

BUSINESS & PEACE REPORT

**PEACE: A GOOD PREDICTOR
OF ECONOMIC SUCCESS**

**INSTITUTE FOR
ECONOMICS
& PEACE**

INSTITUTE FOR ECONOMICS & PEACE

Quantifying Peace and its Benefits

The Institute for Economics & Peace (IEP) is an independent, non-partisan, non-profit think tank dedicated to shifting the world's focus to peace as a positive, achievable, and tangible measure of human well-being and progress.

IEP achieves its goals by developing new conceptual frameworks to define peacefulness; providing metrics for measuring peace; and uncovering the relationships between business, peace and prosperity as well as promoting a better understanding of the cultural, economic and political factors that create peace.

IEP is headquartered in Sydney, with offices in New York, The Hague, Mexico City and Brussels. It works with a wide range of partners internationally and collaborates with intergovernmental organisations on measuring and communicating the economic value of peace.

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Executive summary

This report analyses the relationship between the economic performance of a country and its levels of peace. The major finding of this report is that peace acts as a good predictor of a country's future performance in a number of macroeconomic indicators. These insights can be used to better assess the expected investment potential of countries.

Rather than asking what businesses can do for peace, the study differentiates itself from other work by focusing on what peace can offer businesses. Institute for Economics & Peace (IEP) sees this as an important but missing step in business analysis. In order for businesses to be an actor in building peace, investors first need to see the benefits of peace to their investment decisions.

The results of this work show that economic performance can be predicted by understanding the movement in the same socio-economic factors that affect peacefulness. These conditions are known as Positive Peace. The countries that improved the most in Positive Peace between 2010 and 2016 also had substantially above average economic performance.

Five macroeconomic indicators were analysed through two different measures of peace: the Global Peace Index (GPI), which measures the absence of violence or fear of violence, and the Positive Peace Index (PPI), which measures the attitudes, institutions and structures that create and sustain peaceful societies. IEP's research has found that measures of Positive Peace are a good indicator of future levels of peace and of macroeconomic performance.

Countries who currently have low levels of violence or fear of violence, as measured by the GPI, over the last six decades have averaged 3 times the gross domestic product (GDP) growth rates of countries ranked at the bottom of the GPI over the same period. Similarly, countries that perform well on the GPI have lower inflation rates, easier access to financing, and higher rates of foreign direct investment (FDI). However, defining peace solely by levels of violence does not provide a complete picture of the future prospects for peace and business. Changes in Positive Peace are a more accurate measure of future prospects.

Changes in Positive Peace are associated with changes in a number of macroeconomic indicators – GDP growth, FDI and credit ratings. Because it measures the background socio-economic conditions that creates the environment for both peace and business to flourish, changes in Positive Peace are lead indicators for future changes in both peace and the business environment. Between 2005 and 2016, countries that were improving in Positive Peace had on average 2 per cent per annum higher GDP growth rates than countries deteriorating in Positive Peace.

Economic performance and peace are often mutually reinforcing. That is, better economic performance assists in building peace and vice-versa. Together they can form a virtuous cycle. Similarly, a worsening performance in peace hinders economic growth, forming a vicious cycle. The economy and peace can therefore be thought of as a system that can move in either a beneficial or destructive direction. Identifying tipping points within this system, both positive and negative, is of obvious interest to business and the broader community.

Rather than focussing on nations with already strong business environments, where possible, this study centres on countries outside of the US and Europe. These countries generally have lower levels of peace and economic achievement and receive less global attention in the international investment community. However, such countries are of interest from a business perspective. Early investment in countries that have the potential to improve in peacefulness will see higher returns on the back of improvements in the aforementioned macroeconomic indicators. Further, the robustness of a business environment, measured by the number of businesses per 100,000 people, increases with peacefulness. This indicates opportunity, as the more businesses that exist, the more likely new businesses are to emerge.

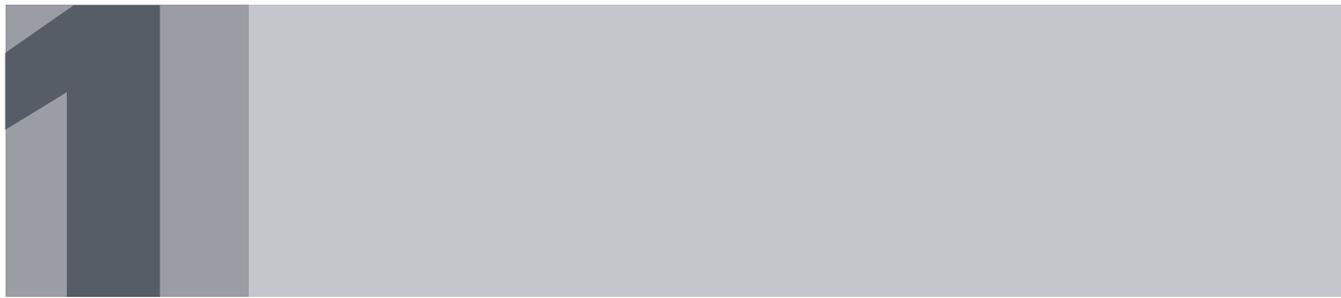
Countries not currently ranked amongst the world's most peaceful nations offer the best opportunities for investment. Studies by the World Bank suggest that returns on investment are up to 8 per cent higher in countries with lower levels of peace.¹ Additionally, with improvements in Positive Peace, some of which can come from increased investment, the frequency and adverse impacts of events such as violent demonstrations or political upheaval is reduced.

IEP's analysis finds that all eight Pillars of Positive Peace are closely tied to the performance of private enterprise and the economy. For example, Free Flow of Information is not only critical for an informed populous but also helps market integration due to greater availability of information on prevailing prices. Free Flow of Information also helps in keeping tariff levels low, which is crucial for the efficient allocation of inputs available to the economy. Greater Acceptance of the Rights of Others increases the economic participation of marginalised groups, in turn increasing their purchasing power.

Analysis of the links between business and peace, through the lens of Positive Peace, offers the business community a new way of assessing the risk of investments and identifying the potentially large opportunities that exist in under-examined countries.

Key Findings

- Over the last six decades, GDP growth has been three times higher in highly peaceful countries, as measured by the GPI, than in countries with low levels of peace.
- Over the last decade, countries with the highest improvements in their GPI score recorded GDP per capita growth seven times higher than those that deteriorated the most.
- On average, inflation is three times higher and ten times more volatile in countries ranked at the bottom of the Global Peace Index than countries at the top.
- Foreign direct investment inflows are more than two times higher in countries with higher levels of peace.
- A one per cent increase in Positive Peace was associated with a 0.9 per cent appreciation in the domestic currency for non-OECD countries between 2010 and 2016.
- Improvements in Positive Peace are associated with a 1.4 per cent per annum average appreciation in the domestic currency, while a deterioration in Positive Peace is associated with a 0.4 per cent average depreciation. IEP's Positive Peace framework offers businesses a new tool to assess the risk of investments and identify the potentially large opportunities that exist in under-examined countries.
- Based on historical analysis, low peace countries that are making significant improvements in Positive Peace will be expected to have the strongest economic returns.



Introduction

It is well-established that peace is good for business performance and private sector-led economic development. Violence resulting from armed conflict and crime imposes a transaction cost on business. Peace is associated with improved functionality of markets through increased competition and better institutions.

The link between business and peace is an important topic. A large body of work has focused on guidelines, such as the United Nations (UN) Global Compact's Ten Principles,² promoting how businesses can support peace. In this paper, IEP asks the converse but equally important question: why is peace good for business?

In countries where peace is low, business may suffer. However, such countries can simultaneously offer highly unsaturated markets with large scope for economic expansion, if the correct underlying social conditions are present. Post-violent economic recovery can yield high rates of GDP growth.³ Despite this, funds do not flow to destinations affected by armed conflict due to very high levels of perceived risk. This paper offers findings aimed to help businesses assess risk in a more efficient manner. A *Sound Business Environment* (one of the eight Pillars of Positive Peace) is associated with low levels of violence, and there is a virtuous cycle between the two. At the same time, a *Sound Business Environment* is an integral part of a peaceful society and one of the eight pillars of IEP's Positive Peace framework.

IEP research shows a close link between peace and economic success. IEP's measures of peace provide a framework for business and investors to understand the level of risk and potential opportunity in a country.

IEP has found that there are common underlying conditions that foster improvements in both peace and economic performance. This body of work is known as Positive Peace. Changes in Positive Peace precede changes in macroeconomic activity, both positive and negative, thereby providing an ideal mechanism to identify countries with the strongest prospects for economic growth and investment.

Positive Peace is an ambitious conceptualisation of peace in a society. IEP defines Positive Peace as the attitudes, institutions, and structures that create and sustain peaceful societies. IEP's Positive Peace framework is based on common and quantitatively identifiable characteristics of the world's most peaceful countries. Figure 1.1 illustrates the eight pillars of Positive Peace.

BOX 1.1

Measuring Peace: The Global Peace Index (GPI) and the Positive Peace Index (PPI)

The Global Peace Index (GPI), produced annually by IEP, ranks 163 independent states and territories according to their level of peacefulness and stands as the world's leading measure of global peacefulness. The GPI is composed of 23 qualitative and quantitative indicators from highly respected sources, covering 99.7 per cent of the world's population. The index gauges global peace using three broad themes: the level of safety and security in society; the extent of domestic or international conflict; and the degree of militarisation.

The Positive Peace Index (PPI) measures the level of Positive Peace in 163 countries. The PPI is composed of 24 indicators to capture the eight Pillars of Positive Peace. Each of the indicators was selected based on the strength of its statistically significant relationship with the GPI.

For the latest Global Peace Index Report, Positive Peace Report, and to explore the interactive map of global peace, visit www.visionofhumanity.org.

"There are common underlying conditions that foster improvements in both peace and economic performance."

FIGURE 1.1

The Pillars of Positive Peace

A visual representation of the factors comprising Positive Peace. All eight factors are highly interconnected and interact in varied and complex ways.



Source: IEP

As Positive Peace works systemically, changes within the system cannot be explained by simple linear causality. This is not only true for peace, but also for the business environment. A robust business environment, as well as peace, springs from a background set of conditions, articulated through the eight Pillars of Positive Peace. For example, *Free Flow of Information* is vital for the correct pricing of transactions and a well-functioning media industry. Similarly, *Acceptance of the Rights of Others* allow for greater participation of communities within

a society. This inclusiveness improves peace and allows more individuals to achieve their potential, which in turn supplies more entrepreneurs for business.

What is important is the systemic nature of business and peace. It is impossible to determine the influence of individual Pillars on one another. Does a Well-functioning government lead to *Free Flow of Information* and *Low Levels of Corruption*, or does the media's focus on corruption lead to a better functioning

government? *Well-Functioning Government, Free Flow of Information* and *Low Levels of Corruption* mutually influence each other, as is true with all eight Pillars.

Sound Business Environment is one of the eight Pillars of Positive Peace and refers to the conditions that enable businesses to perform well and operate efficiently. A *Sound Business Environment* represents one of the principal ways that members of society routinely solve conflicts without violence. Indicators that measure *Sound Business Environment* strongly correlate with the level of peacefulness in a country.

A strong business environment has several systemic and positive effects for Positive Peace through its impact on employment, business density and level of competition, which can lower corruption and improve governance. For instance, research suggests that a lack of employment opportunities for youth is associated with a higher risk of war in fragile contexts,⁴ but increased availability of decent work inhibits citizens from participating in violence. Such positive economic externalities contribute to improving peace.

Entrepreneurship has long been identified as an engine of economic growth. It is also an instrument of social transformation in developing countries.⁵ This is evident in the transformation produced by business innovation since the industrial revolution. More specifically, the availability of electricity, internet, mobile phones, personal computers and air travel are recent phenomena in terms of human history. However, not every global citizen has benefited from such progress in living standards in the same way. This is particularly true for less peaceful countries. For this group of countries to achieve sustainable economic development and stability, private enterprise has an important role to play.

Business in peaceful countries enjoys better-functioning formal and informal institutions. *Well-Functioning Government* delivers high-quality infrastructure and services, engenders trust and participation, and upholds law and order. This context incentivises citizens and businesses to participate in creating and ensuring public order and safety due to the stake they have in the peaceful order of their societies.

Therefore, for a country to have a highly effective business sector, a minimal level of peace is an important condition. The gain to the business environment from improvements in peace is higher in the low and mid peace environment.

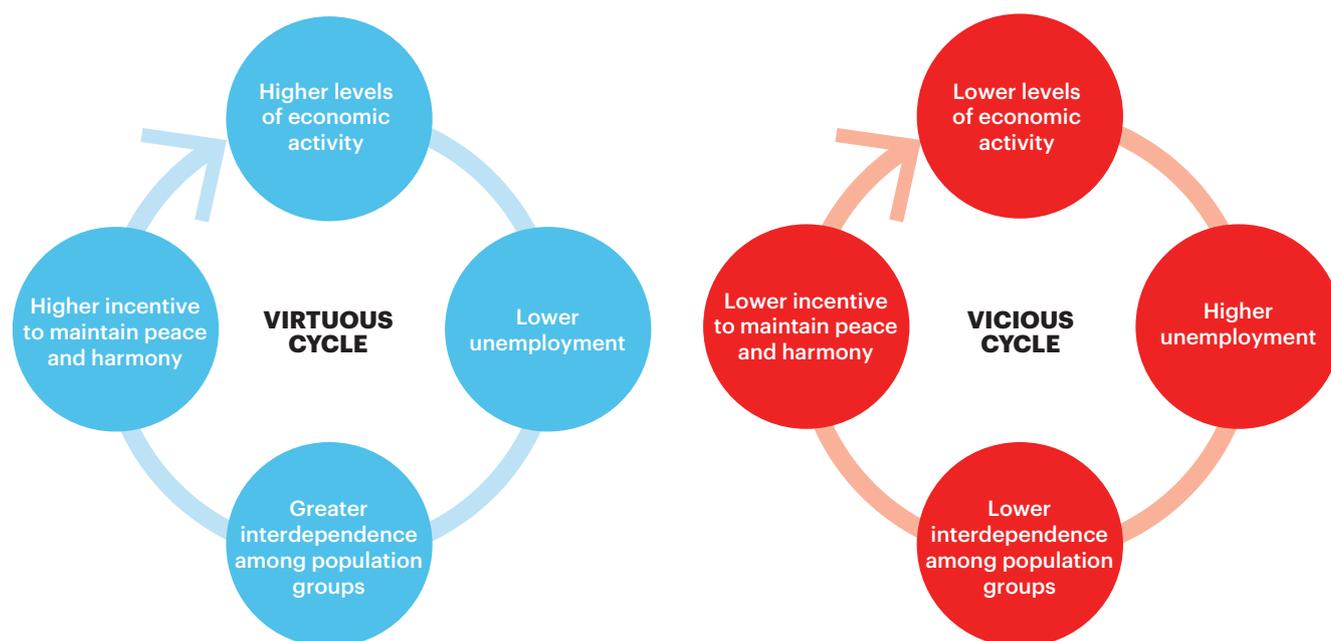
Section 3 of this report discusses the correlation between the Pillars of Positive Peace and specific business indicators. However, rather than implying causal links between peace and business, IEP considers these to describe a system that can form virtuous or vicious cycles. During a cycle of improvement, heightened levels of economic activity increase the degree of interdependence between individuals and groups. This is because the economic losses associated with a deterioration in peace increase for everyone. Conversely, during a downward spiral, lower levels of economic activity and higher levels of unemployment mean that individuals and groups currently excluded from economic circuits have an incentive to disrupt economic activities through illicit means, including violence or fear of violence. Figure 1.2 illustrates both instances.

Changes in Positive Peace help in objectively assessing risk levels. In contexts of moderate to high violence, a sustained trend of improvement in Positive Peace indicates that the system is transitioning from a vicious to virtuous cycle of peace. Such trends indicate significant reductions in the level of risk and uncertainty. Identifying countries in transition offers businesses

FIGURE 1.2

The cyclical relationship between economic activity and peace

Levels of economic activity and peace mutually affect each other.



Source: IEP

and investors insights into markets with a strong potential for superior returns on investment.

In the following sections of the paper, the link between business and peace is explored in the context of two measures of peace, the Global Peace Index (GPI) and the Positive Peace Index (PPI). The GPI's score is based on measures of the absence of violence or fear of violence. However, looking at violence alone cannot

fully describe the true relationship between business and peace. IEP's Positive Peace framework, in analysing the *attitudes, institutions and structures* that create and sustain peaceful environments offers an opportunity to gauge the likely direction things will take in the foreseeable future. This is explored in the section on Positive Peace, which provides a glimpse into the intimate link between business and the eight Pillars of Positive Peace.

BOX 1.2

Predicting Peace: How Positive Peace leads changes in the Global Peace Index

In the 2018 Global Peace Index Report, IEP finds a strong connection between future changes in peacefulness and past performance in Positive Peace.

The twenty countries that experienced the largest improvements in the GPI between 2013 and 2018 showed improvements in aspects of Positive Peace for the years prior. IEP also analysed the changes in Positive Peace for the 20 countries that experienced the largest deteriorations in the GPI since 2013. Fourteen out of these deteriorated in *Acceptance of the Rights of Others* and *Low Levels of Corruption*. Twelve worsened in *Press Freedom*. These results highlight the link between the attitudes, institutions and structures of a society and its subsequent peacefulness.

Improving peacefulness requires prior improvements across many Positive Peace indicators, a number of which are economic in nature. Escalations in violence, however, are preceded mainly by deteriorations of Positive Peace indicators that are political in nature. By taking a systems approach to understanding peace within a country, such findings assist in identifying countries that are approaching tipping points, either positive or negative, in their development.

Insights gained from IEP's work offer a more complete assessment of the risks businesses face from deteriorations in peace in country. It also offers the ability to identify countries when opportunities are expected to improve as their peace strengthens.

2

Global Peace Index and Business

Key Findings

- In the last six decades, per capita GDP growth has been three times higher in highly peaceful countries than in countries with low levels of peace.
- Over the last decade, countries with the largest improvements in peace recorded seven times higher GDP per capita growth than those that deteriorated the most.
- Interest rates are lower and more stable in countries with higher levels of peace.
- On average, inflation is three times higher and ten times more volatile in low peace countries than in high peace countries.
- Foreign direct investment inflows are more than two times higher in countries with higher levels of peace than in less peaceful countries.

Economic prosperity, peace & business

There has been sustained economic growth across the world over the past seven decades. Expanded access to goods and services has contributed to a longer life expectancy and better quality of life. Higher global prosperity can be explained by many factors, including higher productivity, itself driven by technological innovation and a steady rise in human capital, which in turn is driven by strong and stable institutions. Thus, what one experiences is a virtuous cycle of ever-expanding peace and prosperity. Unfortunately, this cycle of peace and prosperity is not equally shared by societies.

The World Bank's index of 'Doing Business' tracks 11 areas of regulatory performance relevant for businesses across countries, including starting a business, getting credit, paying taxes and enforcing contracts.

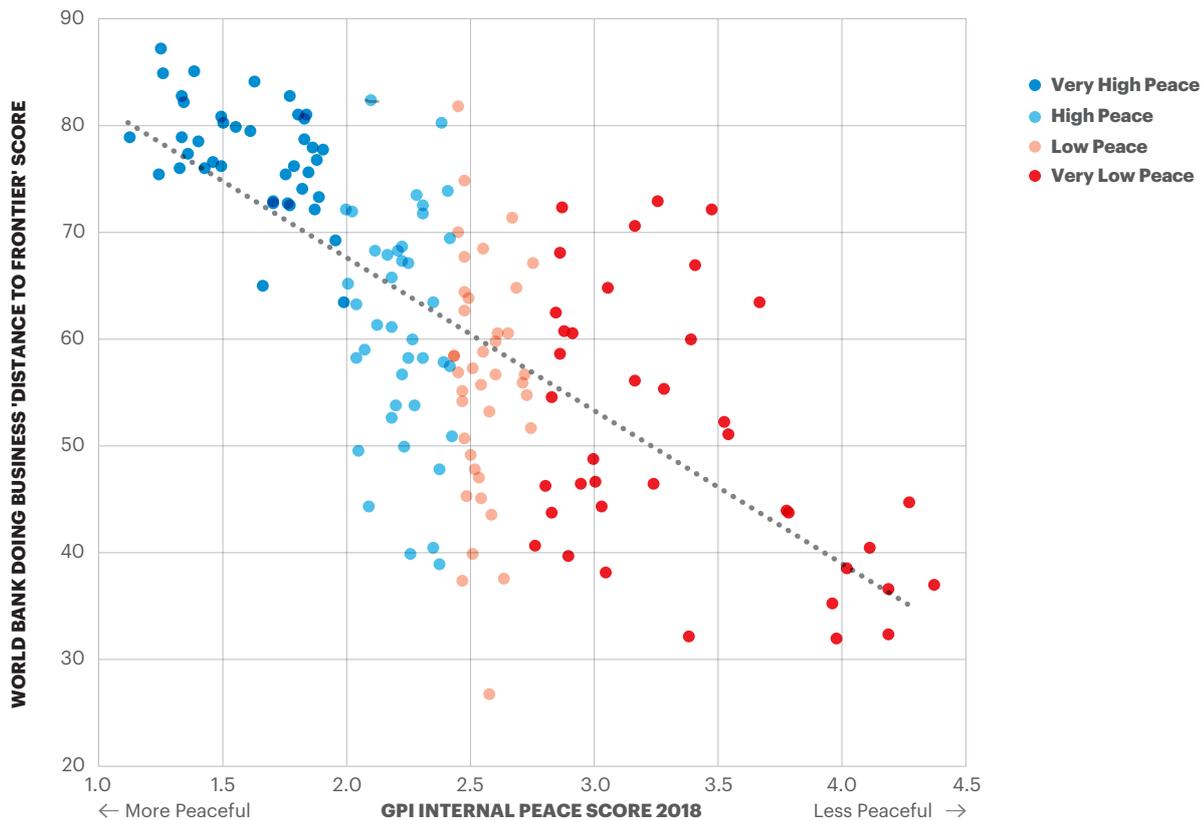
Dividing countries into four groups by the level of their peacefulness and comparing to their Ease of Doing Business score, as shown in Figure 2.1, shows some interesting insights. This shows that the gap between an individual country's performance and the best performing economies, also known as the 'distance to frontier', decreases as peace improves. Thus, good business performance is associated with a higher level of peace. The widest gap occurs in conflict affected countries such as Afghanistan, Syria and South Sudan. However, there are a basket of mid-peace countries, such as Rwanda, Bhutan and Georgia that have shown improvements in Positive Peace over the past decade. With continuing improvements in Positive Peace, these countries would be expected to close this gap in coming years. It is these countries that offer potentially attractive investment opportunities.

The mutually reinforcing relationship between business performance and peacefulness is also demonstrated by the fact that there is an identifiable differences in the historical

FIGURE 2.1

Doing Business and peacefulness, 2017

As peace improves, doing business also becomes easier. Some low and mid-peace countries offer high-quality business environment.



Source: International Finance Corporation, IEP

performance of business environment indicators, such as GDP growth, inflation, interest rate and inflow of Foreign Direct Investment, as per levels of peace. High peace countries generally have better average economic performance with lower volatility compared to the average. Since 1960, the most peaceful countries have, on average, seen their per capita GDP grow by an annual rate of 2.8 per cent. Per person, GDP is now over three times higher in 2016 than it was in 1960.

Less peaceful countries have experienced economic stagnation. Their annual per capita GDP growth has, on average, grown by just one per cent over the last six decades. Poor economic performance has effectively made low peace countries more vulnerable to political instability. Factors such as high levels of poverty, unemployment and inflation have been shown to be risk factors for political unrest.⁶

A common feature of low peace countries is a higher degree of economic volatility. Short spurts of economic growth are often followed by periods of stagnation and, in extreme cases, prolonged economic contractions. Poor governing mechanisms and political polarization can exacerbate economic shockwaves, thereby prompting a cycle of instability.⁷ Prolonged macroeconomic volatility is often a precursor to hyperinflation, currency devaluation and indebtedness – all of which can create further political and economic instability.

A descriptive analysis of the long-term economic performance (since the 1960s) of countries at different levels of peacefulness

"Since 1960, the most peaceful countries have, on average, seen their per capita GDP grow by an annual rate of 2.8 per cent."

is presented. World Development Indicators (WDI) produced by the World Bank are used for estimates of business environment indicators. Country scores from the Global Peace Index (GPI) produced by IEP are used to group countries by levels of peacefulness. Overall, this section aims to illustrate the association between peace and long-term economic performance.

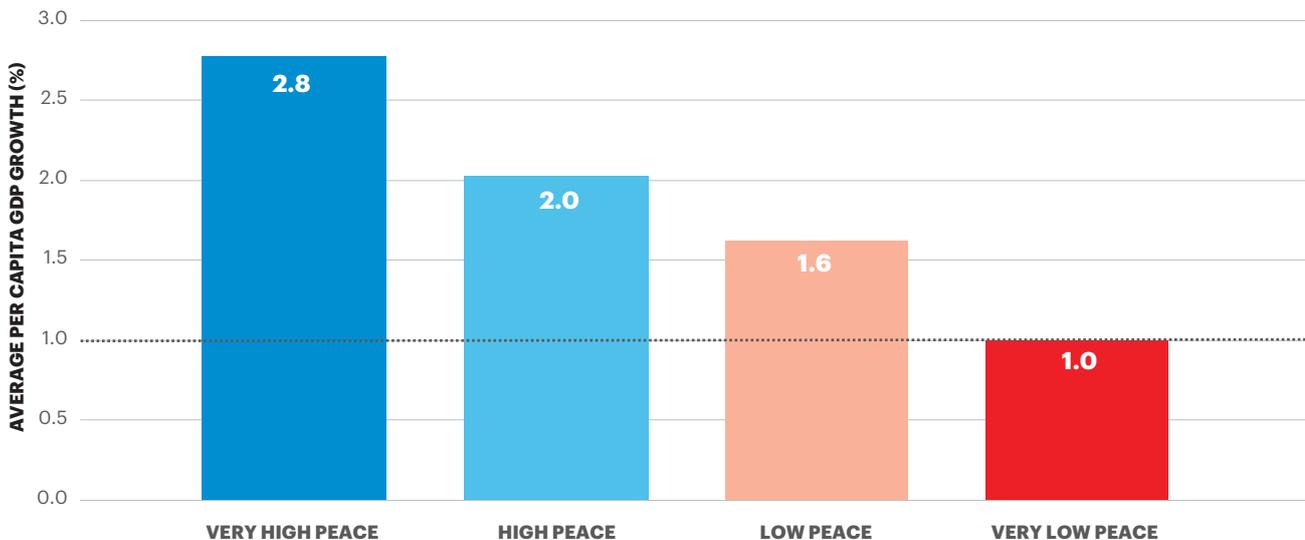
Per Capita GDP growth

Global per capita GDP has shown a sustained increase since 1960. However, at the country level, this trend is characterised by a large degree of variation across nations. While a great number of countries have significantly increased their per person income, others have stagnated, while others have fallen

FIGURE 2.2

GDP growth by level of peacefulness, 1960–2016

Countries with very high levels of peace, on average, achieved over three times higher per capita GDP growth compared to the least peaceful countries.



Source: World Bank, IEP

backwards. Countries that have sustained higher levels of prosperity have also achieved improvements in peace.

Empirical evidence suggests that returns on investment in developing countries exceed those in developed economies. A World Bank study states that the average rate of return in fragile states is 14.5 per cent compared to 9.7 per cent for low-income countries in general and 6.2 for all countries.⁸ Such higher return reflects the risk premium that investors associate with perceptions of higher political risk and weak institutions.

Highly peaceful countries registered per capita GDP growth that was nearly three times higher than that in low peace countries between 1960 and 2016. Average GDP per capita grew annually by 2.8 per cent in the highly peaceful countries, while the rate was only one per cent in the least peaceful countries. The trend analysis does not suggest causality between peace and economic progress but rather shows that peace and economic progress are interlinked. Figure 2.2 illustrates the growth gap between four groups of countries categorized by their level of peace.

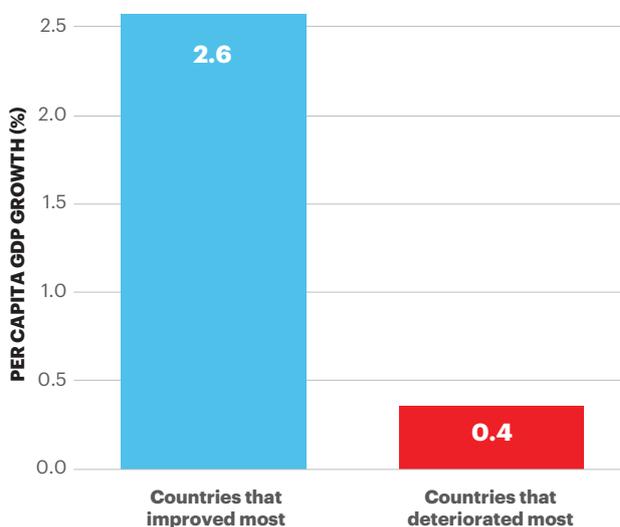
Per capita GDP growth was also higher for countries that improved their level of peace over the last ten years. The twenty countries that improved the most in their overall GPI scores from 2008 to 2018 also achieved GDP growth seven times higher than the 20 countries that deteriorated the most. Figure 2.3 shows average per capita GDP growth for the last ten years for countries that deteriorated or improved the most in peacefulness.

The long-term trend in economic growth shows a divergence in per capita GDP between countries with varying levels of peacefulness. GDP per capita is 20 times larger in highly peaceful countries than lower peace countries because of higher growth rates over the long run. The persistently lower level of growth in per capita income makes it challenging for the least peaceful nations to close the existing gap in living standards

FIGURE 2.3

Per capita GDP growth by improvement or deterioration in peace, average of 20 countries with the greatest change, 2008–2018

On average, the countries that improved the most in peacefulness recorded seven times higher per capita GDP growth compared to those that deteriorated the most.



Source: World Bank, IEP

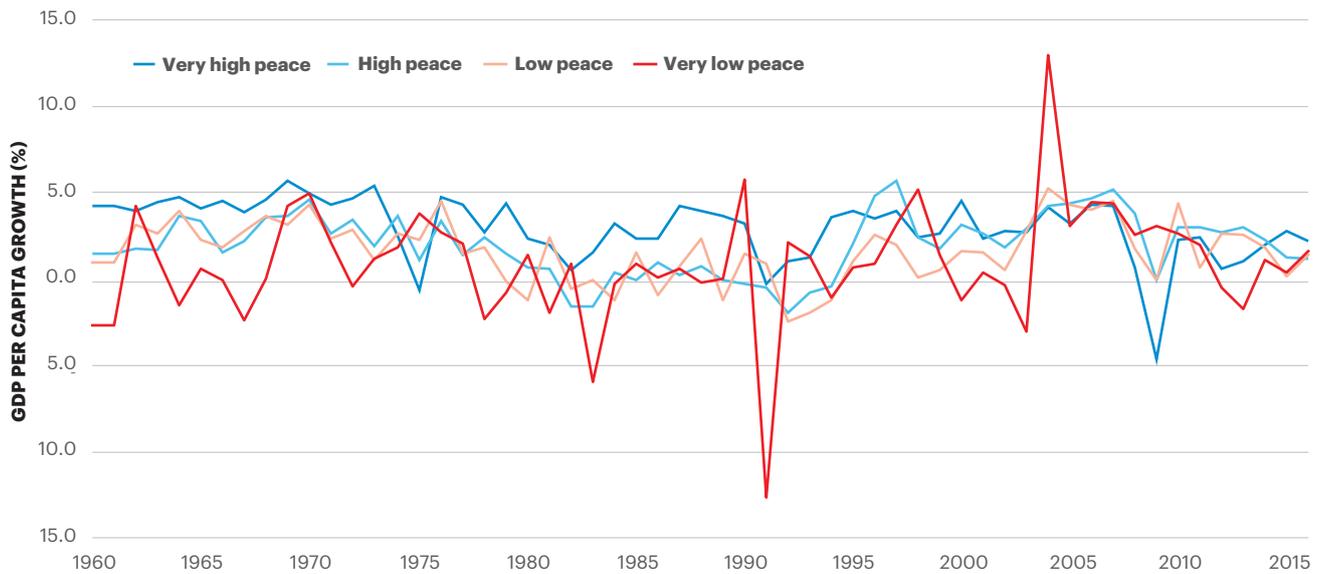
without major structural changes. Figure 2.4 shows annual growth rates since 1960 for different levels of peacefulness.

Deviations from the long-term average indicate greater volatility in growth and create more boom-and-bust cycles, as evidenced in very low peace countries. The deviation from average growth is seven times higher in less peaceful countries, leaving their economies less stable, as seen in figure 2.4.

FIGURE 2.4

Long term growth trend for low and high peace countries, 1960–2016

Very high peace countries have sustained higher growth with fewer and smaller fluctuations over the long term.



Source: World Bank, IEP

Macroeconomic stability and investment

Macroeconomic volatility resulting from political instability and armed conflict dampens investment. Macroeconomic stability, on the other hand, enhances business confidence while reducing market distortions. In addition, maintaining balanced public finances results in lower levels of national debt and also provides sufficient financial stimuli to the economy.

Empirical evidence suggests that creating an environment that is conducive to higher rates of investment can reduce the likelihood of violence. Research by the International Monetary Fund (IMF) has shown that higher degrees of political instability, ideological polarization and lower economic freedom are associated with higher volatility.⁹ Moreover, businesses and investors rank the risk of political instability as a major concern. Other major concerns for investors include macroeconomic instability and institutional issues such as contract breaches and expropriation by the state.¹⁰

Inflation and Peace

Price instability has negative implications for economic activity through its effects on savings, investment and consumption. Low and stable inflation mean that changes in the general level of prices are small and predictable, which reduces future uncertainty for investors. In contrast, price volatility creates risks, reduces profitability and can lead to a concentration of savings in safer but less-productive assets. It can also lead to contractionary monetary policies, including higher interest rates, which make it difficult for businesses, as well as consumers, to borrow and invest.

Highly peaceful countries have been more effective in maintaining lower inflation and avoiding incidences of

"Macroeconomic volatility resulting from political instability and armed conflict dampens investment."

hyperinflation. The data shows that average inflation in very high peace countries was three times lower than in the least peaceful countries. Long-term median inflation in very high peace countries was 3.5 per cent compared to 9.7 per cent in very low peace countries. In addition, price volatility was also more prevalent in less peaceful countries. Figure 2.5 shows the long-term trend in the inflation rate by levels of peacefulness.

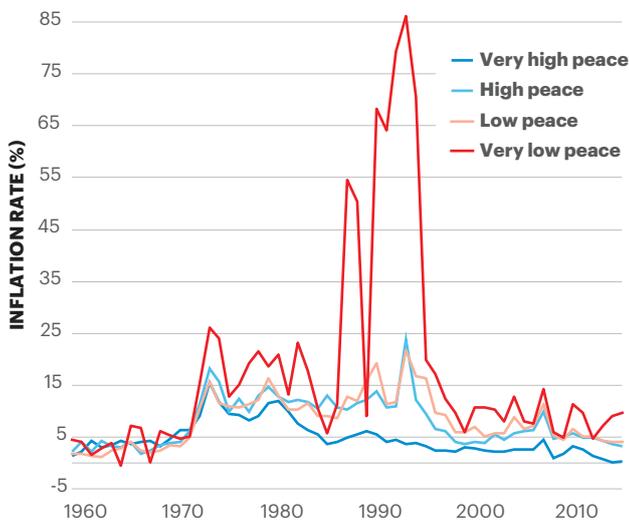
Interest Rates and Peace

Interest rates are an important indicator of macroeconomic stability and are critical to economic successes and investment certainty. Correlation analysis illustrates that when peace deteriorates, interest rates also become more volatile and unpredictable. This unpredictability arises from political uncertainties, perception of risk and higher inflation. A higher interest rate inhibits investment by both businesses and households, leading to a decline in economic activity.

FIGURE 2.5

Long term inflation by level of peace, 1960–2016

Long term trends in the inflation rate show that lower peace countries historically have higher inflation and have experienced more severe inflationary shocks.⁸



Source: World Bank, IEP

While interest rates have declined significantly in most countries, highly peaceful countries experienced the largest declines. The median lending rate in the least peaceful countries was more than two times that in the most peaceful countries since 1990. The average lending interest rate in the most peaceful countries was 8.7 per cent, compared to 20 per cent in very low peace countries.

Interest rates are affected by many factors, including the business environment, risk, inflation rates and consumption preferences. Therefore, premiums for inflation and risk partially explain the mark-up on interest rates in less peaceful countries. Figure 2.6 shows trends in interest rates by level of peace.

Foreign Direct Investment and Peace

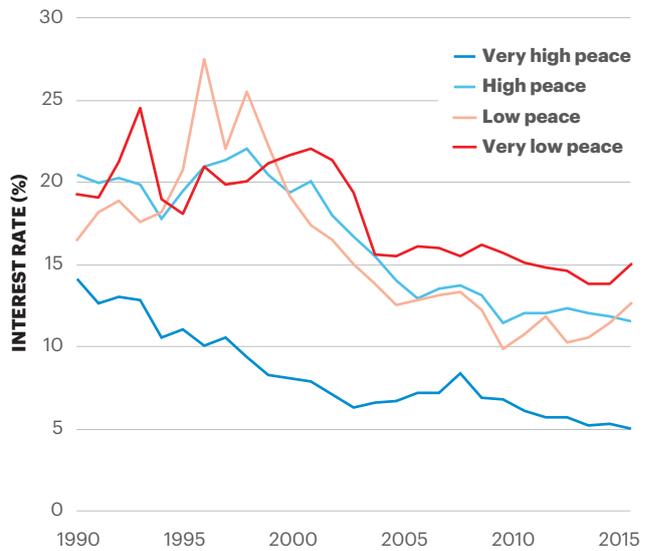
Since 1980, the most peaceful countries outside of the OECD or China have received the equivalent of two per cent of their GDP in foreign direct investment (FDI), on average, compared to 0.84 per cent in the least peaceful countries.¹² Figure 2.7 shows the trend in foreign direct investment by level of peace.

Empirical research has shown that FDI is not only a source of much needed finances, but also brings new technologies and managerial know-how. Therefore, FDI is an important determinant of economic growth in developing countries. In addition, FDI also facilitates integration with the global economy by increasing trade flows. Such investments are rare in a less peaceful context, with the exception of resource-rich countries. However, large-scale investment offers unique opportunities for less peaceful countries to benefit from capital injections, job creation, and a widening tax base.

FIGURE 2.6

Trend in interest rate by level of peace, 1990 – 2016

While interest rates have fallen globally since 1990, they are much lower in the most peaceful countries.

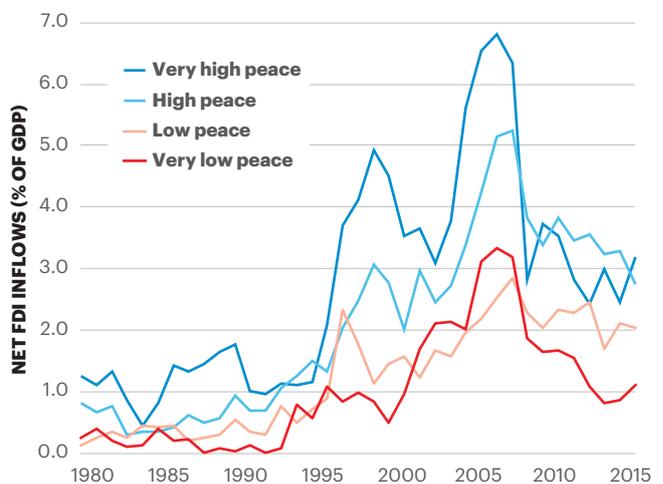


Source: World Bank, IEP

FIGURE 2.7

Foreign direct investment as per cent of GDP, by level of peace, 1980–2016¹³

Net foreign direct investment (FDI) inflows as percentage of GDP are higher in highly peaceful countries.



Source: World Bank, IEP

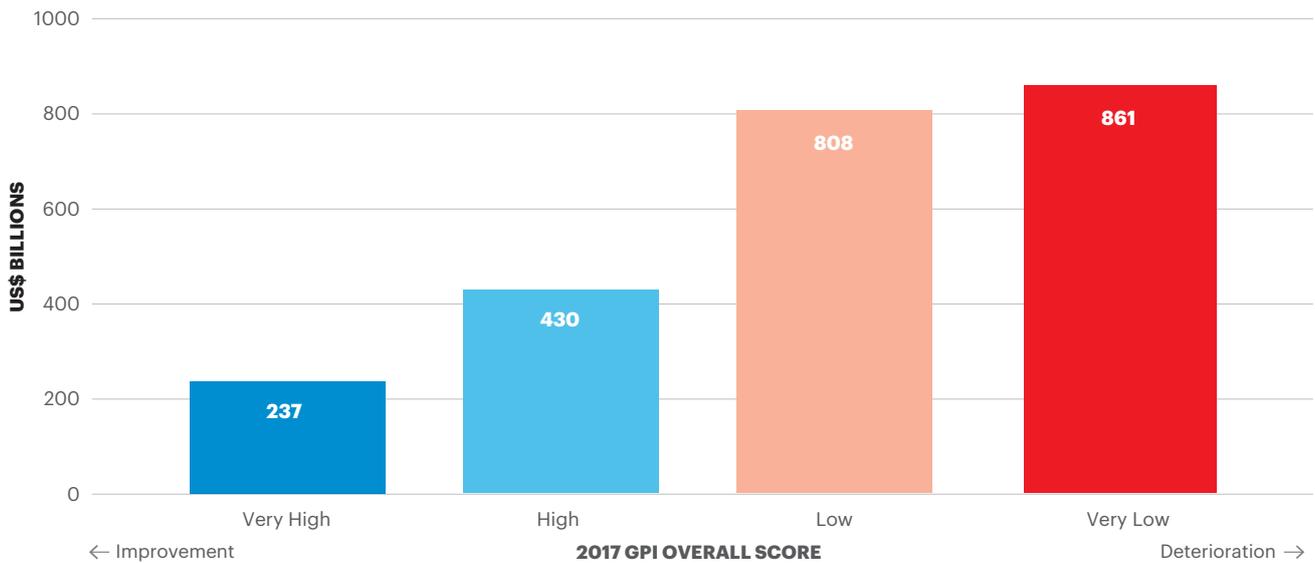
Business Finance and Peace

Any business pursuit requires two critical inputs: finance and entrepreneurial skills. Business initiatives are limited by the fact that investment needs to happen first for revenues and profits to follow. This makes the financing more vital to a business in all stages, from inception to initiation to expansion. Addressing the financing constraint through policy and market paves the way for business to flourish.

FIGURE 2.8

Business finance gap by level of peace, US\$ billions

The total unmet need for credit in low and very low peaceful countries amounts to US\$1.7 trillion.



Source: International Finance Corporation, IEP

Peaceful countries have effective financial markets that can better serve the needs of business. The term “finance gap” defines the unmet credit need of businesses in a country.¹⁴ For less peaceful countries, this gap is estimated at US\$1.7 trillion. Figure 2.8 shows the financial gap for business by levels of peace. A peaceful setting reduces the gap between a business’s need for finances and its availability by supporting functioning capital markets, including stock exchanges and commodity markets. Effective financial infrastructure supports the development of financial markets in low-peace, developing countries. A prudent financial system stands on a highly standardised accounting and auditing structure, sound credit reporting, collateral and insolvency regimes, and well-functioning payment and settlement mechanisms.¹⁵

Peace and the Nature of Constraints to Investors

Institutional quality is an important element of a *Sound Business Environment*. Peaceful economies support a set of institutions that are conducive to business growth and success. Weak and inefficient institutions, in contrast, inhibit business activity. For instance, when the judiciary and law enforcement are weak and ineffective in enforcing contracts, business activities become too risky. Issues such as a lack of transparency and wide spread corruption expropriate resources from business investors.

Table 2.1 illustrates the results from surveys on the major constraints on investment. Results from the World Bank’s Enterprise Survey show that 21 per cent of respondents reported that political instability is the greatest constraint to business investment in less peaceful contexts. The level of political instability and its causes vary between different contexts. Other major constraints in these contexts include access to electricity (13 per cent), access to finance (12 per cent) and corruption (11 per cent).

TABLE 2.1

Investment constraints by level of peace, percentage of respondents

Deficient access to finance and high tax rates are common constraints for investors regardless of the level of peace in a country. However, political instability, corruption and infrastructure-related issues seem to be the primary concerns in less peaceful countries.

Business investment constraint	Very High Peace	High Peace	Low Peace	Very Low Peace
Access To finance	14%	16%	12%	12%
Tax rates	15%	11%	15%	7%
Inadequately educated workforce	10%	7%	5%	3%
Informal sector competition	16%	13%	9%	7%
Political instability	6%	11%	11%	21%
Corruption	4%	6%	12%	11%
Electricity	5%	11%	15%	13%

Source: IEP, World Bank Enterprise Survey

In highly peaceful countries, on the other hand, access to finance and competition from the informal sector are the most pressing constraint -- reported by 16 per cent of businesses. This is followed by constraints related to high tax rates and an inadequately educated workforce and political instability.

Thus, in highly peaceful countries, businesses are likely to face constraints of an economic nature, while in low peace contexts, constraints are more political in nature.

3

Positive Peace & Business

Key Findings

- Pillars of Positive Peace plays a specific role in the promotion of businesses and economic activity.
- There is a high correlation between the eight Pillars of Positive Peace and factors critical to business and economic activities.
- Positive Peace also contributes to the overall soundness of a country's economic fundamentals, such as strength and stability of currencies and a better credit rating.
- Non-OECD countries that improve in Positive Peace had, on average, 1.45 percentage points higher annual GDP growth between 2005 and 2016 compared to those that deteriorated in Positive Peace.
- Non-OECD countries that deteriorated significantly in Positive Peace from 2010 to 2016 had an average fall in their credit rating of 4.8 points on a scale of 0 to 22.
- Improvements in Positive Peace are linked to stronger domestic currencies.
- A one per cent increase in Positive Peace is associated with a 0.9 per cent appreciation of the domestic currency among non-OECD countries.
- Improvements in Positive Peace are associated with an average currency appreciation of 1.4 per cent per annum, while a deterioration in Positive Peace is associated with an average depreciation of 0.4 per cent.

Pillars of Positive Peace and Business Performance

Business activity is easier when Positive Peace improves. Conversely, lower levels of Positive Peace introduce higher transaction costs to undertake the same amount of economic activity.

Another dividend of enhanced Positive Peace for businesses is an increased propensity to spend. As Positive Peace increases,

the frequency and impact of uncertain events decline, thereby motivating households and businesses to undertake big ticket spending activities which they might have been postponing due to uncertainties.

Although the current state of peace for a country can be measured and known, it is not necessarily a predictor of future changes in peace. This is especially true for countries in the middle two quartiles of the Global Peace Index. Positive Peace acts as a lead indicator of the future levels of a country's peacefulness and its economic performance. Improvements in Positive Peace bode well

for future peace and economic conditions, whereas deteriorations bode poorly. Furthermore, IEP research has found that a deficit in Positive Peace is an indicator of risk; countries whose GPI rank is significantly higher than their PPI rank are more likely to suffer major deteriorations in peace in the near future. IEP's work in predicting future major deteriorations in peace Positive Peace used a basket of twenty countries with nearly a sixty per cent accuracy rate in predicting future falls in peace.

Table 3.1 shows the correlations between the Pillars of Positive

Peace and indicators of critical factors that determine business performance. This highlights that while IEP's Positive Peace framework includes economic indicators in *Sound Business Environment*, the remaining seven Pillars also correlate with aspects of a strong economy.

These results indicate that improvements in Positive Peace are associated with improved factors affecting business performance, creating a virtuous cycle. This is because improvements in Positive Peace:

TABLE 3.1

Positive Peace Pillars and the economic system

All eight Pillars of Positive Peace play a significant role in facilitating and strengthening specific aspects of a Sound Business Environment.

POSITIVE PEACE PILLAR	EFFECT ON THE ECONOMY AS THE PILLAR IMPROVES	WORLD DEVELOPMENT INDICATOR METRIC	CORRELATION COEFFICIENT* WITH THE PP PILLAR
Free Flow of Information	Greater information	Borrowers from commercial banks (per 1,000 adults)	-0.44
	Increased start-ups	New business density (new registrations per 1,000 people ages 15-64)	-0.49
	Lower tariffs	Tariff rate, applied, weighted mean, all products (%)	0.48
	Cost savings	Logistics Performance Index: Ease of arranging competitively priced shipments	-0.53
Well-Functioning Government	Improved contract enforcement	Property rights and rule based governance	-0.78
Low Levels of Corruption	Lower tariffs	Tariff rate, applied, weighted mean, all products (%)	0.57
	Bureaucratic transparency	Country Policy and Institutional Assessment (CPIA) transparency, accountability, and corruption in the public sector rating	-0.79
	Better resource allocation	International Development Association (IDA) resource allocation index	-0.69
High Levels of Human Capital	Higher Productivity	GDP per person employed (constant 2011 PPP)	-0.75
	Reduced talent search costs		
	Knowledge-based economy	Research and development expenditure (% of GDP)	0.71
Sound Business Environment	Ease of navigating regulatory requirements of the government	CPIA business regulatory environment rating	-0.78
		Logistics Performance Index: Efficiency of customs clearance process	-0.85
	Ease of access to finance	Firms using banks to finance working capital (% of firms)	-0.42
Equitable Distribution of Resources	Improved respect for private property rights and reduced property-related crime	Losses due to theft and vandalism (% of annual sales for affected firms)	0.44
Acceptance of the Rights of Others	Increased productive engagement of young women	% of female youth not in education, employment or training, female	0.47
Good Relations with Neighbours	Better performance in international related regulations	Volume of trades as share of GDP	-0.39
		Lower tariffs	0.55
		CPIA trade rating	-0.43

Source: IEP, World Bank World Development Indicators

- **Enhances a country's capacity to enforce contracts through third party (court of law) arbitration.**
- **Allows all groups in society to find employment or start their own businesses.**
- **Increases the efficiency of production process.**
- **Reduces the likelihood that businesses will face criminality or corruption.**

The remainder of this section discusses the relationship of each Pillar of Peace to business.

Sound Business Environment

Sound Business Environment captures the performance of the economy and the ease with which businesses are able to navigate the government's regulatory requirements. IEP's composite metric for an all-around sound business environment shows a strong correlation ($r > |0.7|$) with metrics of the regulatory environment and efficient customs processes, indicating that the same conditions that lead to peaceful societies go hand in hand with factors that encourage trade. Improvement in *Sound Business Environment* also enables a larger number of firms to access the formal banking system to meet their working capital requirements. The degree of association between *Sound Business Environment* and the percentage of firms using commercial banks to finance their working capital requirement is relatively high ($r = -0.42$).

Free Flow of Information

Free Flow of Information plays a crucial role in fostering healthy democracy and promoting trade and commerce. Improvements in *Free Flow of Information* reduce information bottlenecks, which improves price discovery and market activity. Greater availability of information can lead to more market integration, which reduces search costs in the economy. Availability of information also helps in commercial collaborations and innovations, thus helping businesses improve their profitability and encouraging new entrants into the business world.

Analysis shows that *Free Flow of Information* is highly correlated with indicators of new entries into the business world. The strength of correlation between the 'Number of New Business Registrations per 100,000' and *Free Flow of Information* is -0.49. Increased information also helps in reducing friction in financial markets with the Number of Borrowers and *Free Flow of Information* correlating at -0.44. The analysis also indicates that improved *Free Flow of Information* reduces the search cost for procurements, with the Pillar strongly correlating with Ease of Arranging Competitively Priced Shipment at -0.78.

A surprising element of the analysis is that countries with higher levels of *Free Flow of Information* also have lower tariff rates.¹⁶ The mechanisms for this is likely indirect. Greater availability of information among the population about lower commodity prices in foreign countries places pressure on the domestic government to reduce the tariff levels so that price differentials in foreign and domestic markets are minimal. For example, a high differential between retail prices of petroleum products in India and crude prices in the international market

due to high tariff levels and other taxes has become a debated issue in Indian politics.¹⁷

Well-Functioning Government and Low Levels of Corruption

Similarly, effective third-party arbitration of bilateral contracts is a major concern of businesses willing to invest in emerging economies. This improves with higher scores for *Well-Functioning Government*. This is intuitive given that a key component of this Pillar is an effective and independent judiciary. Respect for private property and effective courts is a major contributor to confidence-building amongst potential entrepreneurs. A high degree of association between Well Functioning Government and Property Rights and Rule Based Governance score ($r = -0.78$) demonstrates this point.

High levels of corruption in a country make local bureaucracy less transparent, creating a serious bottleneck for domestic and foreign investors. Often, foreign investors seeking to invest in emerging countries face the challenge of dealing with officials demanding bribes. Improvements in *Low Levels of Corruption* are closely linked to amelioration of this problem. This is demonstrated by a high degree of correlation between *Low Levels of Corruption* and Bureaucratic transparency ($r = -0.79$).

IEP also found that effective tariff rates are strongly associated with the Pillar of *Low Levels of Corruption* ($r = 0.57$). Higher levels of effective tariff rates in corrupt environments may occur for many reasons. This hurts the long-term interest of the local economy as disproportionate tariffs artificially distort consumption choices and adversely affect production decisions.

Corruption subverts competition and favours selected firms, particularly in the area of public procurement.¹⁸ This inefficiency is substantiated by the high degree of association between the *Low Levels of Corruption* Pillar and World Bank's Resource Allocation index (-0.69). Research has also found that bribery decreases investment efficiency. The result is more pronounced for small and medium-sized domestic firms.¹⁹ Research has found that increasing corruption uncertainty has a negative impact on corporate investments.²⁰

High Levels of Human Capital

A healthy and educated working population, captured by the *High Levels of Human Capital* Pillar, is a key factor in successful business operations. Productivity of workers in the economy, measured by GDP per employed persons, correlates strongly with the *High Levels of Human Capital* Pillar ($r = -0.75$). Greater access to a highly capable workforce in the economy reduces cost and time, while skilled individuals are less likely to emigrate if high quality jobs are available. This is important for developing countries because when highly-skilled individuals emigrate and less-skilled workers immigrate, countries find it difficult to efficiently capitalise on foreign aid and remittances.²¹ Additionally, High levels of Human Capital also allows the potential for a knowledge-based economy, a potent source of sustained growth.

Countries that rank high in *High Levels of Human Capital* tend to have higher R&D expenditure as percentage of their GDP. The degree of correlation between *High Levels of Human Capital* and R&D expenditure expressed as a percentage of GDP

is -0.75. Research also indicates that improved human capital has a longer lasting positive effect on labour productivity than improvements in physical capital.²²

Equitable Distribution of Resources

Equitable Distribution of Resources improves respect for private property rights by reducing property related crimes. The World Development Report 2017 has highlighted the higher levels of inequality are related to higher levels of crime, particularly property related crime. IEP's analysis shows that firms operating in countries with lower levels of *Equitable Distribution of Resources* tend to report higher levels of losses due to theft and vandalism measured as a percentage of annual sales ($r=0.44$). It is also well established in empirical studies that countries with *Equitable Distribution of Resources* generally have higher aggregate consumption demand.²³ Thus *Equitable Distribution of Resources* reduces losses from theft and vandalism and boosts sales through higher demand as more people move into the middle class.

Acceptance of the Rights of Others

Acceptance of the Rights of Others ensures greater workforce participation, particularly from marginalised social groups, which greatly enhances the available stock of human capital. Importantly, this pillar brings diversity of ideas, which sustains future growth of businesses. For example, the correlation of *Acceptance of the Rights of Others* Pillar with Share of Youth Not Engaged in Productive employment or Education is 0.47, indicating that as countries deteriorate in this Pillar the number of non-engaged youths increase.

Good Relations with Neighbours

Good Relations with Neighbours not only refers to the relations between states but also other factors such as ethical or cultural integration.

Countries that have *Good Relations with Neighbours* tend to report higher levels of trade as a share of their GDP and have lower tariff levels ($r=-0.39$). These countries also perform well in trade policies as rated by the World Bank indicator 'Trade Rating,' which assesses the effectiveness of countries' policy framework in fostering trade in goods and services ($r=-0.43$). On the other hand, countries that score low in *Good Relations with Neighbours* tend to have higher average tariff rates, which inhibits trade ($r=0.55$).

Economy-wide effects of Positive Peace

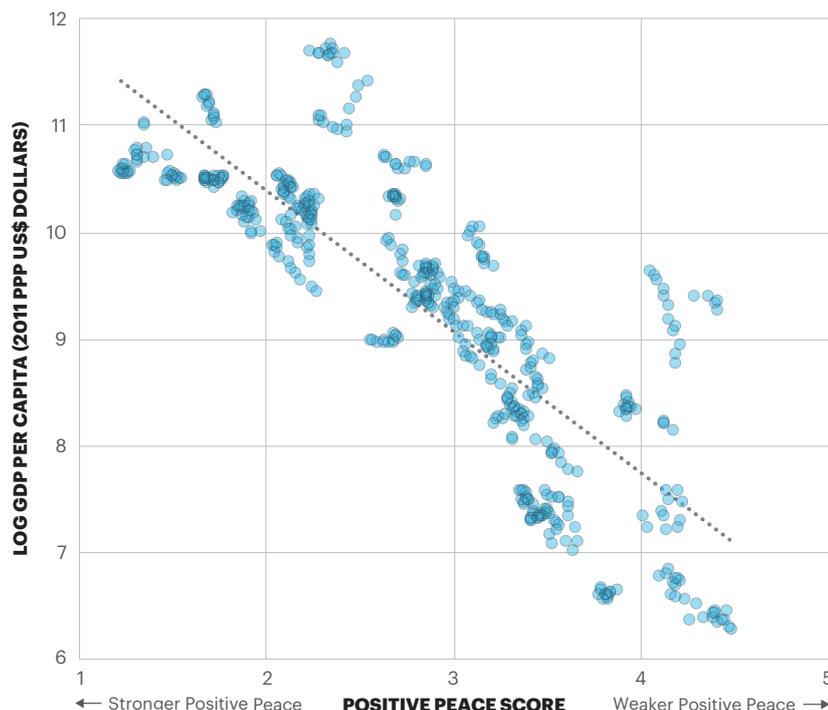
An increased propensity to spend and improvements in critical institutions are important factors for business performance and are the result of improvements in Positive Peace, which permeates the economy. Further evidence of the link between Positive Peace and the business environment can be seen in a number of economic outcomes, such as wealth creation, credit ratings and strengthening of the domestic currency. Such relationships are explored in this section.

The primary measure of the strength of an economy is GDP per capita. Figure 3.1 illustrates that for every 1 per cent improvement in Positive Peace corresponds with 2.9 per cent

FIGURE 3.1

Positive peace vs GDP per capita (2011 PPP dollars), 2005-2016

Every one per cent improvement in Positive Peace is associated with 2.9 per cent growth in real GDP per capita.



Source: WDI, IEP

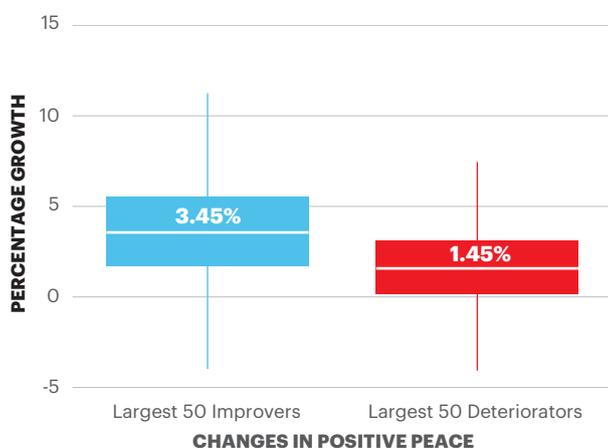
growth in real GDP per capita. Further, Figure 3.2 shows that countries that improved in Positive Peace between 2005 and 2017 had on average 2 per cent higher per capita GDP growth rate than those that deteriorated. These results remain robust to changes in the time period and set of countries analysed.

While historical data is useful to use to demonstrate the link between Positive Peace and GDP growth, it is also interesting to take future growth estimates and compare them to changes in Positive Peace. Based on International Monetary Fund (IMF) projections, 27 of the 34 countries where expected annual real

GDP growth is higher than five per cent in 2018 have shown improvements in Positive Peace in the past decade. Further, 16 of these countries are among the third least peaceful countries in the world.²⁴ Less peaceful countries also have highly unsaturated markets and thus still have high scope for economic expansion. Growth forecasts for these countries are, on average, one per cent higher compared to more peaceful advanced economies. In the context of economic slowdown in emerging markets like Brazil, Russia and China, developing countries like Ethiopia, Cote d'Ivoire, Rwanda and Bhutan are potential attractors of investors seeking higher returns.

FIGURE 3.2
Positive Peace and growth in GDP per capita 2005-2017

Countries that improved in Positive Peace since 2005 have experienced larger GDP per capita growth than countries that have deteriorated.



Source: World Bank, IEP

Stability in Response to Shocks

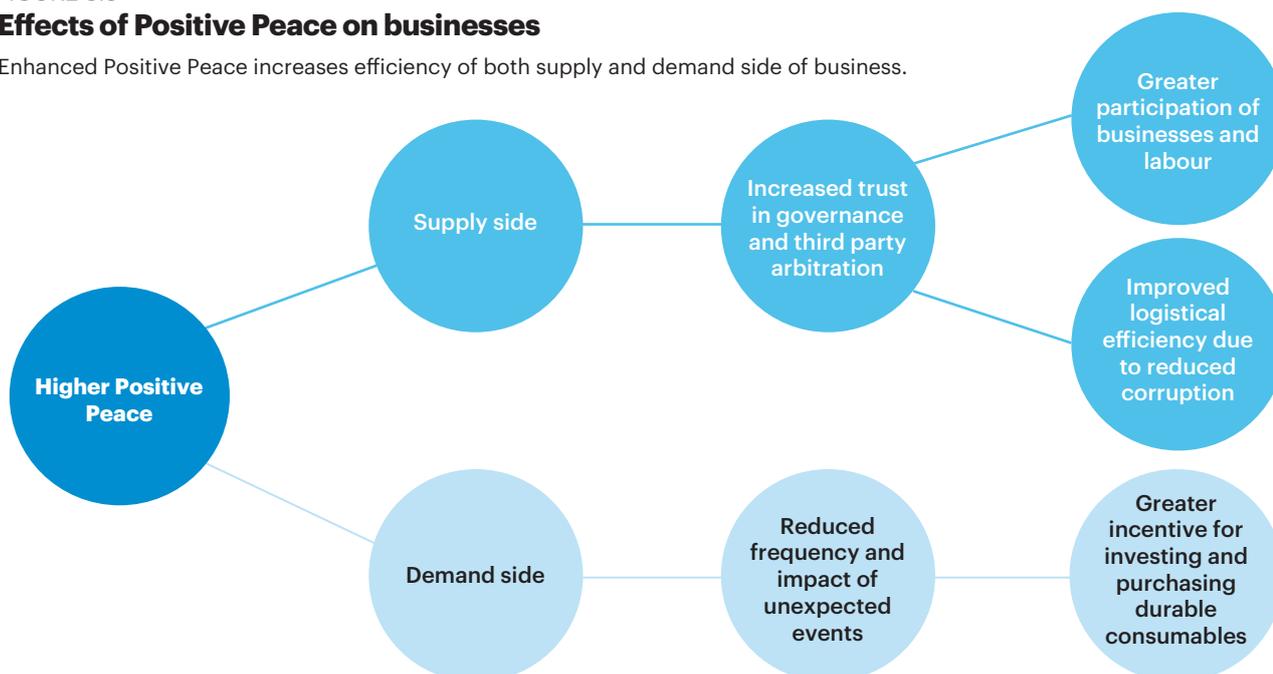
Shocks can have a disastrous effect on businesses. The term ‘shock’ is used to describe a sudden change in some aspect of a system. At a national level, shocks are sudden onset events that have potential to “cause fatalities, injuries, property damage, infrastructure damage, and agricultural loss, damage to the environment, interruption of business, or other types of harm or loss.”²⁵ Shocks can be catastrophic events that directly cause loss of life and/or events that trigger the outbreak of violence.

Shocks are commonly categorised as being either exogenous or endogenous. Broadly speaking, exogenous shocks occur externally, from the global system, while endogenous shocks from internal dynamics. IEP research shows that countries with higher levels of Positive Peace are more resilient to shocks in two regards:²⁶

- **Higher levels of Positive Peace reduce the frequency and severity of endogenous shocks, such as civil resistance movements, political instability and violence.**
- **Higher levels of Positive Peace allow countries to absorb and recover from exogenous shocks much more effectively.**

FIGURE 3.3
Effects of Positive Peace on businesses

Enhanced Positive Peace increases efficiency of both supply and demand side of business.

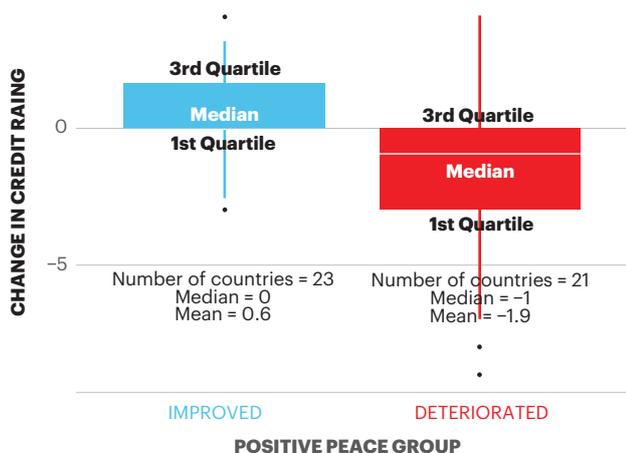


Source: IEP

FIGURE 3.4

Change in credit rating by Positive Peace group, 2005 to 2016

The majority of countries that deteriorated in Positive Peace also experienced a fall in their credit rating.



Source: S&P Global Ratings, IEP

Thus, enhanced Positive Peace reduces both the probability and impact of uncertain events that may restrict businesses and consumers from spending or investing. This boosts spending by both consumers and businesses. How increased Positive Peace effects both supply and demand through such mechanisms is depicted Figure 3.3.

Credit rating and business constraints

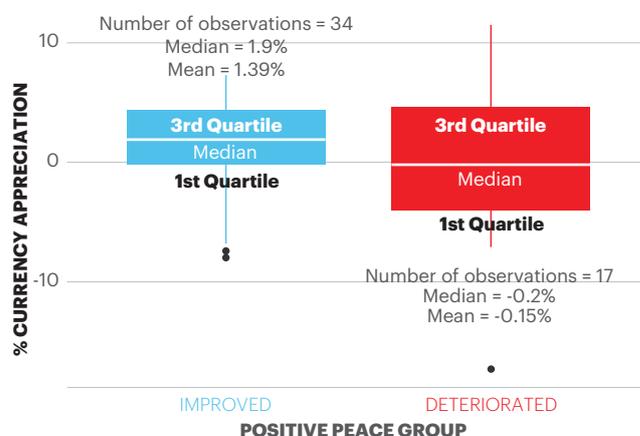
Sovereign credit ratings underscore the ability of a country to mobilise fiscal resources and meet its financial commitments. Countries that improve in Positive Peace either improve their credit rating or maintain an already high grade (figure 3.4). Standard and Poor's (S&P) country credit ratings were used for this analysis. Sovereign ratings by S&P reflect analysis of institutional and governance effectiveness, economic structure and growth prospects, external finances, and fiscal and monetary flexibility.²⁷ These ratings classify countries in 23 levels of performance in terms of the capacity and willingness of a country to meet its financial commitments. Standard ratings are expressed in alphabetical categories. For the purpose of the analysis, IEP assigned numeric scores to S&P's ratings, from 'zero' for the lowest score of 'D' to 22 for the best rating 'AAA.' Changes in credit rating scores for each country were examined between 2010 and 2017 vis-à-vis their improvement or deterioration in Positive Peace between 2010 and 2016.

Figure 3.4 highlights the changes in credit ratings for all improvements and deteriorations in Positive Peace. Out of the 80 countries for which credit rating scores were available, 23 improved on Positive Peace and 21 deteriorated, while 36 remained stable. Interestingly, of the 23 countries that improved in Positive Peace between 2010 and 2016, ten of them improved in credit rating, nine remained at the same level and only four were downgraded. Thus it can be said that 75 percent of countries that improved in Positive Peace either retained or improved their credit rating. For the 21 countries that deteriorated in Positive Peace, 14 of them were downgraded in credit rating, five remained at the same level and only two were

FIGURE 3.5

Year-on-year change in real effective exchange rates by Positive Peace group, non-OECD countries, 2005–2016

Countries that improved in Positive Peace experienced higher rates of appreciation in the real value of their currency.



Source: WDI, IEP calculations

upgraded. However, countries that deteriorated tended to be downgraded by around two credit rating levels on average.

Exchange rates and Positive Peace

Real Effective Exchange Rate (REER) is an index generally used to indicate the real value of domestic currency vis-à-vis a bunch of relevant foreign currencies at once. REER is expressed as a weighted average of the exchange rates of the domestic currency with a basket of major foreign currencies, adjusted for the effects of inflation. The weights are determined on the basis of a relative measure of the volume of trade with major trading partners.

A rising REER indicates a strengthening domestic currency, as well as strong economic foundations in money supply, prices, outputs, and interest rates. The European Central Bank has found a strong connection between the strengthening of a domestic currency and current and future improvements in the economic fundamentals of the country.²⁸

A country improving in Positive Peace is therefore a signal that foreign businesses should start looking at exporting, outsourcing and investing in opportunities in these countries. These activities will lead to increased demand for the domestic currency, causing it to appreciate.

IEP's analysis finds that, on average, for every one per cent increase in Positive Peace there is a 0.9 per cent strengthening of the domestic currency. Improvement in Positive Peace is associated with an average appreciation of the domestic currency by 1.4 per cent per annum, while deterioration in Positive Peace is associated with an average depreciation in domestic currency by 0.4 per cent. Figure 3.5 illustrates that 75 per cent of countries that improved in Positive Peace also appreciated in REER. For the countries that deteriorated in Positive Peace, 50 per cent of the countries depreciated in REER. These results were obtained after excluding observations where year on year appreciation or depreciation exceeded 50 per cent, which happened in two countries, that is, Venezuela and the Democratic Republic of Congo.

End Notes

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Our research analyses peace and its economic value.



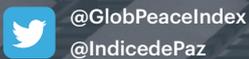
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