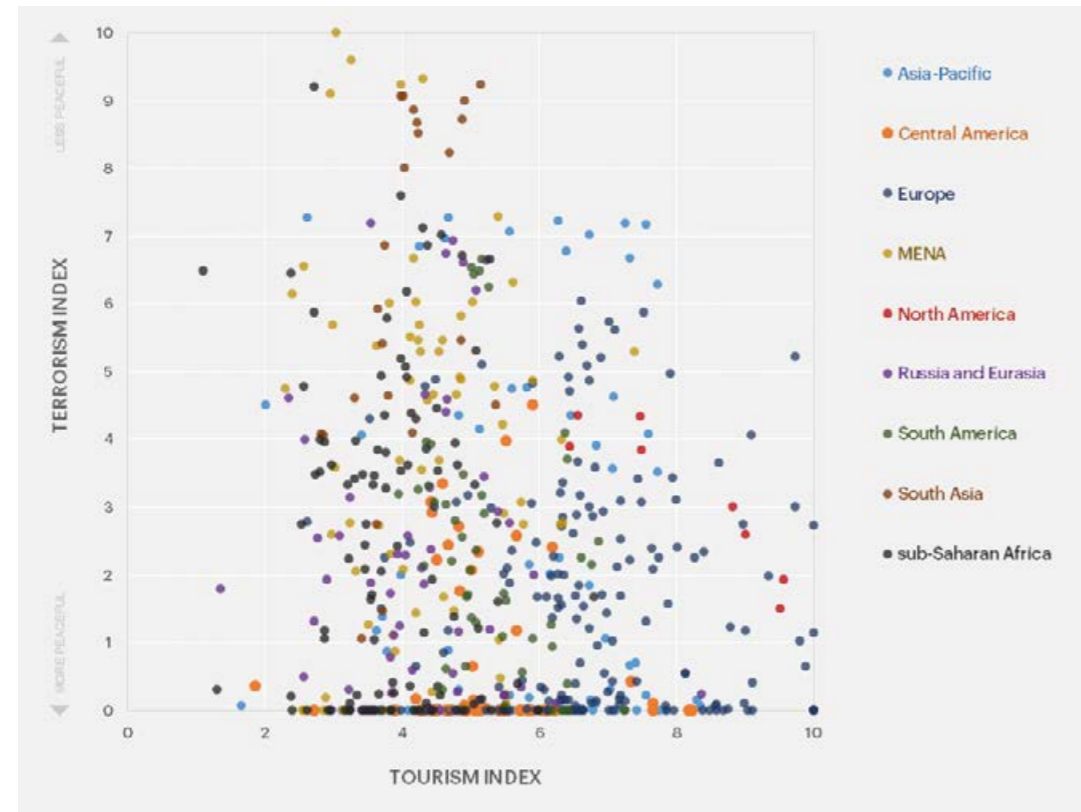
Terrorist activity has short-term impacts on the tourism sector such as travel advisory warnings leading to decreased tourist numbers, but whether or not the consequences of terrorist activities on the tourism sector has longer term consequences is still a topic of debate. Some research has indicated that it is the frequency of terrorist attacks that is harmful for the tourism sector rather than the severity of the attacks<sup>35</sup>. Thus, in situations such as 9/11 or the Paris shootings of November 2015, New York and Paris's tourism sectors may not be affected the same way as Israel which deals with constant terror threats. The immediate impact of the 9/11 terrorist acts was a huge reduction in profits for US airlines from \$7.9 billion in 2000 to \$4.4 billion in 2001, forcing some airlines into bankruptcy, as people became more cautious with travel. This effect, however, was relatively short-lived, with a recovery period of three years: airline revenues and traffic in 2004 surpassed 2000 levels<sup>36</sup>. Further research has found that political instability is far more damaging to the tourism sector of a country than one-off terror attacks<sup>37</sup>. Perceptions of terrorist threats in one country can also make tourists presume entire regions to be risky. For example, the effect of 9/11 on demand for tourist destinations in Mexico found that business travel was less sensitive than leisure travel<sup>38</sup>.

The relationship between performance on the Terrorism Index and performance on the Tourism Index is not an obvious one, as seen in Figure 18 which shows the distribution of scores by region. Countries who score poorly on the Tourism Index exhibit a wider range of terrorism scores than those countries who perform well on the Tourism Index.

html  
35 Pizam and Fleisher (2002)  
36 IATA report (2010)  
37 Saha and Yap (2013)  
38 Dominguez et al. (2003)

**Figure 18: Tourism and terrorism by region**

For countries who score poorly on the Tourism Index, there is a wider range of terrorism scores than for those countries who perform well on the Tourism Index.



There is substantial variation in the relationship between tourism and terrorism by region: South Asia, sub-Saharan Africa, MENA, South America and the Asia-Pacific have a correlation between higher levels of the Tourism Index and lower levels of terrorism, while Europe, Russia and Eurasia, North America, and Central America and the Caribbean show the opposite relationship. The first group of countries, particularly those in South Asia and MENA, are the ones that suffer frequent terrorist attacks. That this group also sees an inverse relationship between tourism and terrorism lends some support to the idea that frequency of terrorist attacks may be detrimental to tourism sustainability and openness.

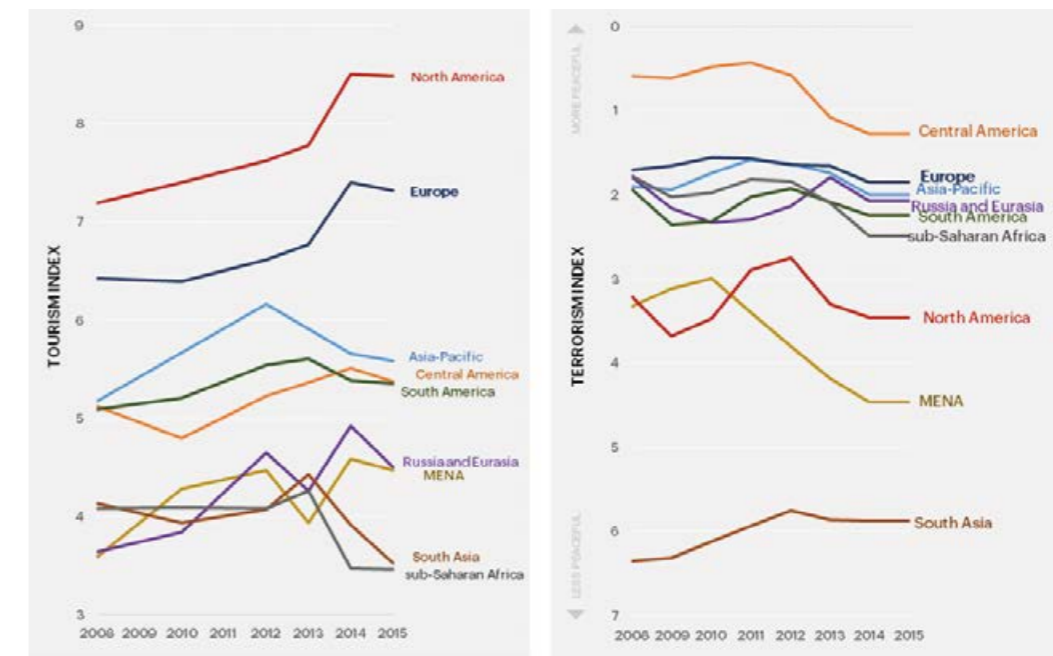
### Trends in Terrorism and Tourism

While the average score of the Tourism Index across all countries of the world has increased marginally from a value of 5 in 2008 to a value of 5.16 in 2015, over the same period, the average score of the Terrorism Index across all countries increased from 2.09 in 2008 to 2.54 in 2014, indicating a deterioration in negative effects of terrorism. The world is becoming increasingly more affected by terrorism: in 2014 the number of deaths from terrorism increased by 80% when compared to 2013, which was the largest yearly increase in the last 15 years. Private citizens and property remain the primary targets of terrorism, with a 172% increase in the number of deaths of private citizens due to terrorist activities between 2013 and 2014. The global economic costs of terrorism reached \$52.9 billion in 2014, the highest ever, up from \$32.9 billion in 2013. Terrorism remains, however, highly concentrated, with most terrorist activity occurring in just five countries: Iraq, Nigeria, Pakistan, Afghanistan and Syria. Only 0.5 per cent of all deaths from terrorist activities have occurred in western countries in the last 15 years<sup>39</sup>. 91% of deaths from terrorism in the West during this 15 year period are attributed to only four attacks: September 11 that killed 2,996 people; the Madrid train bombings killing 191; the Norwegian massacre killing 77; and the London bombings that killed 56.

Looking at the regional trends over time, Figure 19 shows that the South Asia region has been historically the poorest performer on the Terrorism Index, although it is the only region to see an improvement in this score between 2008 and 2015.

**Figure 19: Tourism and terrorism by region 2008 to 2015**

Most regions have seen a deterioration in their Terrorism Index scores since 2008.

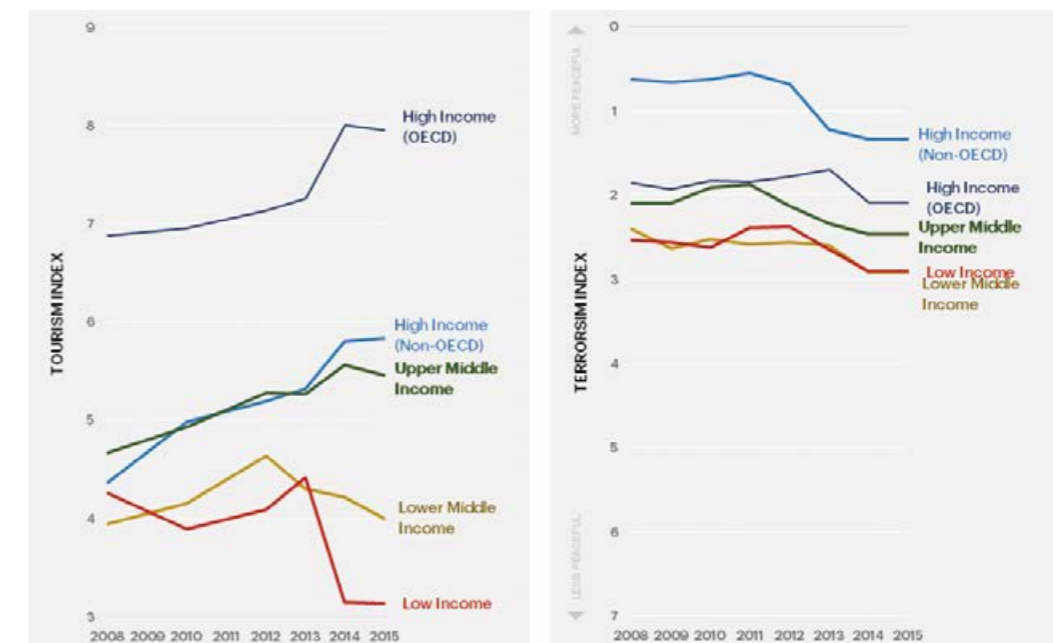


Central America is the most peaceful region in terms of terrorism, although it too has seen a deterioration since 2011. Over the same period (2011 to 2015), Central America did experience an improvement in its Tourism Index score, with a mild increase in tourism's contribution to GDP and a big increase in international arrivals.

Dissecting the data by income group reveals that high income non-OECD countries have been the best performers in terms of the Terrorism Index with an average score of 0.6 in 2008 and 1.3 in 2014, although this lead in performance has diminished in 2013 and 2014. Low and lower middle income countries, which are historically the weakest performers, diminished in both their Tourism and Terrorism index performances between 2013 and 2014.

**Figure 20: Tourism and terrorism by income group 2008 to 2015**

High income non-OECD countries have historically been the best performers on both tourism and terrorism indexes.



<sup>39</sup> Global Terrorism Index Report 2015, Institute for Economics and Peace

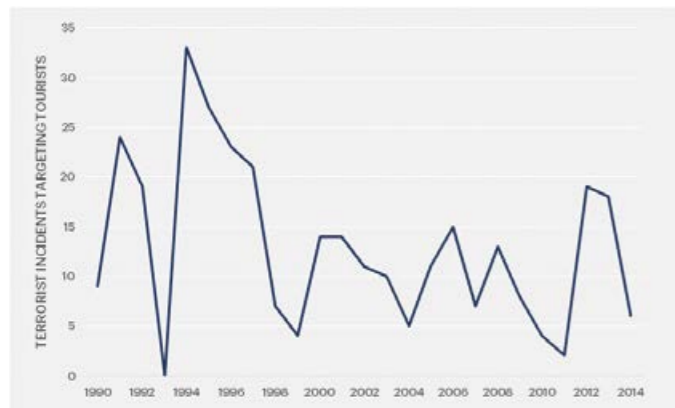
There are different drivers of terrorism in wealthier countries than in poorer countries. In OECD countries socio-economic factors such as youth unemployment, faith in democracy, and drug crime correlate significantly with terrorism. In non-OECD countries factors such as the history of armed conflict in a country and corruption are more strongly correlated<sup>40</sup>.

Considering government type, full democracies have traditionally been significantly better performers on both their Tourism and Terrorism Index scores, while hybrid and authoritarian regimes perform equally poorly on both indexes. Terrorist activity is correlated with political violence. Research has found that 92% of all terrorist attacks between 1989 and 2014 occurred in countries where political violence by the government was widespread. Furthermore, terrorism is correlated with a lack of respect for human rights and for international organisations – both characteristics of hybrid and authoritarian regimes.

Terrorism attacks against tourists have historically come in waves, with the most recent spike in 2012-2013, as seen in Figure 21. Terrorism targeted at tourists occurs in a diverse set of countries, though the MENA region and South America have dominated the scene. In the last decade, Colombia, Egypt, Yemen, and India have seen the largest numbers of terrorist attacks directed against tourists. Research suggests that terrorists often target tourists as a vulnerable and visible group representing foreign intrusion, out of a sense of frustration at inequality particularly in the developing world where luxury tourism often thrives in the face of extreme poverty<sup>41</sup>. Terrorists also target tourists to inflict economic costs on a country<sup>42</sup>.

**Figure 21: Incidents of terrorism targeted at tourism 1990 - 2014**

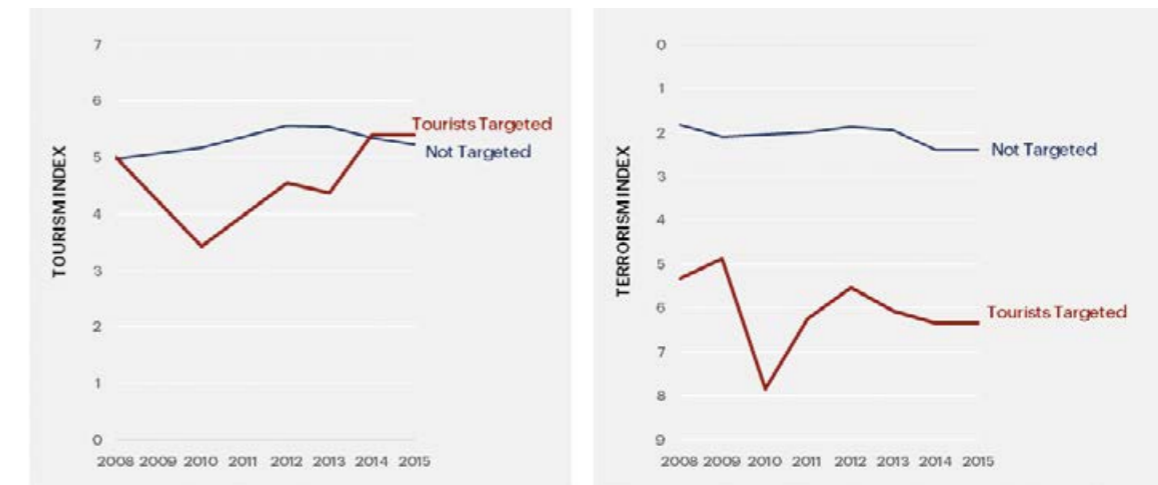
Terrorism targeted at tourism comes in waves, the last of which occurred in 2012-2013.



Breaking down the analysis to consider countries where terrorist attacks have been deliberately targeted at tourists separately to countries where this has not been the case reveals considerable differences in performance on both the Tourism and Terrorism Index scores, as seen in Figure 22. In total, since 2008, 31 countries have seen terror attacks deliberately targeted at tourists<sup>43</sup>.

**Figure 22: Tourism and terrorism by terrorism targeted at tourists 2008 to 2015 (2008 =1)**

Countries that have had terrorist acts targeted deliberately at tourists perform historically worse on the Terrorism Index, with a mixed performance on the Tourism Index.



Countries that have had terrorist acts deliberately targeted at tourists have had dramatic changes in their Tourism Index scores since 2008. The declines in the Tourism Index scores for these countries have tended to come right on the heels of the 'wave' of terror attacks targeted against tourists: at first a dramatic decline in the aftermath of the 'wave' of terrorist attacks against tourists in 2008, and again in 2012-2013. But the effect of these waves of attacks on Tourism Index performance does not last long. And in fact the two groups of countries (with tourism as targets and those without), have now equalised in terms of their performance on the Tourism Index. Research conducted in Egypt suggests that direct attacks on tourist infrastructure where foreigners are killed or wounded have an immediate substitution effect on people's holiday destination choices, but that tourist numbers fully recover within a year of the attack<sup>44</sup>.

### Risers and Fallers on Tourism and Terrorism

Between 2008 and 2014, for the 92 countries for which data is available, 68 saw an improvement in their Tourism Index scores. Of those 68, 28 also saw improvements in their Terrorism Index score. The global average change of 10% improvement in the Tourism Index score was accompanied by a global average change of 98% deterioration in the Global Terrorism Index. Decomposing the global averages to examine cases where tourism was explicitly targeted versus not shows substantial differences. The average change in Global Terrorism Index score for countries where tourism was a direct target of terrorist attacks was a deterioration of 119%, versus 91.7% deterioration where tourism was not a direct target of terrorism. At the same time, the average change in Tourism Index score for countries where tourism was an explicit target of terrorism was an improvement of 8.7%, versus 13.6% improvement for countries where tourism was not a target. Figure 23 shows the changes in the Terrorism Index and Tourism Index between 2008 and 2014<sup>45</sup>.

40 Global Terrorism Index Report 2015, Institute for Economics and Peace

41 Korstanje and Clayton (2012)

42 Lutz and Lutz (2006)

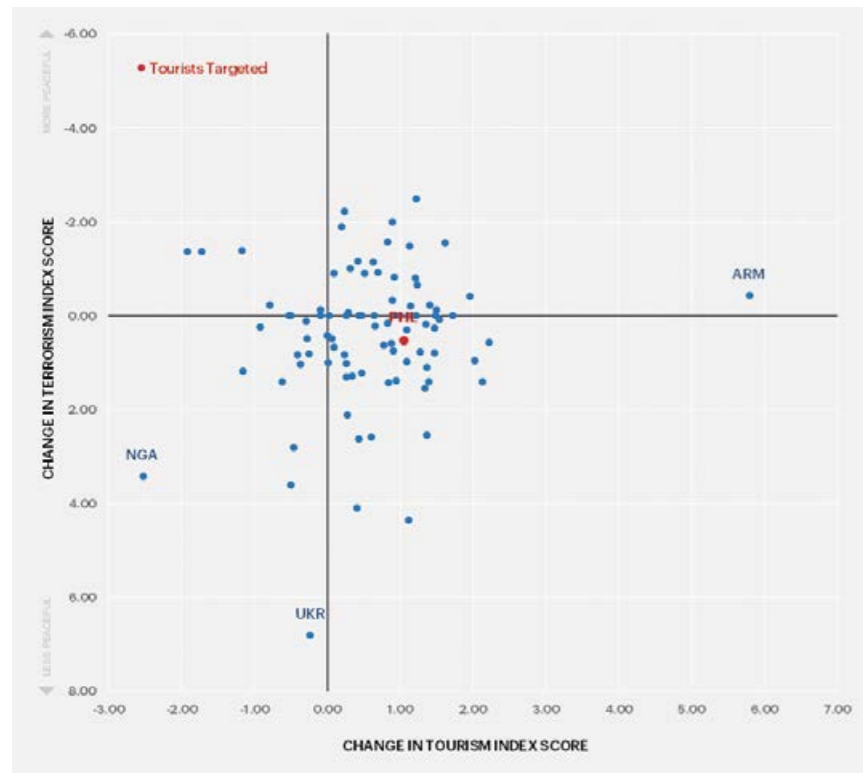
43 National Consortium for the Study of Terrorism and Responses to Terrorism (START) (2013), Global Terrorism Database

44 Fielding and Shortland (2011)

45 Note that not all tourism targeted countries had data available for both 2008 and 2015, which is why only the Philippines is plotted for this category on the chart.

**Figure 23: Distribution of changes in tourism and terrorism 2008 to 2015**

Although most countries have seen a deterioration in terms of their Global Terrorism Index scores between 2008 and 2015, a large portion of those still see improvements in their Tourism Index scores.



Although most countries have seen a deterioration in terms of their Global Terrorism Index scores between 2008 and 2015, a large portion of those still saw improvements in their Tourism Index scores. This suggests that tourism openness and sustainability is resilient to deteriorations in terrorism conditions. Ukraine and Nigeria, which are outliers that have seen deteriorations in both tourism and terrorism indexes, are also amongst the top five countries that have seen increases in the numbers of deaths caused by terrorism since 2013.

Table 7 summarises the top ten risers and fallers in terms of the Global Terrorism Index and their corresponding changes in the Tourism Index as well as international arrivals. Eight of ten top risers also saw improvements in their Tourism Index scores, while six of ten top fallers also saw an improvement in their Tourism Index score.

**Table 7: Risers and fallers terrorism and tourism 2008 to 2015**

TOP 10 RISERS	% Change Global Terrorism Index*	% Change Tourism Index	% Change international arrivals	TOP 10 FALLERS	% Change Global Terrorism Index *	% Change Tourism Index	% Change international arrivals
Uzbekistan	-100%	23%	84.2%	Ukraine	1784%	-1%	-3.1%
Uruguay	-100%	4%	38.4%	Tanzania	969%	-11%	41.7%
Qatar	-100%	37.9%	85.8%	Trinidad and Tobago	820%	34.5%	-0.7%
South Korea	-100%	2.8%	76.7%	Cyprus	586%	-2.7%	0%
Japan	-100%	18.2%	24.1%	Argentina	361%	13.1%	18.5%
Haiti	-100%	-58.2%	-	Belgium	260%	13.2%	7.2%
Benin	-100%	-4.1%	22.9%	Kyrgyz Republic	213%	-22.2%	66.8%
Croatia	-94.3%	6.6%	26.6%	Cameroon	208%	21.7%	87.3%
Cambodia	-85.5%	2.4%	98.1%	Mozambique	180%	33.2%	58.1%
Armenia	-79.1%	224%	94.3%	South Africa	152%	-12.4%	-0.6%

\*A negative change means an improvement, a positive change means a deterioration in peace

Table 8 considers only those countries where terrorism was targeted at tourists. There are only seven cases within this subset where the overall Global Terrorism Score improved, and of these three also saw improved Tourism Index scores. Seven of the top ten fallers had improved Tourism Index scores. This suggests that even when terrorism is targeted at tourism, there is a certain amount of resilience in the sustainability and openness of the tourism sector; a worsening of the terrorism situation does not always mean a worsening of the tourism situation, even when terrorism is being targeted at tourism. Research has examined the effect of terrorist attacks on tourist arrivals in cities such as Mombasa, New York, Madrid, London, Bali, and Cairo, and found that these all experienced significant downturns in the numbers of arrivals after terrorist incidents, but all recovered with time – evidence for the resilience of the sector<sup>46</sup>.

**Table 8: Risers and fallers terrorism and tourism 2008 to 2015 for countries where terrorism targets tourism**

TOP 10 RISERS	% Change Global Terrorism Index*	% Change Tourism Index	% Change international arrivals	TOP 10 FALLERS	% Change Global Terrorism Index *	% Change Tourism Index	% Change international arrivals
Ecuador	-66.8%	9.3%	35.7%	Cameroon	208%	44%	87.3%
Sri Lanka	-42.5%	27.6%	191%	Malaysia	93.3%	35.9%	16.6%
Ethiopia	-28.2%	-27%	77.8%	Egypt	89.6%	10.7%	-25.4%
Nepal	-22.2%	-32.1%	59.6%	Bulgaria	67.4%	20.8%	19.3%
Myanmar	-9.7%	-2.1%	179%	Tunisia	57.9%	12.8%	-11.1%
Russia	-0.9%	31.6%	30.1%	China	51.3%	10.1%	5%
India	-0.8%	-3.3%	31.9%	Saudi Arabia	47.6%	51.1%	-9.3%
				Yemen	45.2%	-29.3%	-3.2%
				Kenya	34.7%	-3.9%	25.7%
				Indonesia	21.4%	-8%	41.2%

\*A negative change means an improvement, a positive change means a deterioration in peace

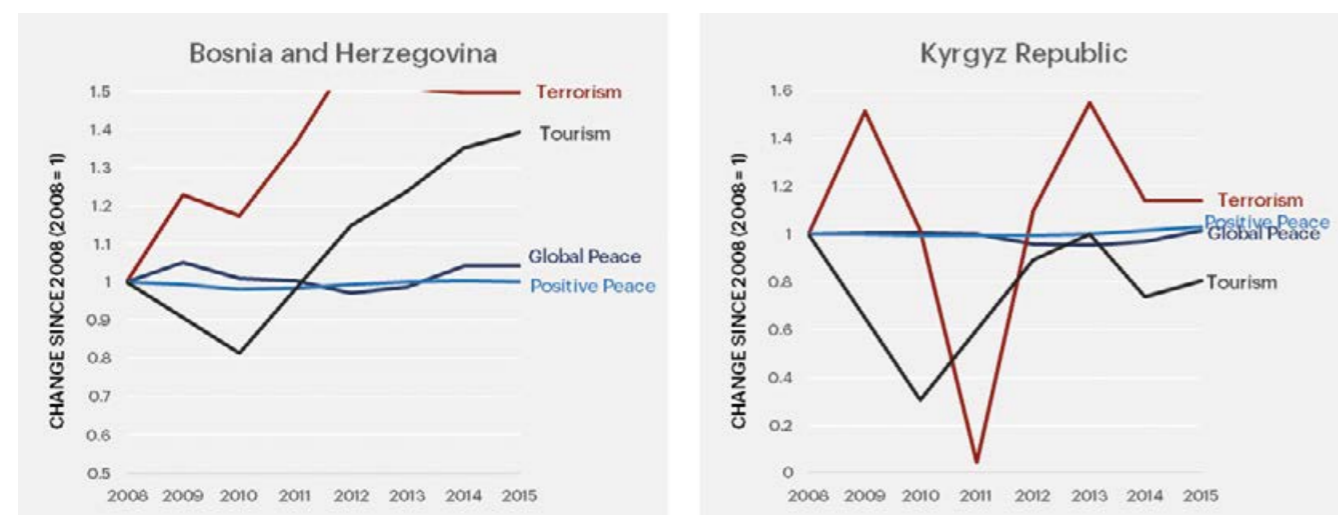
46 Castano (2005)

## Two cases compared: Bosnia and Herzegovina and the Kyrgyz Republic

Both Bosnia and Herzegovina and the Kyrgyz Republic have had recent histories filled with conflict. Although Bosnia and Herzegovina is no longer on the UN's list of conflict-affected countries, while the Kyrgyz Republic is; civil unrest was sparked again in 2014 in protest at the corruption of the government and economic stagnation. Figure 24 shows the trends in peace and tourism for both countries between 2008 and 2015.

**Figure 24: Bosnia and Herzegovina and the Kyrgyz Republic tourism and peace indexes 2008 to 2015**

*Bosnia and Herzegovina has seen marked improvements in Tourism and Terrorism Indexes, while the Kyrgyz Republic has a mixed record.*



Bosnia and Herzegovina has improved its Tourism Index score by 43% between 2008 and 2015. While tourism's contribution to GDP has remained relatively stable during this time at around 2.5%, tourism's contribution to employment has increased from 2.7% to 3%. At the same time, international arrivals have grown by 64.3%, and Bosnia and Herzegovina has opened up immensely in terms of visa free travel, from 45 countries in 2008 to 90 countries in 2014. Bosnia and Herzegovina saw a remarkable decrease of 49.5% in its Global Terrorism Index between 2008 and 2014, despite the ongoing presence of Islamic militants in the country. The last terrorist attack occurred in November 2015 when a lone gunman shot and killed two soldiers and wounded another in the Rajlovac area of Sarajevo. Bosnia and Herzegovina also saw a mild improvement in its negative peace levels, with a 4.2% decrease in the Global Peace Index, although its levels of internal peace have deteriorated over the same time period. Bosnia and Herzegovina's levels of positive peace remained almost unchanged between 2008 and 2015.

Over the same period, the Kyrgyz Republic has seen a 22.2% deterioration in its Tourism Index, with a decline or stagnation in its economic indicators of tourism as well as its environmental performance. Tourism's contribution to GDP has declined from approximately 2.25% in 2008 to 1.5% in 2014, while tourism's contribution to employment has decreased from approximately 1.85% in 2008 to 1.5% in 2014<sup>47</sup>. The main obstacles to the development of the tourism sector in Kyrgyzstan have been identified as the seasonality of tourism, limited market, shortages of qualified human resources, lack of sufficient number of modern accommodation establishments, and political unrest<sup>48</sup>. Threats from militant Islam with Jihadi elements seeking refuge in the Kyrgyz Republic have increased over the same period contributing to the increase in Terrorism Index score for the country. These increasing numbers of Jihadists seeking refuge in the Kyrgyz Republic also help account for the counter-intuitive increase in international arrivals (66.8% increase between 2008 and 2014). The Kyrgyz Republic also saw declines in negative and positive peace between 2008 and 2015, of 2.9 and 1.4% respectively.

47 "Travel & Tourism: Economic Impact 2014 Kyrgyzstan", World Travel and Tourism Council Report 2014  
48 "Obstacles to the Tourism Development in Kyrgyzstan", M. Yesiltas, Sosyal Bilimler Dergisi, 2009.

## 7. APPENDIX A: METHODOLOGICAL NOTE

### Measuring Tourism

To date the most standard approach to measuring tourism and the development of tourism has been to look at international arrivals data into countries, which the World Bank compiles and makes available in its online database. This measure makes sense for studies focusing, for example, on trying to explain the determinants of tourism arrivals, or how tourism influxes can affect individual attitudes towards tourism. But, while this indicator taps into the cultural domain of tourism in as much as it captures the theoretical intermingling of people and exchanges of ideas and cultures, the indicator alone neglects three other important domains of tourism: the economic, political, and environmental. These four domains combined are representative of the health or sustainability of a country's tourism sector.

### Tourism's cultural domain

The physical fact of people travelling across borders to other countries captures an intermingling of cultures. As tourists come and go, they share cultural influences from their own countries and experience cultural influences from the countries they visit. Countries in turn are both senders and receivers of tourism, and the degree to which they send and receive tourism is a measure of tourism's cultural domain in a country. Generally speaking, whether a country can in fact even be a sender country will depend in part on the wealth level of its citizens.

Tourism's cultural domain is expected to affect peace primarily through the effect it has on individual attitudes and beliefs. Moreover, the effects on peace of tourism on a country that is pre-dominantly a receiver of tourists may be different to the effects on peace for a country that is pre-dominantly a sender or a 'mixed' country. Research on attitudes of citizens of predominantly 'receiving' countries or tourist areas have had mixed findings. For example, in Ghana, individuals have found that the influx of tourism has not led to the 'promised' economic development, thus causing resentment of tourism and tourists<sup>49</sup>. On the other hand, residents' attitudes to tourism in Waikiki are very positive<sup>50</sup>.

Two indicators for tourism's cultural domain are proposed. International arrivals data captures the degree to which any particular country is a 'recipient' of tourism, although the way in which this is measured is not entirely consistent across countries. For example, some countries' data is provided by border patrol services while others by accommodation services, some countries including the arrivals of nationals residing overseas while others do not. The degree to which a country is a 'sender' of tourism is more difficult to capture because no systematic data exists which is comparable on a global scale that shows outbound travel of residents from a sending country. The WTTC does, however, provide data on the economic footprint of outbound tourism in the form of its "Outbound travel and tourism expenditure" metric which captures spending outside the country by residents on all trips abroad.

### Tourism's economic domain

Tourism affects a country's economy through its contribution to spending, which in turn contributes to both the Gross Domestic Product and employment of a country as it supplies tourism services. Many studies have looked at the effects of tourism on a country's economy<sup>51</sup>, but to date no studies have looked at the effect of tourism's contribution to the economy on peace.

Why might there be a relationship between tourism's economic domain and peace? On an individual level, as tourism starts to contribute more to an economy or employment, people's attitudes towards tourism, other peoples and cultures may become more positive leading to a society of more tolerant and open-minded individuals. On a country level, as tourism contributes to economic development and growth, governments may put in place policies which contribute to a peaceful society: ensuring a safe and secure domestic situation so that tourists feel safe; ensuring a sound business environment in which providers of tourism services are able to operate in an efficient way; or cracking-down on large-scale corruption so as not to deter tourism.

The economic impact of tourism is recognised as a potential driving force also for sustainable development – in turn a driver of peace<sup>52</sup>. One of the UN's Sustainable Development Goals, focuses exactly on this economic contribution that tourism can make to a country. Specifically, goal 8.9 reads "By 2030, devise and implement policies to promote sustainable tourism that creates jobs and promotes local culture and products".

As aggregate indicators of tourism's economic domain, we use the indicators proposed by SDG goal 8.9. These are: Tourism direct contribution to GDP (as % of total GDP and in growth rate); and number of jobs in tourism industries (as % total jobs and growth rate of jobs). The WTTC as data on both these indicators.

In addition to examining the relationship between these indicators of tourism and peace, we look at disaggregated measures of tourism spending to investigate whether there is a differential effect of business versus leisure spending, and domestic versus foreign spending, on peace.

49 Teye, Sonmez and Sirakaya (2002)

50 Sheldon and Abenoja (2001)

51 See for example Britton (1982) or Dwyer et. Al (2004)

52 Honey and Gilpin (2009)



It is well documented that business travel, spending, and investments are sometimes intertwined with situations of political instability, violence, and general chaos<sup>53</sup>. Possibly the best example of this dynamic is the situation with mining companies in the Democratic Republic of Congo. The government and rebel groups have little incentive to create a situation of stability and peace in the nation, because they can reap the economic benefits of business without this. Thus a country whose primary source of tourism spending comes from business related activity may not reap the same beneficial effects of tourism on peace as a country where leisure travel constitutes the main form of spending. Indicators for these measures are taken from the WTTC data base: business tourism spending and leisure tourism spending. Importantly, both measures count spending by both residents and international visitors.

As for domestic versus foreign spending, domestic spending represents a reallocation of resources within a country as money circulates within the domestic economy, while foreign spending represents a new injection of money potentially leading to greater follow on economic effects. Indicators for these measures are taken from the WTTC data base: domestic tourism spending and visitor exports.

## Tourism's political domain

Tourists and tourism often form a crucial part of countries' diplomatic relationships with each other<sup>54</sup>. Indeed, the ability of a country to send or receive tourists in part depends on the political relationships between countries. One manifestation of these political relationships in the tourism domain is the visa requirements for entry into a country. For example, in the aftermath of the September 11 attacks as the USA cracked down on visitors to the USA, increasing the number of countries requiring visas and biometric identification, Brazil retaliated by instituting visa requirements on US citizens trying to enter Brazil.

A country whose citizens face fewer visa restrictions is inherently better equipped to be a sender of tourism than a country whose citizens face many restrictions. Similarly, a country who imposes fewer visa restrictions on citizens of other nations is more easily a receiver of tourism with its costs and benefits.

## Tourism's environmental domain

The movement of people within and across borders, and the associated industrial construction that goes hand in hand with an expanded tourism sector has an impact on the environment. According to the United Nations Environment Program the three main impacts tourism has on the environment are on the loss of biological diversity, the depletion of the ozone layer, and climate change. Tourism now accounts for approximately 50% of traffic movements in the world, and it is estimated that air traffic contributes approximately 2.5% to total carbon dioxide emissions in the world.

On the positive front, we are seeing increases in environmentally-friendly tourism initiatives around the world in the forms of ecotourism products, accommodation, and trips, as well as voluntourism initiatives aimed at environmental protection.

Unfortunately data on tourism's contribution to environmental protection or degradation is virtually non-existent at a global level. The UNWTO commissioned an analysis back in 1993 on indicators for sustainable tourism with recommendations on indicators to collect at a national level; to date, however, there is no comprehensive database on these. In the absence of such specific data, an imperfect indicator of tourism's environmental domain is used: the environmental performance index. This index gives the longest time series for data at a global level (2000-2014).

## A Tourism Index

The sustainability and openness of a country's tourism sector is a trait of a country that is not directly observable – a latent trait. Rather, there are observable indicators which can be categorised according to the four domains of tourism sustainability: cultural, economic, political, and environmental, and which are summarised in Table A.1. In the absence of any a-priori ideas of which indicators are more indicative of the health of the tourism sector, a statistical technique known as principal component analysis is used to reduce the tourism indicators to a single composite index measure. Principal components Analysis takes large data sets of correlated variables, and reduces these to 'principal components' based on a weighted linear addition of the variables, such that each derived 'principal component' is uncorrelated with another. It is a powerful data reduction and index creation technique. The 'weights' here refer not to the importance of each indicator in relation to the index, but to the way in which indicators combine to give a set of principal components for the data.

<sup>53</sup> Frynas (1998)  
<sup>54</sup> Prideaux (2005)

**Table A.1: Observable indicators of tourism openness and sustainability**

TOURISM DOMAIN	SUB-DOMAIN	INDICATOR	SOURCE
Cultural		International Tourism Arrivals	World Bank
		Outbound tourism expenditure (% share GDP)	WTTC
Economic	Aggregate	Contribution to GDP (%)	WTTC
		Contribution to GDP (% growth)	WTTC
		Contribution to employment (% workforce)	WTTC
		Contribution to employment (% change)	Own calculations based on WTTC data
	Domestic	Domestic tourism spending (% share)	WTTC
		Domestic tourism spending (% growth)	WTTC
	Foreign	Foreign spending (% of exports)	WTTC
		Foreign spending (% growth)	WTTC
	Business	Business tourism spending (% share)	WTTC
		Business tourism spending (% growth)	WTTC
	Leisure	Leisure tourism spending (% share)	WTTC
		Leisure tourism spending (% growth)	WTTC
Political		Visa restrictions (Number of countries to which travel requires no visa)	Henley & Partners Visa Restriction Index
Environmental		Environmental Performance Index	Yale Centre for Environmental Law and Policy (Yale University) and Centre for International Earth Science Information Network (Columbia University)

**Table A.2: Cultural Domain summary statistics**

INDICATOR	GLOBAL MEAN	GLOBAL MIN	GLOBAL MAX	STANDARD DEVIATION
International arrivals	4.29 bln	1000	84.72 bln	9.98 bln
Outbound tourism expenditure (% of GDP)	2.26	0.0	14.88	1.98

**Table A.3: Economic Domain summary statistics**

INDICATOR	GLOBAL MEAN	GLOBAL MIN	GLOBAL MAX	STANDARD DEVIATION
Contribution to GDP (%)	3.56	0.68	14.41	2.19
Contribution to GDP (% growth)	3.57	-42.81	184.19	13.09
Contribution to employment (% workforce)	3.57	0.53	13.69	2.16
Contribution to employment (% change)	0.006	-0.45	1.82	0.12
Domestic tourism spending (% share)	3.43	0.83	12.08	1.60
Domestic tourism spending (% growth)	2.96	-39.78	194.68	11.45
Foreign spending (% of exports)	10.70	0.01	80.46	11.35
Foreign spending (% growth)	6.15	-81.68	1255.76	46.78
Business tourism spending (% share)	0.94	0.08	6.06	0.78
Business tourism spending (% growth)	2.28	-42.02	245.60	15.35
Leisure tourism spending (% share)	2.59	0.28	11.60	1.92
Leisure tourism spending (% growth)	4.19	-49.72	166.83	14.42

Table A.4: Political Domain summary statistics

INDICATOR	GLOBAL MEAN	GLOBAL MIN	GLOBAL MAX	STANDARD DEVIATION
Visa restrictions (Number of countries to which travel requires no visa)	84	21	174	47

Table A.5: Environmental Domain summary statistics

INDICATOR	GLOBAL MEAN	GLOBAL MIN	GLOBAL MAX	STANDARD DEVIATION
Environmental performance Index	52.46	15.47	87.67	11.33

For the observed indicators, the principal components analysis results in 16 principal components, of which the first three explain more than 50% of the variance in the data. The first two principal components load heavily on indicators of the economic domain of tourism: PC1 focuses on current economic measures such as tourism's total share of GDP and total share of employment, while PC2 focuses on economic growth measures such as the change in tourism's total share of GDP and total share of employment. The third principal component loads heavily on indicators of the cultural, political, and environmental domains of tourism.

The tourism index is then created by weighting the three principal components according to the 'importance' attached to each of the domains of tourism sustainability. Too much weighting on any one domain may bias the indicator: for example, too heavy a weighting on the economic domain will reflect the dependency of a country on tourism, not necessarily a desirable attribute. An equal weighting scheme for the four domains of tourism sustainability is proposed.

Table A.6: Proposed weighting scheme for Tourism Index

DOMAIN	WEIGHTING
Cultural	25%
Economic	25%
Political	25%
Environmental	25%

Once the principal component scores have been calculated, they are standardised to have a mean of zero and standard deviation of one, with reference to a reference year (in this case, the earliest year for which an index can be calculated, which is 2008). This is done to ensure that scores are comparable across countries at one point in time, but also by country across time. Since the upper and lower limits of a standardised score are theoretical infinite, the standardised scores are converted to a scale between zero and ten. The upper and lower limits of the scaled score are banded to ten and zero respectively, such that a country must perform in the top 0.1% (according to its standardised score), in order to get a scaled score of ten, and similarly must perform in the bottom 0.1% in order to get a scaled score of zero. Thus a scaled score of ten is a somewhat aspirational score for a country. Figure A.1 shows the correlations between the Tourism Index and its constituent components.

Figure A.1: Bivariate correlations between Tourism Index and constituent indicators

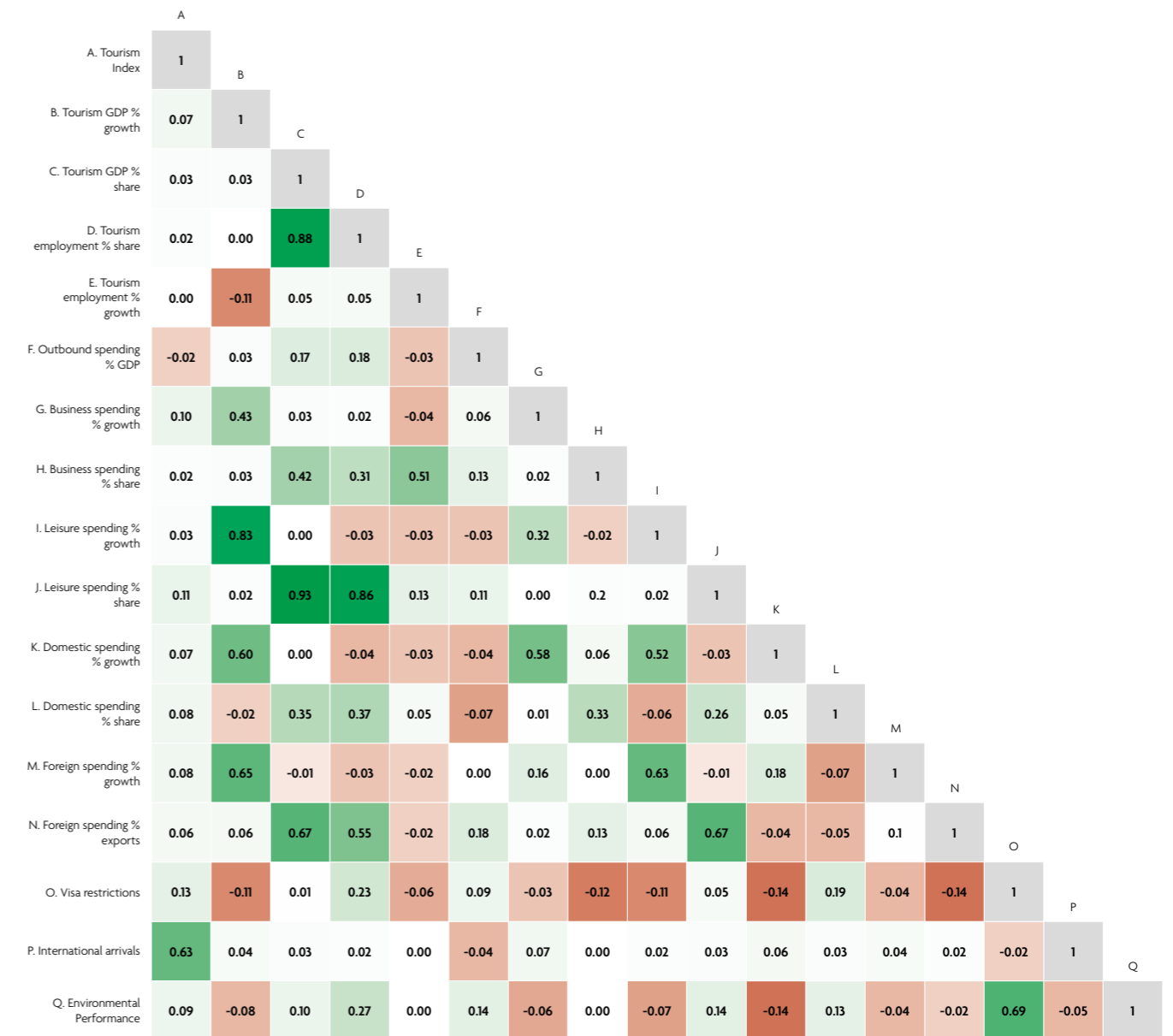


Table A.7: Tourism Index Summary statistics

INDEX	GLOBAL MEAN	GLOBAL MIN	GLOBAL MAX	STANDARD DEVIATION
Tourism Index	5.25	0.48	10.0	1.72

## Measuring Peace

Peace is a difficult concept to define and measure. The core work of the Institute for Economics and Peace has been focused on doing exactly that, and to date, its work is the only globally recognised systematic measure of peace. IEP follows the lead of the founding father of peace studies, Johan Galtung, who conceived of two types of peace: negative peace and positive peace.

## Negative Peace

The simplest way of conceptualising what peace is, is in terms of what it is not: the absence of violence or the fear of violence, known as negative peace. The Global Peace Index measures a country's level of negative peace based on three domains of peacefulness: ongoing domestic and international conflict; societal safety and security; and, militarisation. Twenty-three indicators from these three domains are

weighted and combined to give two distinct measures of negative peace: internal peace and external peace. These are in turn weighted and combined to give a Global Peace Index.

Internal peace taps into a measure of how peaceful a country is within its own borders, and is calculated based on indicators such as level of perceived criminality in society and homicide rate. External peace taps into the state of peace beyond a country's borders and is based on indicators such as military expenditure as a percentage of GDP and nuclear weapons capabilities.

The Global Peace Index has ranked the nations of the world according to their overall levels of internal and external peace since 2005. The Index is constructed in such a way that a higher score represents a lower level of peace, with a maximum score of five and a minimum score of one.

## Positive Peace

Positive peace is defined as the attitudes, institutions, and structures which create and sustain peaceful societies. In IEP's conceptualisation, positive peace is based on eight pillars: a sound business environment; good relations with neighbours; high levels of human capital; acceptance of the rights of others; low levels of corruption; a well-functioning government; free flow of information; and, the equitable distribution of resources. Twenty-four indicators from these eight pillars are used in the construction of the positive peace Index.

The Positive Peace Index has ranked the nations of the world according to their overall level of positive peace since 2005. The index is constructed in such a way that a higher score represents a lower level of peace, with a maximum score of five and a minimum score of one.

## Terrorism

Terrorism is a particular form of violent activity, whose relationship with tourism deserves to be investigated in and of itself. One widely used definition of a terrorist activity is that it is "the threatened or actual use of illegal force and violence by a non-state actor to attain a political, economic, religious, or social goal through fear, coercion, or intimidation". In essence terrorism can be thought of as a lack of peace due to non-state actors.

The Global Terrorism Index captures both the direct and lingering effects of terrorism related violence on a country. The GTI score is calculated based on four factors: total number of terrorist incidents in a given year; the total number of fatalities caused by terrorism in a given year; the total number of injuries caused by terrorism in a given year; and, the approximate level of total property damage from terrorist incidents in a given year. These four indicators are weighted to give a current yearly GTI score. The current score is then weighted based on data from the previous five years to account for the lingering effect terrorist attacks have on a society in terms of fear and subsequent security responses.

**Table A.8: Peace Indexes Summary statistics**

Global Peace Index	2.03	1.06	3.65	0.46
Global Peace Index	2.03	1.06	3.65	0.46
Positive Peace Index	2.95	1.33	4.27	0.73
Global Terrorism Index	2.20	0.00	10.00	2.37

## Regression analysis of the explanatory power of tourism for peace

Panel data regression was conducted on the cross-sectional and temporal tourism and peace data to test simple bivariate relationship between tourism and peace. While the results from this regression cannot be used to conclude that tourism is a cause of peace, they are suggestive of a causal relationship which deserves further investigation.

In the replication of the work by Pratt and Liu (2015) on the relationship between tourism and violence and conflict a two time period lag of tourism is used to predict levels of violence and conflict. The original analysis by Pratt and Liu (2015) uses contemporaneous values of international arrivals and global Peace Index score, but this cannot begin to show a causal direction of the relationship. For external peace, a random effects model was used after testing for model fit, and because of serial correlation, panel corrected standard errors were calculated.

The analysis of positive peace and tourism uses a two time period lag of tourism to predict levels of positive peace. A fixed effects model was used after testing for model fit, and because of serial correlation, panel correct standard errors were calculated.

## Country Data

**Table A.9: Country data including Tourism Index score for 2015, Region, Government type and Income category**

COUNTRY	TOURISM INDEX 2015	GOVERNMENT TYPE	INCOME CATEGORY	REGION
Spain	10	Full Democracy	High income: OECD	Europe
France	10	Flawed Democracy	High income: OECD	Europe
Germany	9.875	Full Democracy	High income: OECD	Europe
United States	9.5058	Full Democracy	High income: OECD	North America
Italy	9.321	Flawed Democracy	High income: OECD	Europe
United Kingdom	9.101	Full Democracy	High income: OECD	Europe
Austria	8.612	Full Democracy	High income: OECD	Europe
Greece	8.3889	Flawed Democracy	High income: OECD	Europe
Australia	8.296	Full Democracy	High income: OECD	Asia-Pacific
Mexico	8.225	Flawed Democracy	Upper middle income	Central America And Caribbean
Sweden	7.786	Full Democracy	High income: OECD	Europe
Czech Republic	7.738	Full Democracy	High income: OECD	Europe
Singapore	7.733	Hybrid Regime	High income: nonOECD	Asia-Pacific
New Zealand	7.723	Full Democracy	High income: OECD	Asia-Pacific
Netherlands	7.699	Full Democracy	High income: OECD	Europe
Portugal	7.617	Full Democracy	High income: OECD	Europe
Japan	7.581	Full Democracy	High income: OECD	Asia-Pacific
Hungary	7.491	Flawed Democracy	High income: OECD	Europe
Canada	7.479	Full Democracy	High income: OECD	North America
Malaysia	7.417	Flawed Democracy	Upper middle income	Asia-Pacific
Denmark	7.414	Full Democracy	High income: OECD	Europe
Chile	7.241	Flawed Democracy	Upper middle income	South America
Slovenia	7.231	Flawed Democracy	High income: OECD	Europe
Iceland	7.206	Full Democracy	High income: OECD	Europe
Croatia	7.083	Flawed Democracy	High income: nonOECD	Europe
South Korea	7.059	Full Democracy	High income: OECD	Asia-Pacific
Ireland	7.018	Full Democracy	High income: OECD	Europe
Poland	6.845	Flawed Democracy	High income: OECD	Europe
Belgium	6.730	Full Democracy	High income: OECD	Europe
Estonia	6.602	Flawed Democracy	High income: OECD	Europe
Turkey	6.497	Hybrid Regime	Upper middle income	Europe
Cyprus	6.432	Flawed Democracy	High income: nonOECD	Europe
China	6.385	Authoritarian Regime	Upper middle income	Asia-Pacific
Brazil	6.373	Flawed Democracy	Upper middle income	South America
Bulgaria	6.340	Flawed Democracy	Upper middle income	Europe
Latvia	6.335	Flawed Democracy	Upper middle income	Europe
Israel	6.317	Flawed Democracy	High income: OECD	MENA
Venezuela	6.276	Hybrid Regime	Upper middle income	South America
Argentina	5.993	Flawed Democracy	Upper middle income	South America
Lithuania	5.985	Flawed Democracy	Upper middle income	Europe
Thailand	5.968	Flawed Democracy	Upper middle income	Asia-Pacific
Mauritius	5.900	Full Democracy	Upper middle income	sub-Saharan Africa
Saudi Arabia	5.888	Authoritarian Regime	High income: nonOECD	MENA
Russia	5.871	Hybrid Regime	Upper middle income	Russia and Eurasia
Costa Rica	5.716	Full Democracy	Upper middle income	Central America And Caribbean
Honduras	5.665	Hybrid Regime	Lower middle income	Central America And Caribbean

COUNTRY	TOURISM INDEX 2015	GOVERNMENT TYPE	INCOME CATEGORY	REGION
Panama	5.513	Flawed Democracy	Upper middle income	Central America And Caribbean
Tunisia	5.474	Authoritarian Regime	Upper middle income	MENA
Trinidad and Tobago	5.466	Flawed Democracy	High income: nonOECD	Central America And Caribbean
Ukraine	5.411	Flawed Democracy	Lower middle income	Russia and Eurasia
Egypt	5.398	Authoritarian Regime	Lower middle income	MENA
South Africa	5.384	Flawed Democracy	Upper middle income	sub-Saharan Africa
Uruguay	5.347	Full Democracy	Upper middle income	South America
Qatar	5.134	Authoritarian Regime	High income: nonOECD	MENA
Belarus	5.077	Authoritarian Regime	Upper middle income	Russia and Eurasia
Namibia	5.074	Flawed Democracy	Upper middle income	sub-Saharan Africa
Morocco	5.034	Authoritarian Regime	Lower middle income	MENA
Jamaica	5.017	Flawed Democracy	Upper middle income	Central America And Caribbean
Peru	4.788	Flawed Democracy	Upper middle income	South America
Zimbabwe	4.773	Authoritarian Regime	Low income	sub-Saharan Africa
Moldova	4.757	Flawed Democracy	Lower middle income	Russia and Eurasia
Bahrain	4.727	Authoritarian Regime	High income: nonOECD	MENA
Albania	4.676	Hybrid Regime	Upper middle income	Europe
Philippines	4.669	Flawed Democracy	Lower middle income	Asia-Pacific
Ecuador	4.538	Hybrid Regime	Upper middle income	South America
Indonesia	4.528	Flawed Democracy	Lower middle income	Asia-Pacific
Cuba	4.510	Authoritarian Regime	Upper middle income	Central America And Caribbean
Bosnia and Herzegovina	4.471	Hybrid Regime	Upper middle income	Europe
Iran	4.459	Authoritarian Regime	Upper middle income	MENA
El Salvador	4.438	Flawed Democracy	Lower middle income	Central America And Caribbean
Macedonia	4.428	Flawed Democracy	Upper middle income	Europe
Kazakhstan	4.423	Authoritarian Regime	Upper middle income	Russia and Eurasia
Bolivia	4.391	Hybrid Regime	Lower middle income	South America
Azerbaijan	4.387	Authoritarian Regime	Upper middle income	Russia and Eurasia
Georgia	4.314	Hybrid Regime	Lower middle income	Russia and Eurasia
Colombia	4.314	Flawed Democracy	Upper middle income	South America
Dominican Republic	4.272	Flawed Democracy	Upper middle income	Central America And Caribbean
Paraguay	4.235	Flawed Democracy	Lower middle income	South America
Oman	4.182	Authoritarian Regime	High income: nonOECD	MENA
Jordan	4.171	Authoritarian Regime	Upper middle income	MENA
Cambodia	4.142	Hybrid Regime	Low income	Asia-Pacific
Viet Nam	4.142	Authoritarian Regime	Lower middle income	Asia-Pacific
Senegal	4.036	Hybrid Regime	Lower middle income	sub-Saharan Africa
Sri Lanka	4.003	Flawed Democracy	Lower middle income	South Asia
India	3.977	Flawed Democracy	Lower middle income	South Asia
Armenia	3.828	Hybrid Regime	Lower middle income	Russia and Eurasia
The Gambia	3.783	Authoritarian Regime	Low income	sub-Saharan Africa
Zambia	3.761	Hybrid Regime	Lower middle income	sub-Saharan Africa
Kenya	3.756	Hybrid Regime	Low income	sub-Saharan Africa
Mongolia	3.656	Flawed Democracy	Lower middle income	Asia-Pacific
Laos	3.633	Authoritarian Regime	Lower middle income	Asia-Pacific
Swaziland	3.626	Authoritarian Regime	Lower middle income	sub-Saharan Africa
Lesotho	3.597	Flawed Democracy	Lower middle income	sub-Saharan Africa
Cameroon	3.555	Authoritarian Regime	Lower middle income	sub-Saharan Africa

Uzbekistan	3.412	Authoritarian Regime	Lower middle income	Russia and Eurasia
Republic of the Congo	3.394	Authoritarian Regime	Lower middle income	sub-Saharan Africa
Nigeria	3.373	Authoritarian Regime	Lower middle income	sub-Saharan Africa
Burkina Faso	3.317	Authoritarian Regime	Low income	sub-Saharan Africa
Tanzania	3.310	Hybrid Regime	Low income	sub-Saharan Africa
Mozambique	3.031	Hybrid Regime	Low income	sub-Saharan Africa
Benin	2.921	Flawed Democracy	Low income	sub-Saharan Africa
Ethiopia	2.887	Authoritarian Regime	Low income	sub-Saharan Africa
Bangladesh	2.811	Hybrid Regime	Low income	South Asia
Togo	2.798	#N/A	Low income	sub-Saharan Africa
Rwanda	2.719	Authoritarian Regime	Low income	sub-Saharan Africa
Angola	2.609	Authoritarian Regime	Lower middle income	sub-Saharan Africa

## References

Alluri, R.M. (2009), "The Role of Tourism in Post-Conflict Peacebuilding in Rwanda", Swiss Peace Foundation Working Paper

Ashley, C. (2000), "The Impacts of Tourism on Rural Livelihoods: Namibia's Experience", The Overseas Development Institute Working and Discussion Papers

Britton, S.G. (1982), "The Political Economy of Tourism in the Third World", *Annals of Tourism Research*, 9(3):331-358

Burtner, J. and Castaneda Q. (2010), "Tourism as "A Force for World Peace": The Politics of Tourism, Tourism as Governability, and the Tourism Boycott of Guatemala", *The Journal of Tourism and Peace Research* 1(2):1-21

Castano, J.M. (2005), *Psicología Social de los Viajes y el Turismo*, Thomson Ed, Madrid.

Chari, P.R., Suba Chandran, D., and Akhtar, S. (2011), "Tourism and Peacebuilding in Jammu and Kashmir", United States Institute for Peace Special Report.

D'Amore, L.J. (1988) *Tourism: a vital force for peace* *Tourism Management*, 9 (2), pp. 151-154.

Dwyer L, Forsyth P, Spurr R. (2004) "Evaluating tourism's economic effects: new and old approaches" *Tourism management*, 25(3):307-17.

Fielding, D., and Shortland, A., "How do tourists react to political violence? An empirical analysis of tourism in Egypt", *Defence and Peace Economics*, 22(2):217-243

Frynas, J.G., "Political Instability and Business: the case of Shell in Nigeria", *Third World Quarterly*, 19(3): 457-478

Hausler, N., and Baumgartner, C. (2014), "Myanmar on its way to Responsible Tourism Management: The Important Role of Stakeholder Dialogues", in Wohlmuther and Wintersteiner Eds. *International Handbook on Tourism and Peace*, pp. 181-198

Honey, M., and Gilpin, R., (2009), "Tourism in the Developing World: Promoting Peace and Reducing Poverty", United States Institute of Peace Special Report.

Jafari, J. (1989) *Tourism and Peace*, *Annals of Tourism Research*, 16(3), pp. 439-443.

Kaplan, L. (2004), "Skills Development for Tourism in Alexandra Township Johannesburg", *Urban Forum* 15(4):380-398

Kim, S.S., Prideaux, B., and Prideaux, J., "Using Tourism to promote Peace on the Korean Peninsula", *Annals of Tourism Research*, 34(2): 291-309

Korstanje, M.E., and Clayton, A.(2012), "Tourism and Terrorism: Conflicts and Commonalities." *Worldwide Hospitality and Tourism Themes*, 4 (1): 8-25

Lagat, K., Kiarie, S., and Njiraini, P., "Tourism and Peace: The Role of Election Period Tourism Operating Procedures in Promoting Peaceful Elections in Kenya", in Wohlmuther and Wintersteiner Eds. *International Handbook on Tourism and Peace*, pp. 199-215

Lennon, J. and Foley, M. (2000) *Dark Tourism: the Attraction of Death and Disaster Continuum*: London.

Lennon, J., and Foley, M. (2005), "Dark Tourism: The Attraction of Death and Disaster", Thomson Learning

Lutz, J., and Lutz, B. (2006), "Terrorism as Economic Warfare", *Global Economy Journal*, 6(2)

Mansfeld, Y. and Pizam, A. (2006) *Tourism, Security and Safety: From Theory to Practice* Butterworth-Heinemann: Oxford

Montero, C. G. (2014), "Multicultural Tourism, Demilitarization, and the Process of Peace Building in Panama, "The Journal of Latin American and Caribbean Anthropology", 19(3): 418-440.

Moufakir, O. and Kelly, I. (2010) *Tourism, Progress and Peace* CAB: Wallingford.

Naude, W., and Saayman, A. (2005), "Determinants of tourist arrivals in Africa; a panel data regression analysis", *Tourism Economics*, 11(3): 365-391

Pizam, A. and Mansfeld, Y. (1996) *Tourism, Crime and International Security Issues*. John Wiley and Sons: New York.

Pizam, A., Fleisher, A., and Mansfeld, Y., "Tourism and Social Change: The Case of Israeli Ecotourists Visiting Jordan", *Journal of Travel Research*, 41(2): 177-184.

Pizam, A., and Fleisher, A., "Severity versus Frequency of Acts of Terrorism: Which has a larger impact on Tourism Demand?", *Journal of Travel Research*, 40(3): 337-349

Pratt, S. and Liu, A. (2015). Does Tourism Really Lead to Peace? A Global View. *International Journal of Tourism Research*. 18(1):82-90

Prideaux, B. (2005), "Factors affecting bilateral tourism flows", *Annals of Tourism Research*, 32(3): 780-801

Ryan, C. (2007) *Battlefield Tourism: History, Place and Interpretation* Elsevier: Oxford

Saha, S., and Yap, G. (2013), "The Moderation Effects of Political Instability and Terrorism on Tourism Development: A Cross-Country Panel Analysis", *Journal of Travel Research*, 20(10):1-13

Salazar, N. B., (2006) Building a 'Culture of Peace' through Tourism: Reflexive and analytical notes and queries. *Universitas Humanística*, 62, 319-333.

Sharpley, R. and Stone, P.R. (2010) *The Darker Side of Travel: The Theory and Practice of Dark Tourism* Channelview Publications: Clevedon

Sheldon, P.J., and Abenoja, T. (2001), "Resident attitudes in a mature tourism destination: the case of Waikiki", *Tourism Management* 22(5): 435-443

Simone-Charteris, M., and Boyd, S. (2010), "Northern Ireland Re-emerges from the Ashes" The Contribution of Political Tourism towards a more visited and peaceful environment", in Moufakkir and Kelly Eds. *Tourism Progress and Peace*

Sonmez, S.F., Apostolopoulos, Y., and Tarlow, P. (1998), "Tourism in Crisis: Managing the Effects of Terrorism", *Journal of Travel Research*, 33(1):13-18

Teye, V., Sönmez, S., and Sirakaya E. (2002). "Resident Attitudes toward Tourism Development", *Annals of Tourism Research*. 29(3):668-688

Upadhyaya, P.K., "Peace Sensitivity in Tourism Codes of Conduct at Destinations in Conflict: A Case Study of Partnership Actions in Pokhara, Western Nepal", in Wohlmuther and Wintersteiner Eds. *International Handbook on Tourism and Peace*, pp. 230-246



The World Travel & Tourism Council is the global authority on the economic and social contribution of Travel & Tourism.

WTTC promotes sustainable growth for the sector, working with governments and international institutions to create jobs, to drive exports and to generate prosperity. For 25 years, WTTC has been the voice of this sector globally. Council Members are the Chairs, Presidents and Chief Executives of the world's leading, private sector Travel & Tourism businesses.

Travel & Tourism is a key driver for investment and economic growth globally. By the end of 2016, Travel & Tourism will contribute US\$7.4 trillion or nearly 10% of global GDP, once all direct, indirect and induced impacts are taken into account. The sector will account for 290 million jobs and 9.6% of total employment, or one in eleven of all jobs on the planet.

## INSTITUTE FOR ECONOMICS & PEACE

The Institute for Economics and Peace (IEP) is an independent, non-partisan, non-profit research organisation dedicated to promoting a better understanding of the social and economic factors that develop a more peaceful society.

IEP is best known for the Global Peace Index (GPI), an annual ranking of 162 countries on their levels of internal and external peacefulness. The GPI is considered to be the world's leading measure of international peacefulness. It has raised significant awareness about the drivers and indicators of peace and has become a valued resource used by academics, intergovernmental organisations and governments around the world. It is now referenced in over 1,300 journal articles and books.

The IEP research team is highly skilled in the specialised development of indicators and composite indices. This requires specific familiarity and understanding of the variety of publically available government and intergovernmental datasets and the various statistical and theoretical issues associated with index construction.



Copyright © World Travel & Tourism Council: "Tourism As A Driver of Peace" 2016. All rights retained.

The permitted use of the Content is defined by the copyright law of the United Kingdom. By exception ("fair dealing"), you are allowed to copy limited extracts of the Content when the use is for non-commercial research, private study, criticism or review, quotation or news reporting. A condition of fair dealing with a copyright work is that where possible the work is accompanied with a sufficient acknowledgement of the title and author of the work. WTTC requires that the acknowledgment be in the following form: "Copyright © World Travel & Tourism Council: "Tourism As A Driver of Peace". All rights retained."

If your use of the Content would not be permitted under the determination of fair dealing then you must operate under, and display the terms of a Creative Commons ("CC") licence from WTTC. All CC licenses require you provide attribution and mark the material when you share it publicly. WTTC requires attribution in the following form:



"Tourism As A Driver of Peace" by World Travel & Tourism Council is licensed under a Creative Commons Attribution-NonCommercial 4.0 International License. Based on a work at wtcc.org.

This licence prohibits you from applying effective technological measures or imposing legal terms that would prevent others from doing what the licence permits. It terminates automatically when you fail to comply with the stated terms. Under the terms of this licence, you must fix the problem within 30 days of discovery or you may become eligible for criminal prosecution.



## THE AUTHORITY ON WORLD TRAVEL & TOURISM

WORLD TRAVEL & TOURISM COUNCIL (WTTC), THE HARLEQUIN BUILDING, 65 Southwark Street, London SE1 0HR, United Kingdom  
Tel: +44 (0) 207 481 8007 | Fax: +44 (0) 207 488 1008 | Email: [enquiries@wttc.org](mailto:enquiries@wttc.org) | [www.wttc.org](http://www.wttc.org)

