

Purpose+Profit



Purpose+Profit

How Organisations Will Shape
the Defining Challenges of Our Time

Rens ter Weijde



© 2017 Rens ter Weijde

ISBN:

Hardback: 978-94-92004-57-4

Paperback: 978-94-92004-58-1

E-book (Epub): 978-94-92004-59-8

E-book (Kindle): 978-94-92004-60-4

Editors: Jim Dempsey, Amsterdam; Hannah Jansen, Amsterdam

Lay-out and cover design: Pankra / Robert-Jan van Noort, The Hague

Photo author: xllens photography / Rubianca Simmelsgaard, Hoofddorp

This edition published by Warden Press, Amsterdam

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording or otherwise without the prior written permission of the publisher.

Contents

Introduction

- i. Why read this book? 6
- ii. How to read this book 6

1. The Defining Challenges of Our Time

- 1.1. A note on cognition 11
- 1.2. Economics 15
 - 1.2.1. Advanced economies 18
 - 1.2.2. Emerging economies 30
- 1.3. Geopolitics 45
- 1.4. Demographics 63
- 1.5. Technology 82
- 1.6. Environment 99

2. The Role of Organisations

- 2.1. A note on organisations 123
- 2.2. Organisational dilemmas today 125
- 2.3. Why organisations are the ideal players 142
 - 2.3.1. Combining power and agility 143
 - 2.3.2. Competitive advantage 146

3. Shaping the 21st Century

- 3.1. Central ideology 157
- 3.2. Barriers to change 168
- 3.3. Critical ingredients 173
 - 3.3.1. Proper commitment 173
 - 3.3.2. Purpose statement 175
 - 3.3.3. Radical vision 176
 - 3.3.4. Purpose+profit metrics 178
 - 3.3.5. Behavioural alignment 179
 - 3.3.6. Explicit dilemmas 182
 - 3.3.7. Purpose-driven innovation 183
 - 3.3.8. Purpose-driven leadership 184
- 3.4. A note on public vs private firms 185
- 3.5. The world in 2050, a closing thought 186

Afterword and thanks 187

About the author 189

Notes 190

Introduction

I. Why read this book?

This book is an inspirational how-to guide for organisations and entrepreneurs to prepare for the next decades. This book has three central premises:

- Our 21st-century macro environment will present us with collective, humanity-defining challenges
- Organisations are the ideal players to deal effectively with these challenges
- Organisations that succeed in tackling these challenges will be the new successful enterprises of this century

What will you get out of this book? Whether you are setting up a business, or you are leading an existing enterprise, this book will give you a detailed overview of the current trends in our world today, both from the perspective of the wider world and from the perspective of organisational leaders. It highlights a wider trend towards a purpose-driven paradigm where firms will aim to make a positive impact on multiple stakeholders and align themselves with larger goals in society. Building on these insights, this book provides you with pragmatic tools to successfully build organisations for this new world.

II. How to read this book

Successful transformations, whether they're personal or organisational, start with a good understanding of the beginning and end of the journey. The transformation then aims to bridge the difference between the two states. This book will follow the same logic: it starts by defining the starting point for today's world and today's organisations. It then describes the ideal organisations of the future. In our last chapter, we'll describe the pragmatic transformation approach that can be used to kick-start the needed change.

In this book, the idea of being purpose-driven, or using purpose+profit thinking, will be central. The definition of purpose-driven is:

Introduction

purpose+profit companies work with the ambition to positively impact a wider set of stakeholders through their strategy and daily operations, in addition to benefiting their shareholders

This means that purpose-driven firms combine profit goals with impact goals for their stakeholders. This set of stakeholders will be company-specific as it depends on the region the company operates in, the particular industry and the potential impact it can have. As we'll see later in the book, companies often set these goals by aligning themselves with the major challenges on earth, for example, those defined in the United Nations' Sustainable Development Goals. Note: the phrase '*through their strategy and daily operations*' is important as this notion is different from the idea of philanthropy. Being purpose-driven entails the strategic choices to do good *while* making money.

The first chapters provide a thorough overview of the starting point of our journey and discuss our first premise. We'll explore the world today by looking through five 'lenses of reality'. For each lens, we'll look specifically at what's going on at the moment and what we can reasonably expect in the coming decades. The lenses we'll be looking through to understand the world today are:

- economics
- geopolitics
- demographics
- technology
- environment

The second part looks at what's changing inside organisations today. It shows that organisations are reflections of society's belief systems, and changes in the wider world (outside-in forces) lead to changes in organisations (inside-out forces). This part of the book explores our second premise and highlights why for-profit organisations – not individuals, governments, or non-profit organisations – are the critical players to deal effectively with the defining challenges of our time. The chapter will also explain why it is in their own interest to do so, and will showcase organisations that have done so particularly well.

Purpose+Profit

The third and final part deals with the transformation approach. It explains in detail *how* companies can create more value while dealing effectively with the defining challenges of our time. The idea of combining purpose and profit in corporate strategy is at the heart of this book, and this section will present you with pragmatic, tried-and-tested transformation tools to realise just that. Included are all the frameworks we generally use with clients.

Two reading tips before you get started. First, important factors to remember in these trends are highlighted as a **tectonic shift**. Tectonic shifts, in this case, are big changes in existing patterns that will have a profound impact on the world we live in. Second, the book contains a good deal of data and references to visuals. These are important for three reasons: i) they provide *specificity* about the nature of the relevant changes; ii) they make the story as objective as possible, allowing you to interpret the data for yourself; and iii) the data and visuals simplify the story since a picture is worth a thousand words. If you're like most readers, you may well check the graphs first and then read the corresponding text.

Note that some sections might require some additional research if you're not familiar with the specific subject area. Where this might be the case, references for more information are provided. It is important that you do your own research and data analysis to get a good grasp of the trends discussed here. The data behind each graph, as well as all the visuals, are available on the purpose+ website¹. Additional data on the topics are also offered through our Global Progress Dashboard².

Regardless of the complexity of the subjects presented, the analysis of current global trends and a closer look at what the next decades will bring will be worth your while. It will enrich your understanding of our world and organisations as well as make you a better leader who is (even) better equipped to shape the ideal organisations of the future.

I sincerely hope you will find this book valuable. May it be an inspiration to you to manage existing organisations or design new ones.

Yours sincerely,
Rens ter Weijde



CHAPTER 1

The Defining Challenges of Our Time

Perspective is worth 80 IQ points.

- Jeff Bezos, CEO, Amazon

Through the following five lenses of economics, geopolitics, demographics, technology and environment, I hope to give you a better understanding of what's going on in sufficient detail. I aim to create what astronauts describe as the 'overview effect': the shift in awareness during spaceflight when an astronaut looks back at Earth from space³. This shift in awareness can be so powerful that it can change a person's personality. Astronauts have described Earth as a 'fragile oasis', 'hanging in the void', and often realise their entire identity is linked to the planet. Since I don't have the power to lift you into space, I will try to give you a glimpse of this effect.

The central hypothesis of this section is that *the 21st century will present us with collective, humanity-defining challenges*. With this hypothesis at the back of your mind, I hope you'll find these topics as captivating as I do.

1.1 A note on cognition

Before we dive into the world around us, I'd like to explain three psychological fallacies, or biases, that can play a role when studying the world around us. These cognitive shortcomings explain why we sometimes *fail* to read the writing on the wall, although the writing itself can be obvious in hindsight. Making predictions about the future is hard work, and people mostly get it wrong. Many of the great revolutions of the past came as a surprise to outside observers, not least for the revolutionaries themselves. Transformative moments in history, like the French Revolution of 1789⁴, Iran's Islamic Revolution of 1978-1979, and the Russian Revolution of 1917 all stunned their expert observers⁵ and were not anticipated. Even Lenin believed he would not see the change in Russia in his lifetime, even though he was the one who lit the fire. Paul Gascoigne, a British footballer, clarified his antipathy against (the complexity of) predictions well when he stated that "I never make predictions and I never will."

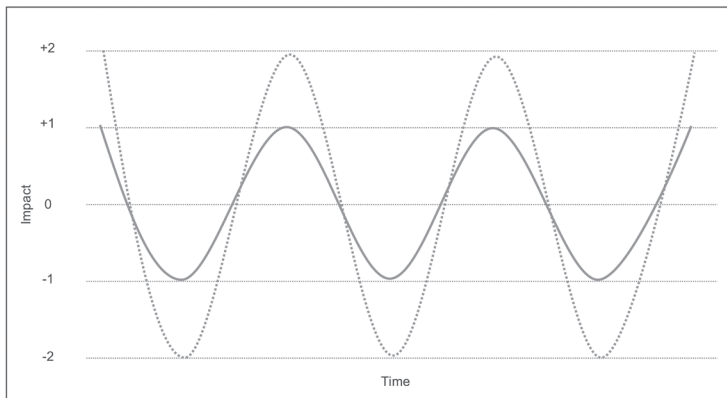
Our minds can be baffled by the complexity of understanding all aspects of reality; our minds, therefore, take shortcuts to the 'truth'⁶. These shortcuts are effective, but can sometimes distort our perception of reality, in which case we call them biases. The cognitive biases relevant for this book include (but are not limited to) our *failure to understand interdependence*, the *assumption of linearity*, and *hyperbolic time discounting*. I hope that by pointing these

Purpose+Profit

biases out to you beforehand, you may be a little less susceptible to them when reading the next chapter.

Let's start with the first bias, which is *the failure to understand interdependence*. This says that most trends cannot be understood in isolation as they continuously affect one another and may weaken or strengthen each other in that process. This interdependency effect, popularised in physics as the 'butterfly effect', states that a small change in an unstable subsystem can sometimes lead to large outcomes in the wider system. A currently relevant example is the economic trend of *rising levels of inequality* in many societies. Looking at the inequality numbers themselves does not tell the full story, but if you start relating this trend to other trends, you can start to connect the dots and begin to see the relevance. For example, rising inequality in society coincides with an increase in social problems and political tensions⁷. This, in turn, affects the leadership style politicians exhibit to help them get elected and may influence demographic changes (people moving to areas with better opportunities) and environmental changes (less attention to environmental impact, 'own economy first' thinking), among other changes. Consider, for example, the graph below. To help you grasp the complexity, it can help to think of two waves (see *visual 1*). If two trends go in the same direction, their waves 'amplify'. If not, their waves can cancel each other out. Another way of saying this is that trends can exhibit a positive feedback loop (strengthening each other) or negative feedback loop (weakening each other).

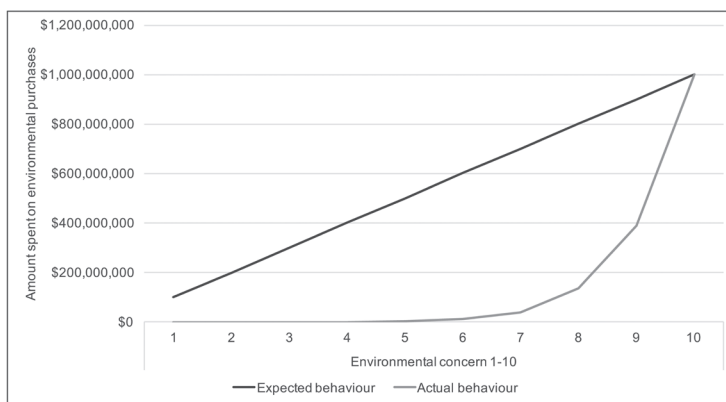
Visual 1: Two waves make a bigger wave



The Defining Challenges of Our Time

A second psychological bias when reading the trends is the *implicit assumption of linearity*. Al Bartlett, a physicist, has called this inability to understand exponential functions ‘the greatest shortcoming of the human race’. Most people are intuitively comfortable with linear graphs (and most corporate profit projections we’ve seen show a linear trend upwards). This book, however, shows that few relationships between variables will be exactly linear. A famous example of a nonlinear trend, well known to social psychologists, is the general progression of behavioural change (*visual 2*). As a rule, people tend to resist change for a long time until the pressures become too great and the change simply *has* to materialise. Note that the example illustrated here is fictional and not based on any data. As you can see in the visual, the amount of environmental concern people have is not directly predictive of their actual environmental purchases as long as it’s in the 1-7 category. Having a little concern is simply not relevant enough to justify changes in consumption behaviour for most people. However, this behavioural change can occur rapidly when concern ratings are 8 or higher. This form of progression, known as exponential growth, is characterised by very slow ‘under the radar’ growth at first, followed by increasingly rapid growth in the later stages. This kind of growth leads to tipping points⁸ or critical mass effects⁹, and it is also the kind of trend that many business leaders fear when they discuss ‘disruptive innovation’¹⁰, e.g. through platform or technology businesses.

Visual 2: Expecting linearity where there is none

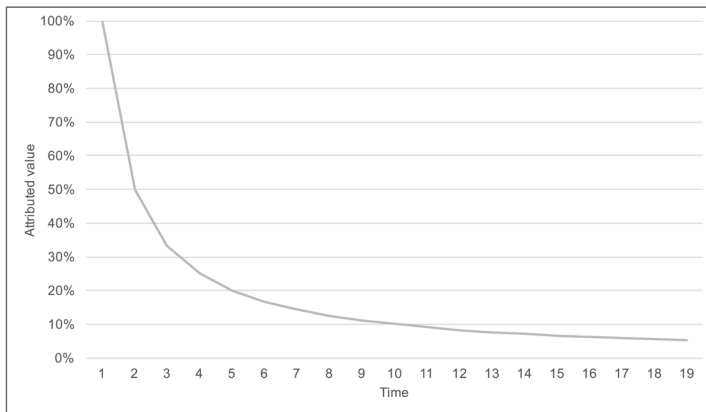


Source: HBR, *Linear Thinking in a Nonlinear World*, 2017; *Critical Mass: How One Thing Leads to Another*, Philip Ball (2004); *Superforecasting: The Art and Science of Prediction*, Tetlock (2016)

Purpose+Profit

A final fallacy is what behavioural economists call *hyperbolic time discounting*. This states that when people evaluate things that may happen to them, they will *discount the future compared to the past*. In most people's minds, today matters more than tomorrow. Harvard's David Laibson has shown that this trend permeates lots of our decision-making in daily life and how we calculate future risks. Time discounting is used in the fields of behavioural economics and game theory, and explains why most people plan to eat lots of vegetables *next week* (but not today), plan to start losing weight from January 1st onwards (but not now), and why many people buy gym memberships in the first quarter of every year, even though they fail to go the rest of the year. People, therefore, underestimate the future costs associated with the needed behaviour change, even when the prospect of the activity looks good in theory. Note that the bias of time discounting, combined with a misunderstanding of exponential change, can lead to *collective inaction*, even when change is obviously needed. Climate change seems to be such an example: experts in the field have been warning us about global warming and (again, nonlinear) tipping points that will be detrimental to all of us¹², but most people feel the problem is *not happening today*, and the future is simply worth less than today in most minds. This final bias is shown in visual 3.

Visual 3: Tomorrow is less important than today



Source: Inspired by David Laibson, Harvard University

1.2 Economics

The economic lens forms the start of our story about today's world. Economic trends are famous for the direct effect they can have on people (e.g. unemployment, changes in business landscapes, rising prices), as well as their indirect impact on the other lenses we will discuss, like the environment and political landscape. This chapter gives a helicopter view of the global economy and then moves into specific details for advanced economies and emerging economies. As stated in the introduction, if a trend is particularly relevant, it will be shown as a **tectonic shift**. The chapter ends with a recap of all the tectonic shifts mentioned.

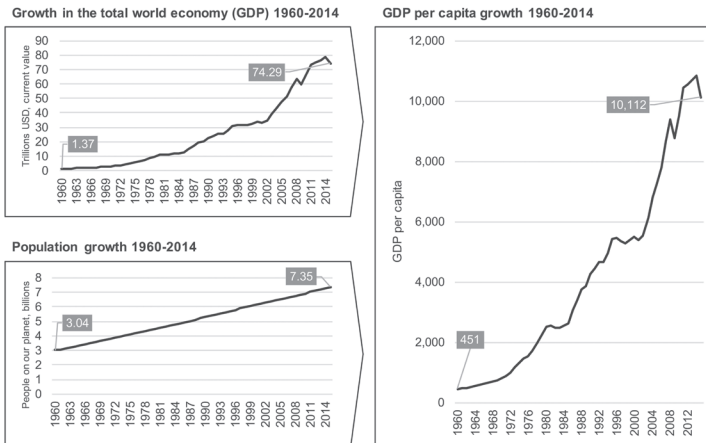
Although it makes sense to start by looking through the economic lens, some observers accuse economics of many wrongdoings. When Thomas Carlyle, a Scottish historian, famously called economics the 'dismal science' in the 19th century, he did so to highlight that 'finding the secret of the universe in supply and demand' was an impossible endeavour. The phrase of the 'dismal science' has been repeated often for other reasons, mainly because economics is simply far from the hard science we would like it to be. For example, it remains a science that wins Nobel Prizes for having opposing opinions. Other observers have questioned the assumptions of rationality in most models, as it appears people make emotional decisions most of the time¹³. As I am aware of these problems, I will try to bring you the current trends as clearly as I can, always naming the data source and highlighting different points of view where they exist.

Let's start with some general numbers on our global economy. The size of the world economy was estimated to be around US\$74.3 trillion¹⁴ in 2015, up from around US\$1.4 trillion in 1960. This 'economic miracle', where the world economy grew 50 times its size in just 55 years, is unprecedented in human history. The spectacular increase in GDP coincided with lots of other changes, notably the number of people living on our planet, which increased from 3 billion in 1960 to around 7.5 billion today¹⁵. This growth in population is relevant as it can dilute the benefits gained per person since they have to be shared among a wider community. Looking at GDP per capita, however, there is still a similarly spectacular pattern in line with overall GDP: the average GDP per world citizen was approximately US\$451 in 1960, but is over US\$10,000 today – a stunning increase by 22 times in

Purpose+Profit

half a century. Note that this 22 times increase is based on averages, where GDP per capita is simply the total GDP divided by the midyear headcount, which does not take into account the inequality that exists in our world today (more on this later). However, GDP per capita growth could be considered to be the real miracle as the economy as a whole escaped the *Malthusian trap*. Named after Thomas Malthus, a British scholar and economist, who predicted that population growth would inevitably¹⁶ result from economic prosperity, which would, in turn, keep people poor indefinitely as people would continue to run out of land, food, and resources. Malthus, however, was wrong. Where the economy in the pre-growth phase was indeed a brutal zero-sum game, and just over a century ago in 1910 more than 80% of the global population lived in poverty¹⁷, by 2015, that number was less than 10%. Malthus clearly underestimated human ingenuity and miscalculated the efficiency increases (e.g. higher farm yield) that would coincide with economic growth. The result today is a very different picture than Malthus envisioned, of a world that is richer than ever before. Some experts estimate that poverty will officially be history in 10-20 years, although this will depend on coherent economic policy between nations and is not a given. These trends can be explored in *visual 4*.

Visual 4: Breaking out of the Malthusian trap

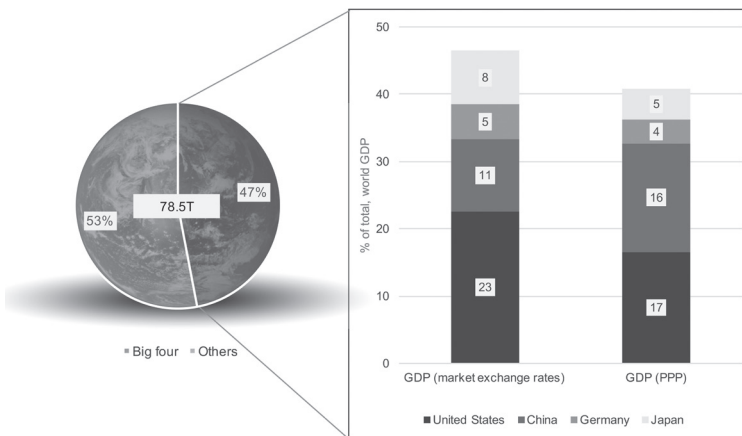


Note: value calculated in current dollars
Source: World Bank

The Defining Challenges of Our Time

Although some economists believe that a ‘rising tide lifts all boats’ (a phrase famously used by John F. Kennedy on multiple occasions), data show that, although there is some truth in the notion, the reality is that some boats seem simply more buoyant than others. The 20th century’s miracle growth has seen clear winners, and there seems to be a strategic first mover’s advantage at play in the world at large. As an example, the top four economies – the United States, China, Japan and Germany – together generate 47% of global GDP (shown in visual 5). Being born in one of these countries presents a person with opportunities that are unlikely to materialise in poorer countries as the quality of institutions and educational systems correlate with the strength of the economy. Although these countries could see their hegemony challenged in the future (e.g. through the rise of India, which currently accounts for just 3% of the world economy), it appears they are safely locked in place for the century to come. Their position is strengthened by the fact that these countries have extensive foreign investments (a ‘diversified portfolio’, as it were) and trade relations with other countries, and will, therefore, benefit from any growth in different regions as well. In short, although the economic growth in the 20th century has been impressive, the wealth is strongly clustered on our planet, and it pays to be in the right spot.

Visual 5: The big four rule (half) the world



Note that graph does not show the EU, if it would the EU would show roughly same size as the US economy
Source: World Bank, IMF

How about the future of our world economy? Contrary to some doom scenarios, it is unlikely that we will run off a cliff anytime soon. The future of our world economy is, according to the World Bank, expected to be a relatively rosy one²⁰ – assuming no big surprises occur. The expected growth rate for the world economy in 2017 is 2.7%, and for the years ahead (2018 and 2019) it is even higher, closer to 3%. For the long-term (2050), although less reliable, similar growth rates between 2% and 5% are projected²¹. Although this may seem like a relatively small increase and far from the miracle growth we saw in the 20th century, this growth rate is, in fact, more positive than it sounds. As a reference point: the world economy saw an average growth rate of 3.5% between 1961 and 2016, and the US economy grew 3.1%²². Obviously, relative growth becomes progressively harder once an economy is already large²³, but the absolute amount of production increase per year will still increase significantly. At the current global growth rate, the world economy is expected to more than double in size by 2050²⁴.

This growth will not be equally high in all countries though. Much of this growth will come from emerging and developing economies (EMDEs) with an average expected growth rate of 4.5% annually. Advanced economies, like the US and the Eurozone, are expected to grow much slower, at roughly 1.8% annually. This **re-balancing of our global growth engine** is our first tectonic shift as it will create new economic powerhouses in time. Today, emerging economies collectively make up only a third of the world economy, in 2025 this will have grown to half. *Visual 6* shows the difference in projected economic growth rates between advanced economies and EMDEs in the short term and explains the fundamental re-balancing of the world's economic engine. In the long term, this change in growth rates will change the world dramatically, however. By 2050, Chinese GDP per capita will rival that of Sweden today, India will resemble Taiwan today, and Russians will on average be as rich as a person living in today's Switzerland. This re-balancing will shift the economic centre of gravity to the east. Let's take a look at each of these economic growth zones for a deeper understanding of what's going on.

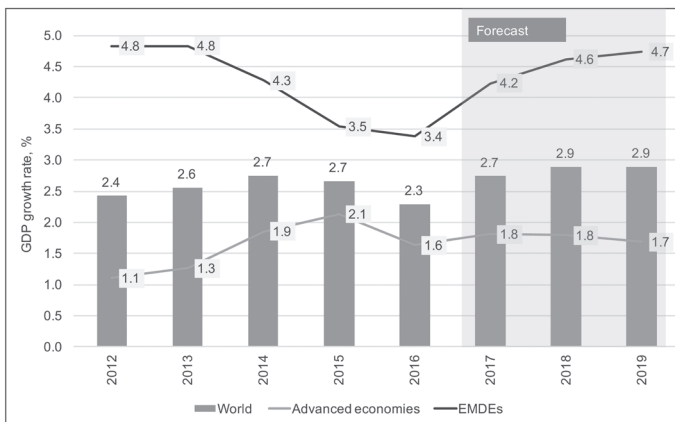
1.2.1 Advanced economies

The 1.8% growth rate for the advanced economies is a significant slowdown compared to growth in recent history, and this slowdown has been

The Defining Challenges of Our Time

the focus of many politicians²⁵ and economists' attention²⁶. Although the doom scenarios predicted by some politicians²⁷, like the 'American carnage' warnings in Donald Trump's election speech, are overdramatized and unlikely to materialise in the short term, it is indeed likely that our advanced economies will face some headwinds in the coming years that will counter further growth. In particular, there are worries that our current capitalist system in advanced economies will struggle with four main trends: i) the puzzle of proper distribution of wealth (inequality); ii) 'isolationist' forces; iii) declining productivity growth, and iv) the increasing emotional disconnect between value creation and investment. These trends combined provide a serious economic puzzle for our advanced economies.

Visual 6: The global economic engine is re-balancing



Source: World Bank Global Economic Prospects (January 2017)

Former US president Barack Obama called the rising inequality a 'defining challenge of our time'. Obama was not alone in this. Pew Research Centre found that 60% of the global population considers the gap between rich and poor a major challenge to overcome²⁸. The *New York Times* bestseller *Capital in the 21st Century* (Piketty, 2013) recently brought the topic into the spotlight. The book describes a central thesis ' $R > G$ ', where the average return on capital (R) is greater than the average growth (G) of the economy. This law, if true, is a main driver for the concentration of wealth in our societies. It further highlights that **levels of inequality are rising** in our societies, which is our second tectonic shift, as these levels are roughly similar today

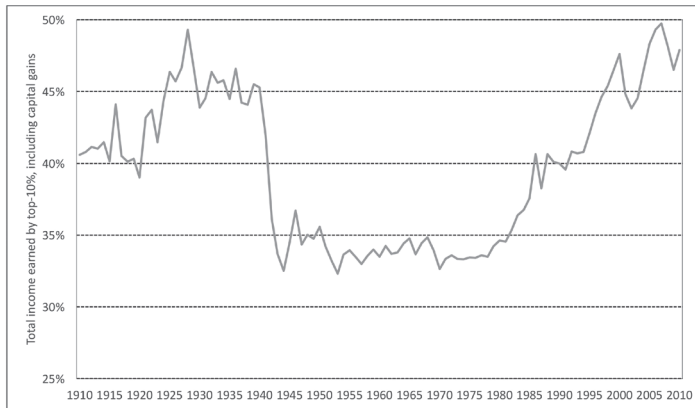
to pre-World War II levels. You might have already noticed that Piketty's statements are in essence a direct attack on the American 'capitalist' belief in social mobility. Social mobility, the ability to improve your standard of living if you work hard and give life all you've got, is the central promise of American society. It is, therefore, no wonder that media announcing the 'death of the American dream' have appeared so frequently in the last few years, with catchy titles like *Looking for the American Dream? Try Denmark*²⁹. Although the American story has worked brilliantly in some ways, the notion of the American Dream is inherently a belief system, not a reality. Belief systems always contain the risk that people stop believing. What tends to follow is a philosophical vacuum that needs a renewed storyline. The section on geopolitics explores this further.

Media headlines aside, inequality in societies and its consequences are not easy to quantify. A relatively easy concept to grasp is the total income in society earned by the richest 10%. The graph below shows these numbers for the US, where the top 10% earn close to 50% of the income today, leaving the other 90% to divide the other 50%. This is shown in *visual 7*. Another, arguably more subjective, way is to check if people feel that the system is fair to them. Ipsos, a global market research firm, tested this notion in a survey of over 17,000 adults. When asked whether they agreed with the statement 'the economy of my country is rigged to advantage the rich and powerful', a global average of 76% agreed. Some countries had much higher levels, like Mexico (94%), Spain (85%) and Italy (84%). In all countries surveyed, the majority agreed. That makes inequality one of the truly global trends.

It is well known to historians and economists that high levels of inequality in societies correspond to other social problems, such as lower literacy, higher child mortality, more murders, higher substance abuse, lower social mobility, teenage pregnancies and lower levels of reported well-being. Historically, inequality has played a large role in revolutions like the 1789 French Revolution and the 1917 Russian Marxist revolution. The essence is a harsh one: if wealth is generated at a higher rate than our economy can provide higher salaries to workers, the concentration of wealth will increase over time. Or, in simpler terms: if you're born poor, you're likely to stay poor. If you want to get rich, you could try marrying a rich person.

The Defining Challenges of Our Time

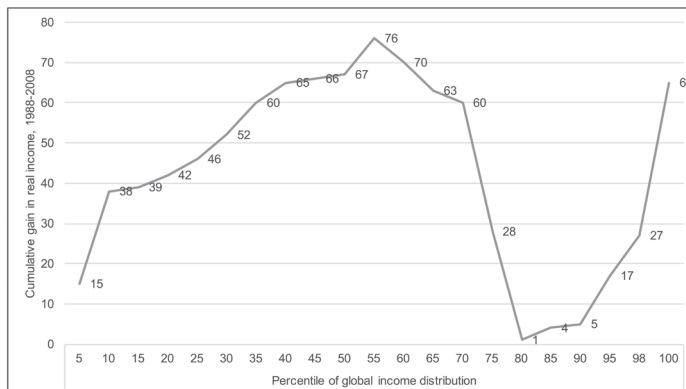
Visual 7: Inequality is back to pre-WWII levels



Source: Piketty (Capital in the Twenty-First Century, 2013)

Since Piketty, additional research and events have only backed the warnings, and the most famous example is Branko Milanovic's 'elephant graph' (visual 8). This shows the progression in real income gain over time for people in the US, with groups of people on the x-axis based on their income. The graph highlights that most groups have seen real income growth between 1998 and 2008, but others, notably the 80th-85th percentile, have seen close to nothing (this is where the trunk hits the ground). This percentile largely consists of low earners in advanced economies, and many have concluded that they are the 'forgotten' factory workers.

Visual 8: Income has grown in the last decade, but not for all

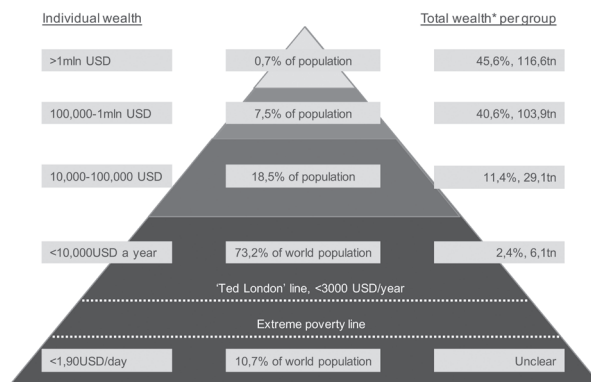


Source: Branko Milanovic, Christoph Lakner, Global Inequality: A New Approach for the Age of Globalisation (2016)

Purpose+Profit

The unequal spread of wealth is even more striking when we look at the global distribution of wealth. The famous ‘wealth pyramid’, published annually by Credit Suisse and others, has recently been rebranded as the global ‘wealth pushpin’ on social media – as the pyramid shape looks more like a pushpin, carrying the weight on the top. It shows that the wealth of our planet is highly concentrated: in 2016 just 0.7% of the population held 45.6% of global wealth, and 73.2% of the population held just 2.4% of global wealth (resulting in a very sharp tip of the pushpin). The wealth pushpin is shown in *visual 9*. With a picture as stark as the wealth pushpin, it is no wonder that globally, the vast majority of people agree with the statement that ‘the economy is rigged to advantage the rich and powerful’ (*visual 10*).

Visual 9: The top the pyramid carries the financial weight



* Estimated wealth range per individual based on total global wealth of 265tn in 2016

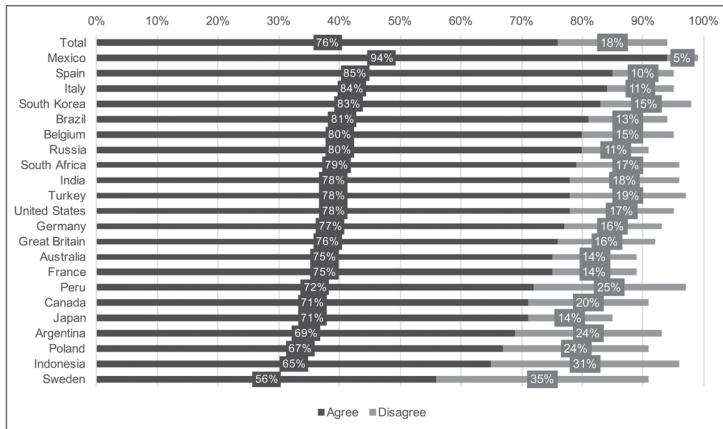
Source: Financial Times Lexicon, Wikipedia, The Economist, Statista, Credit Suisse (global wealth pyramid, 2016 data).

To summarise on inequality, the economic (and social) headwinds caused by high levels of inequality can have multiple negative effects on society, including lower than expected economic growth³⁰. History has shown that inequality can also destabilise societies. As discontent about inequality soars, it can be expressed through peaceful protests, such as the Occupy movement ('We are the 99%'), but it can also translate into more extreme electoral results or even violent movements that aim to take power into their own hands. Some advanced economies, such as the US, risk damaging their central belief system, leading to a philosophical vacuum. Our societies need to find a better way to spread the wealth to keep progressing.

The Defining Challenges of Our Time

Visual 10: The world is rigged for the rich and powerful

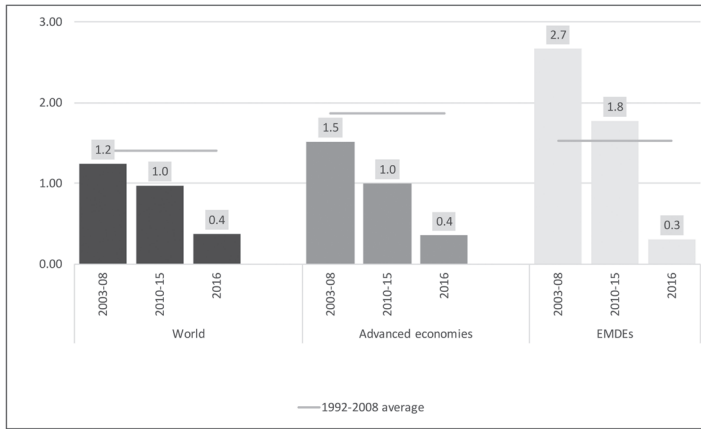
Answers to the question 'the economy of my country is rigged to advantage the rich and powerful'



Source: Ipsos Global Trends Survey (September 2016), N = 17,180

The next tectonic shift in advanced economies is the **slowing down of productivity growth**. As Paul Krugman famously noted: 'Productivity isn't everything, but in the long run it is almost everything'. Productivity³¹ in a country is defined as the number of people working in a country multiplied by the productivity per person. An example is the GDP per capita per hour, or the (simplified) added economic value per hour. The trend (*visual 11*) shows that productivity growth is slowing down in both advanced economies and EMDEs. On a per capita basis, there might well be a soft limit to how productive we can be as humans per working hour, which technological advances may stretch, but not indefinitely. In advanced economies, as well as in many EMDEs, companies have already implemented a multitude of approaches to increase efficiency (e.g. Lean, Six Sigma), as well as new ways of organising people (e.g. Agile, Holacracy). Furthermore, increased automation and computerisation have done wonders to increase our productivity. So, although our productivity measured as real GDP per hour worked, is still increasing slightly, there is a good chance that this will stabilise – or grow only in marginal amounts – in the next decades. Although the possibility that productivity growth as a whole might go up due again due to technological advances like the Internet of Things (IoT) exists, according to some thinkers, the benefits of this productivity increase will mostly be limited to the owners of the invested capital, not the workers³². We'll discuss this in more detail later.

Visual 11: Productivity growth is slowing down



Note: Productivity measured as real GDP (in constant USD) per hour worked
 Source: Robert J. Gordon (2016); World Bank; Conference Board

Combine the decline in productivity growth with the slowdown of, or even negative, population growth in many advanced economies and the fiscal debt in countries (*visual 12*), and the size of the challenge becomes visible. If productivity growth does not continue, GDP growth is likely to shrink dramatically³³ as many countries will see less GDP growth come from additional future employment. On top of this, the future workforce in some advanced economies will need to deal with both the need for further growth of the economy *and* the payment of existing fiscal debt through a workforce that is barely growing or even declining. Advanced economies that will face the highest performance hurdle in this respect are Japan, Greece, Portugal and Spain – all countries with high levels of public debt and a declining workforce. Even Germany, often considered the strong man of Europe, will likely see these challenges as its population is expected to decline by 8.2 million people, around 10% of the current population, by 2050. What is less known, is that China (not shown) will also suffer deeply from this toxic combination of declining productivity growth, ageing and fiscal debt. Driven partly by the one-child policy, China is ageing at an unprecedented rate. On average, China will be older than America in 2020, and older than Europe in 2040. Viewed from the productivity lens, this will end the period of cheap-labour manufacturing. The Chinese worry is that they'll become old before they become rich³⁴.

The Defining Challenges of Our Time

Visual 12: Smaller workforces combined with higher debt

Country	Population today	Population 2050, estimate	Public debt today, in % GDP	Public debt today, absolute, in USD
Germany	82.7 million	74.5 million (-8.2m)	85.8%	2.8 trillion
France	66.9 million	71.1 million (+4.2m)	102.0%	2.5 trillion
Japan	127 million	107.4 million (-19.6m)	261.0%	12 trillion
Greece	10.8 million	9.7 million (-1.1m)	147.1%	231 billion
United States	323.1 million	388.9 million (+65.8m)	93.6%	16 trillion
United Kingdom	65.6 million	75.4 million (+9.8m)	103.7%	2.9 trillion
The Netherlands	17 million	17.6 million (+0.6m)	79.4%	616 billion
Canada	36.3 million	44.1 million (+7.8m)	85.0%	1.7 trillion
Portugal	10.3 million	9.2 million (-1.1m)	159.3%	293 billion
Spain	45.6 million	44.8 million (-0.8m)	91.1%	1.1 trillion
Italy	60.6 million	56.5 million (-4.1m)	122.6%	2.3 trillion

Source: Economist Debt Clock, Wikipedia

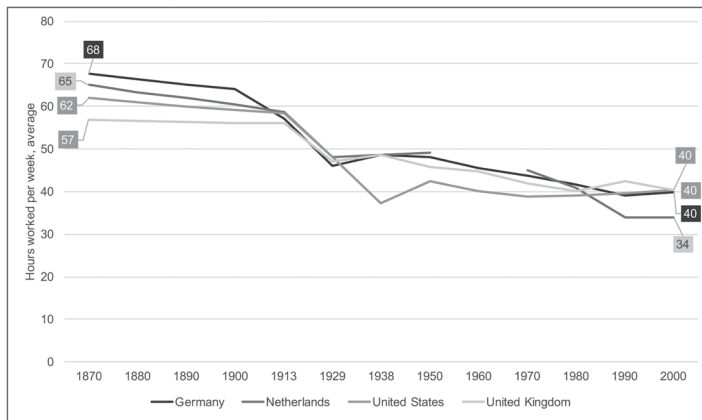
Note that this trend of declining productivity growth may have a very tangible, psychological aspect to it as everyone who has ever worked in a declining company can attest. High-growth companies, like high-growth economies, tend to be different from their low-growth counterparts in the sense that they create more opportunities for people to grow and develop. Growth rates can also fundamentally change the dynamics between people, as fear can play a larger role in declining organisations or economies. In economies forced to be more productive with fewer people, companies may also resort to machines to do the work for them and outsource work to cheap labour countries instead. We'll look at this in more detail in the chapter on technology.

Strengthening the decline in productivity growth, the next decades could change the overall perception of work for people in advanced economies. This may well, or partly, be an adaptation to the trends described above. In general, there is a trend of declining hours worked per person³⁵ (see *visual 13*), and people increasingly prefer projects and self-employment over fixed contracts with large employers. Trends like the 'gig economy' (where people work via short-term contracts or freelance work, for example, by driving a few hours for Uber or delivering food for Foodora) are on the rise. In the UK, the number of self-employed workers has risen by 28% in the last 10 years³⁶. The old notion of status seems to be different for younger generations: where a good job (and income) helped people to attain a strong social po-

Purpose+Profit

sition in the past, the younger generation seems to value 'having a purpose and free time' as symbols of status. Although these trends are understandable from Maslow's point of view and utility theory (we satisfy the most basic needs first, so the motivation to continue to work should be lower once those are satisfied), it is unlikely to help the economy grow faster. Some authors have already branded the new era the 'satisfaction economy'³⁷: a world where it is no longer about continuous growth but increasingly about satisfaction with where we are and who we are. As we'll see in our chapter on organisations, this has direct implications for how organisations engage their workforce.

Visual 13: Working fewer hours is the new norm



Source: www.ourworldindata.org

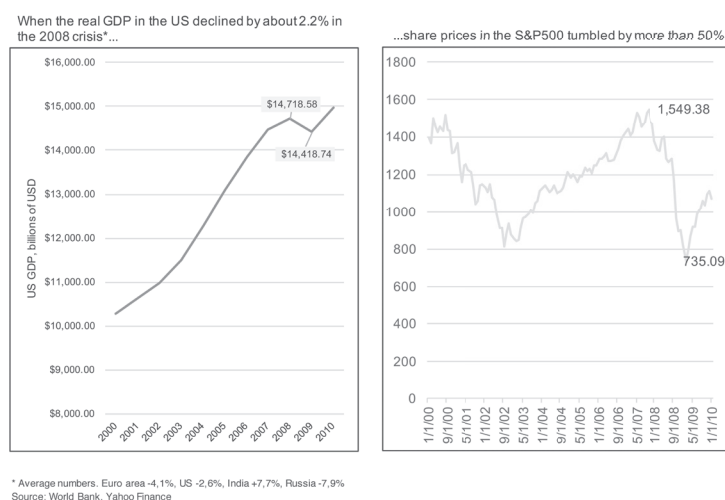
A final point on advanced economies is **the increasing disconnect between the expectations of the market and real value creation**. This is our last tectonic shift for advanced economies since it significantly affects the way our economy works by adding volatility to the system. The 2008 financial crisis provides a good example of volatility at country level. While the crisis chipped away 2.2% of the US and 4.1% of the Eurozone economies respectively³⁸, the stock markets saw a full 50% dip in share prices (S&P500) (*visual 14*).

Similar expectations hit organisations on a more frequent basis. As share prices are a function of the *total future expected value* generated by a particular firm, (in some way discounted to the present time), these values can be

The Defining Challenges of Our Time

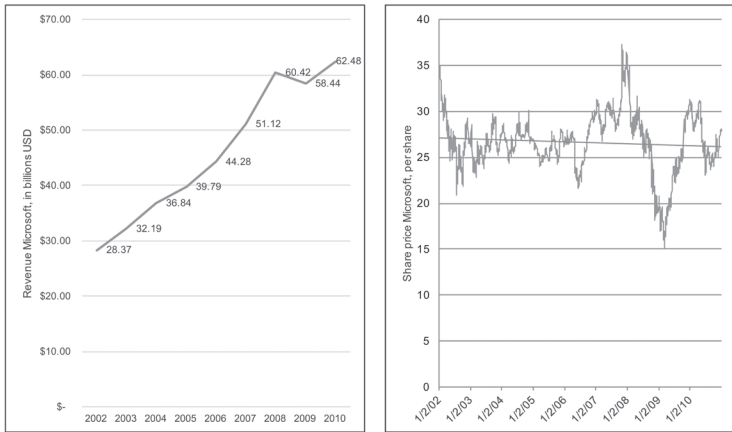
far removed from the actual performance a company shows in present time. Uber is possibly the most extreme example: valued at around US\$70 billion in private markets, the company loses hundreds of millions of dollars every quarter (US\$708 million in the first quarter of 2017), even in its home market³⁹. Amazon is another example, as, at the time of writing, the forward P/E ratio (the market price per share over the projection of net earnings in the next quarter, or the ‘multiple’ of actual projected earnings that people are willing to pay for the share) was as high as 79. The disconnect between actual value creation for a firm, and the price of its shares is shown in *visual 15*, showing the example of Microsoft. Between 2002 and 2010, Microsoft more than doubled its revenue, but its share price did not move up over the period, so speculators that played the long game had a hard time earning money on their shares. The pressure that public companies face playing the expectations game effectively is expected to have adverse effects: it promotes short-term thinking, promotes a focus on psychological value-creation games instead of actual customer value, rewards ‘hyping’ stock prices and can lead to accounting fraud in extreme cases (e.g. Enron, Toshiba). It is no wonder that Harvard professors Joseph Bower and Lynn Paine recently called out for ‘management for the long-term’⁴⁰ as Dominic Barton (Global Managing Partner of McKinsey) has repeatedly done as well⁴¹. We’ll explore this notion in more detail in our chapter on organisations.

Visual 14: Expectation markets come with increased volatility



Purpose+Profit

Visual 15: Fighting expectations is an uphill battle



Source: Fixing the Game, (Martin, 2011); Statista, Yahoo Finance

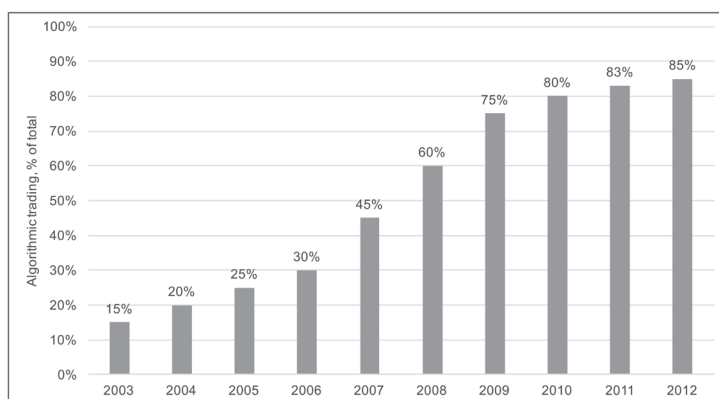
The increasing disconnect between value creation and rewards in the market compounds in algorithmic trading. In today's world, shares are bought and sold very quickly, with speed measured in microseconds (see *visual 16*). This speed can change the value of entire organisations overnight, just as the negative press can have severe consequences in a digital world. The higher speed of trading is not inherently problematic. However, there are risks in the compounded scenario of strengthening the emotional disconnect between investors and investments, mainly when the assessment of algorithms does not adequately differentiate between ethical firms and less ethical firms. Although traditional investing, where an investor knows the business he or she invests in, is long gone, we feel that leaving trading to algorithms (or Excel macros), should be well balanced with human ethical standards.

The points made above are strengthened by more and more people engaging in passive investments⁴² (*visual 17*), such as exchange-traded funds (ETFs). Passive investments track indexes, which are groups of securities that resemble one another. For example, you can buy into an index fund that tracks all the S&P500 stocks, which means that your investments will do as well as the overall market. The first index fund was set up in 1976 and was known as Bogle's Folly, highlighting both that John Bogle (founder of Vanguard) set it up and that the fund would not aim to beat the market, which many investors believed to be the goal of the game⁴³. Although these funds are a

The Defining Challenges of Our Time

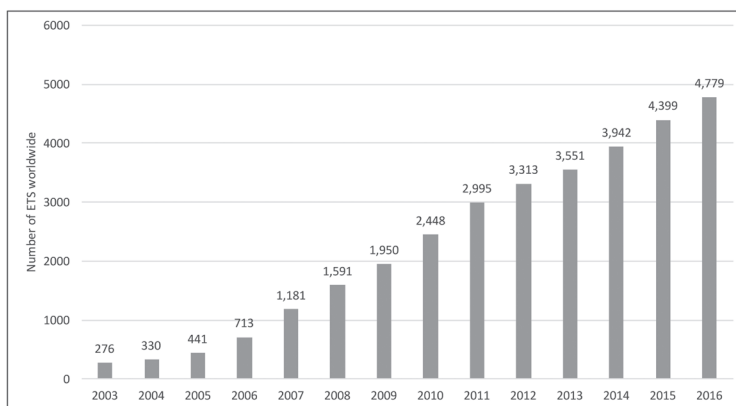
relatively safe bet for investors, it again strengthens the initial problem: investors no longer know, or care for, the companies they hold. This emotional disconnect from our investments ensures that we treat all firms as equals as long as they have similar earnings per quarter, while in reality not all money is created equally. Firms that create value while limiting societal/environmental damage should theoretically be more valuable than firms that do lots of damage in the process and earn money in dubious ways. Enlarging the disconnect between investors and investments will not reflect this, just as ethics has not been successfully programmed into algorithms yet.

Visual 16: Algorithms do most of the trading today



Source: Investopedia, Wikipedia

Visual 17: Passive trading is increasingly popular

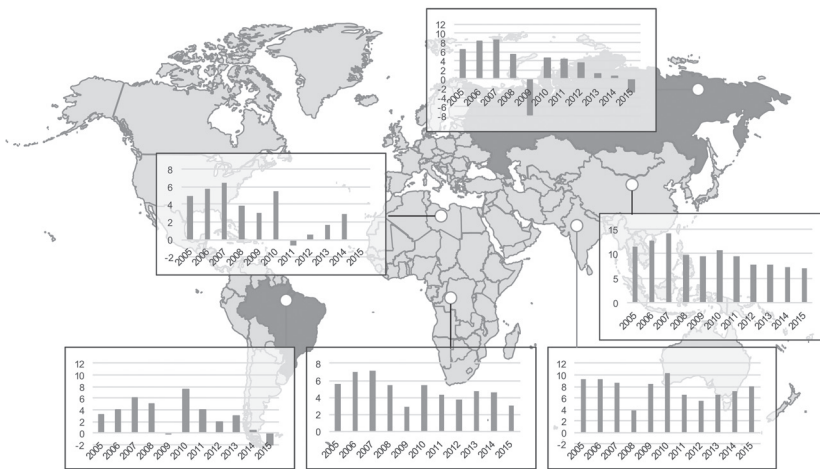


Source: Statista, Deutsche Bank, Bloomberg, Thomson Reuters

1.2.2 Emerging economies

As discussed in the previous chapter, the real growth engine for the future will be the emerging and developing economies, EMDEs, which are expected to grow collectively at an average rate of around 4.5%. More specifically, high expectations exist for India, China, Africa and Southeast Asia (known collectively as ICASA). The former high riser, BRICS (Brazil, Russia, India, China, South Africa), seems to have fallen apart due to faltering growth in both Russia and Brazil (*visual 18*).

Visual 18: ICASA is replacing BRICS



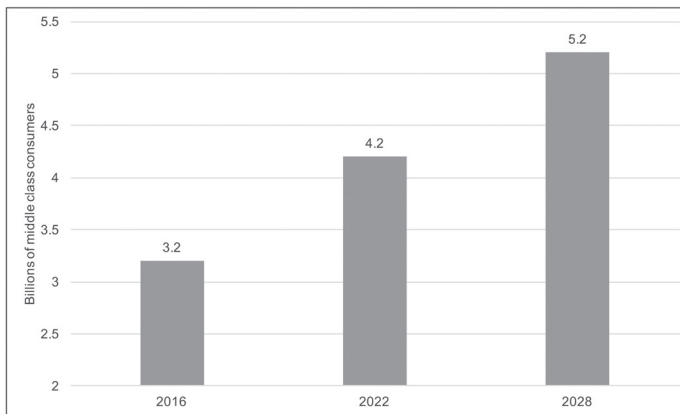
Note; data for North Africa includes Middle East countries
Source: World Bank, Purpose+ analysis, McKinsey, The global forces inspiring a new narrative of progress

The economic growth in the EMDEs, if continued, will lead to a spectacularly different world in the 21st century. Among the results will be a huge global middle class, which is expected to grow by another billion by 2022, and an additional billion by 2029, to reach 5.2 billion (*visual 19*). This is another tectonic shift, as it is the most **rapid expansion of the middle class** the world has ever seen: no less than 160 million people will join it annually in the next five years⁴⁴. This trend will change the game for the Asia-Pacific region, in particular, a region that had just 500,000 middle-class consumers in 2009, but will have over 3.4 billion middle-class consumers in 2030. This rise of the global middle class will have huge implications for the daily consumption of goods and services, which is already tangible in many cities.

The Defining Challenges of Our Time

Many tourist cities, such as London and Amsterdam, increasingly experience the presence of the Chinese middle class. Some markets, like luxury goods and wine, are also experiencing higher demand from the East – analysts attributed recent rises in Bordeaux wine prices and real estate in some cities to increased Chinese demand.

Visual 19: Billions more will become middle-class consumers



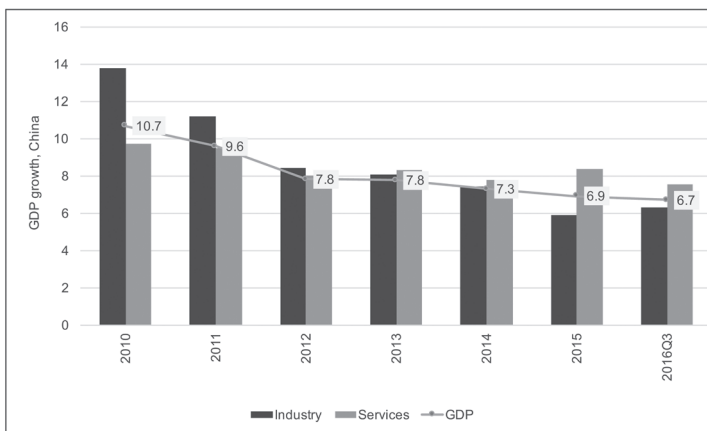
Source: Brookings Institute

Of the emerging ICASA economies, three deserve specific attention: China, India and Africa. The progress in these three places will largely determine the overall economic progress of the 21st century. Let's start with China, an economy that has continued to grow rapidly at rates of around 7% per year, and today, for the first time, sees higher growth in services than manufacturing (*visual 20*). As a first shift related to the emerging economies, **China is expected to surpass the US economy** in about ten years⁴⁶ (*visual 21*). Although this position can be considered nothing more than a symbolic victory⁴⁷, in reality, the largest economy in the world has historically also played a large *moral* role and is often requested to take a leadership position in conflict situations. Also, imbalances in the most substantial economy can trigger imbalances in the rest of the world, like the subprime mortgage crisis in the US (2007-2010) triggered a global recession. The US, currently the largest economy, has a great influence on international policies with a general aim to democratise other regions and ensure free trade. From a military perspective, the US controls major parts of the world's oceans and

Purpose+Profit

has a military presence in 153 countries⁴⁸. China, the biggest global economy in around eight years from now, may choose to act differently and see the world through a different set of values. Early signs that China aims to take on a new role of moral leadership became apparent recently when Xi Jinping appeared in Davos with a speech that contained support for globalisation, increased collaboration between countries and stability through interconnectedness⁴⁹. This speech came at a time when the newly elected US government was criticised for withdrawing from the international stage with its 'America First' policies.

Visual 20: China sees continued high growth, with services in the lead



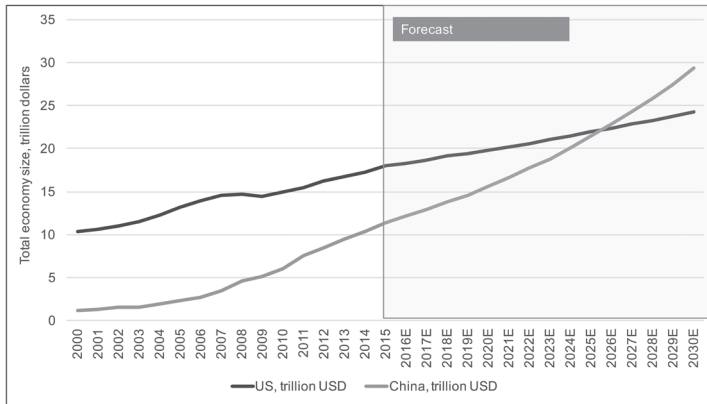
Sources: World Bank, Haver Analytics; The Economist; The One Hour China Book; Why China's consumers will continue to surprise the world (Jeffrey Townson, Jonathan Woetzel)

China is slowly moving away from a purely communist model and can currently best be classified as a model of socialism with market characteristics. The Chinese growth in the last decades is often described as miraculous. In fact, if you compare China's recent growth path to the past growth path of the UK, it becomes apparent that China's growth is ten times faster, and that's with 100 times more people than that of the UK in the past. Where the UK in the 17th and 18th centuries needed 154 years to double the GDP per capita for 9 million people, China did so in 12 years for over a billion people!⁵⁰ Another way to look at the power of Chinese growth is by analysing the last two decades. In this period, 40% of the total growth in world GDP can be attributed to the growth in China. Current growth patterns predict

The Defining Challenges of Our Time

that, of the 200 top cities that will dominate the world economy in 2025, 46 will be in China. The names of most of those cities are unknown to people in advanced economies today (e.g. Lanzhou, Urumqi, Kaifeng and Guilin).

Visual 21: China will overtake the U.S. economy in size by 2025



Source: Bloomberg forecast

Some areas in China, like Shenzhen and Chongqing, have shown particularly fast growth, and for good reasons. Both of these regions were part of the Chinese government's special economic zones programme in the late 1970s, part of the greater reforms implemented by Deng Xiaoping after the death of Mao Zedong in 1976. These zones were freer to experiment with their economic systems and leaned more towards the free market, lower tax rates and individual property rights. They also received more foreign direct investment than other regions. Some of these regions, like inland Chongqing and Guangdong, tell remarkable stories. Chongqing, also called China's Chicago, has had a fast growth rate due to heavy infrastructure investments and the Three Gorges Dam (the world's second-largest hydroelectric dam) – mostly supported by state investments. The area is remarkably state-driven as 37% of industrial output in the region is still created by state-owned enterprises (SOEs). Other regions, like Guangdong (Canton) and its economic hub, Shenzhen, have chosen a different approach. Since this region is the most populous province in China and has direct sea access, it has chosen a more capitalist approach. SOEs in this region account for 15% of industrial output. The beauty of the Chinese story is that it's largely a success story, with a multitude of different success stories encapsulated within it.

Purpose+Profit

Part of the remarkable story of the Chinese economy is the progress towards the privatisation of its companies and with that the increased efficiency of their firms. This process only started in 1997 with China Telecom's initial public offering (IPO) of shares to the public. Although there were fears about the free market (the listing code for the Hong Kong Stock Exchange was 941 which, pronounced in Chinese, means 'survival in the midst of danger'), their first IPO was a great success and raised US\$4.2 billion⁵¹. Other companies, like China National Petroleum Company (CNPC) followed. The IMF estimates that the state-owned sector lost 40 million jobs between 1990 and 2001, which indicates the inefficiency of the former SOEs. CNPC, for example, had 1.5 million workers in 1999, compared to BP's 80,000.

For all its remarkable successes, China's economy is starting to show signs of maturity, and possibly bubbles. The GDP growth rate target, set by the Communist Party at 7% annually, is not currently being met with expected growth rates of around 6.7% (*visual 20*, shown earlier). Much of the future growth will depend on the transition to consumerism: they will need to spend more and save less if their economy is to continue to see high levels of growth. The Chinese still consume way less than the world average (35% of their GDP versus 58% as a world average and 68% in the US). Although a challenging transition to make, especially as high levels of saving is embedded in the culture, the signs are positive, with increases in spending on discretionary items and semi-necessities expected in the coming years (*visual 22*). This transformation for the average Chinese consumer is also interesting: in 2005, 44% of all spending was on necessities, while this was expected to be just 18% by 2030.

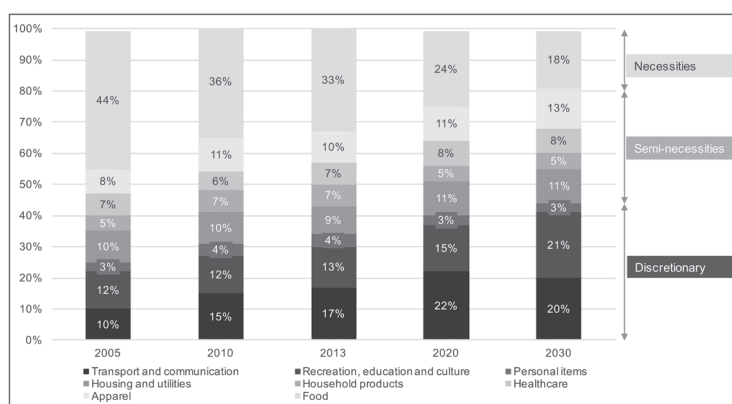
Even though there are many positive signs that China will become the world's engine of growth in the future, there are serious worries about China's economy too. Because of its size, any crash in China would increasingly mean a crash for the global economy. The main worries are to be found in two areas: a possible housing bubble and rapidly rising levels of debt, especially the rise of non-performing loans (see *visuals 23, 24*).

Housing prices have been rising incredibly fast in some regions. This is especially true for China's so-called tier-1 cities (the most developed cities, urban metropolises like Shanghai, Beijing, Guangzhou) and tier-2 cities

The Defining Challenges of Our Time

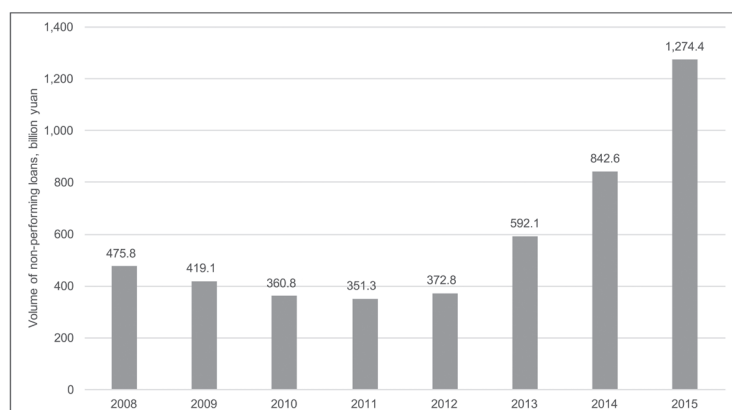
(mostly provincial capitals), which have annual house price increases ranging from 20%-30%. The amount of additional investment in housing and infrastructure only adds to the concerns, with stories of poor investments abound, like the famous 'bridge to nowhere'⁵² (where China invested in a bridge to North Korea, but North Korea failed to invest on their part. The bridge now ends in an agricultural field without any roads connecting to it on the Korean side).

Visual 22: Necessities are becoming a smaller piece of the wallet

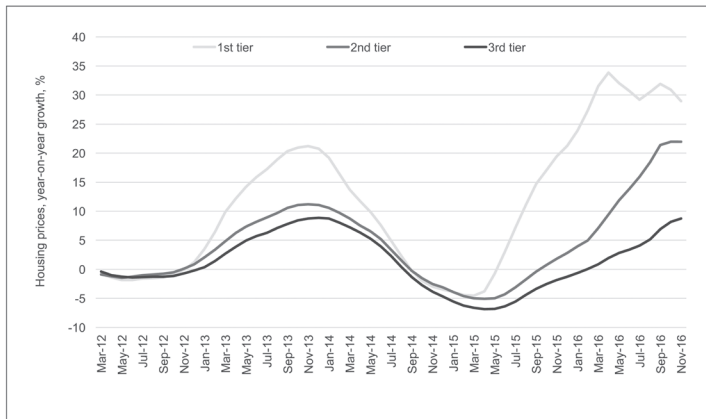


Sources: World Bank, Haver Analytics; The Economist; The One Hour China Book; Why China's consumers will continue to surprise the world (Jeffrey Townsend, Jonathan Woetzel)

Visual 23: The Chinese pile of non-performing loans is growing rapidly



Source: World Bank, Haver Analytics; The Economist

Visual 24: Chinese housing prices see incredible, but bumpy growth

Source: World Bank, Haver Analytics; The Economist

Non-performing loans add to this worry as reported Chinese numbers are often already considered unreliable, and shadow banking (where loans are taken from entities outside the regular banking industry) become more popular⁵³. The shadow banking sector has a wide range of alternative financiers, but the general tendency is to follow a different set of rules than the tightly regulated banking industry. These parties can often lend money to high-risk borrowers, and shadow rates can be high.

China's debt has also increased incredibly fast from 150% to nearly 250% of GDP in a decade⁵⁴. Most of this debt (165%) is held by corporations, especially state-owned enterprises. Due to the leverage effects that debt brings, this high growth in debt has led some economists to conclude that this is not sustainable. Others have pointed to the fact that these Chinese SOEs also own assets worth 552% of GDP (2013 numbers), and they could repay the debts by selling some of those assets. Altogether, the story of Chinese debt, non-performing loans and possible housing bubbles is not yet a tectonic shift as it is all speculation. But, there is a real chance that the coming decades will see economic shocks created in China.

As China expands and average salaries rise, the country will increasingly need a cheap workforce, and it seems to have found that workforce in Africa. Roughly 1 million Chinese people live in Africa already, and many deals be-

tween African governments and the Chinese government are in the making (such as the US\$4 billion Nairobi-Mombasa railway, nicknamed the Lunatic Express⁵⁵). African economies have repeatedly been described in the past as both *the* place for future growth⁵⁶ and a continent with a dark future as results continue to remain mixed and some observers question if Africa's growth will be enough for the coming population boom (more in the chapter on demographics) – average GDP growth for all African nations was just around 3.3% between 2010 and 2015 (compared to 4.9% between 2000 and 2008)⁵⁷.

Currently, Nigeria is Africa's largest economy by far, with a GDP of US\$486 billion, followed by South Africa (US\$315 billion) and Egypt (US\$330 billion)⁵⁸. Unfortunately, of those three countries, both Nigeria and South Africa have seen limited growth in recent years. Nigeria has seen declining, even negative, growth recently as it struggles to improve security and corruption⁵⁹ and aims to diversify from petroleum, which provides 25% of the GDP and 70%-80% of estimated government income. The old division between the north and south of the country (the latter of which is blessed with more natural resources), the fragmented population with over 250 ethnic groups, the poor infrastructure and the relatively high inflation rates are not helping either. South Africa has stumbled along in recent years with intermittent phases of negative growth. Corruption has stifled the country with as many as 783 criminal charges against current president Jacob Zuma. To make the matter worse, the Arab Spring countries stopped growing altogether between 2010 and 2015 as the revolution damaged their economies. Foreign direct investment in Africa is still growing, but this growth has slowed significantly, from 22% between 2005 and 2010 to 7% between 2010 and 2014.

Perhaps the best way to look at the mixed future growth in Africa is by plotting both the growth rate and the perceived stability of the countries⁶⁰. In this analysis Rwanda, Tanzania, Kenya, Morocco and Ethiopia stand out as possible growth engines of the future. There are other countries that show the potential for success, such as Botswana, but its overall impact on the continent will remain small due to its small size⁶¹. Disturbingly, the current largest economies – Nigeria, South Africa and Egypt – all face internal trouble. Growth rates in these economies have faltered in the past few years. It is also telling that, so far, not a single African company has reached the Fortune 500.

To summarise our economic story of the African continent, it is still a continent with an uncertain future, and much will depend on increased stability and interconnectedness. The continent is plagued by its colonial history (randomly drawn borders, for example) and is divided by 2,000 languages and over 3,000 ethnic groups. As the African continent combines periods of high growth and optimism with periods of internal turmoil and decline, foreign investment is likely to track those trends. The African continent could turn out to be one of the greatest growth engines in the first half of the 21st century if it can diversify its economies, accelerate its infrastructure development and deepen regional integration. If it succeeds, it could potentially double manufacturing output by 2025⁶² and become the new ‘workplace of the world’ (taking that role from China). Africa can realise this position since the continent has a young population and will have the world’s largest workforce by 2034. Urbanisation is also happening rapidly in Africa, which is good news since productivity in cities is around three times greater than in rural areas⁶³. Also, Africa seems to be able to leapfrog some technological advances – it is already a global leader in mobile payments, with initiatives like M-Pesa.

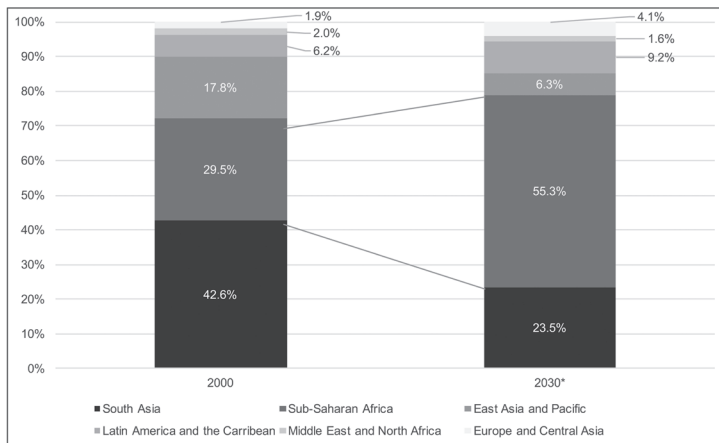
However, Africa could also turn out to be the ‘continent of the poor’ (see *visual 25*) with current World Bank predictions for 2030 showing that the lowest 10% income group on our planet will be overrepresented in Africa, with over 55% of this group living there. In other words, the African continent risks having more than half of the world’s lowest earners. Contrast this with the number for South Asia, where many of the poorest people still live today. The progress in this region is staggering as the relative share of the world’s poor will almost halve there in just 30 years.

One final story that needs attention is that of India. India has received less attention for its miracle growth than China (in the European media, at least). This can partly be explained by the fact that India’s economy is, in an absolute sense, way smaller than that of China, with US\$2.25 trillion in GDP versus China’s US\$11.4 trillion. India’s growth is impressive nonetheless, averaging 7.6% between 2005 and 2015⁶⁴. It is, by most estimates, the world’s number one destination for offshoring and outsourcing work⁶⁵. Historically, Indian governance was characterised by central, usually foreign⁶⁶, rule over many small states or principalities where some power was

The Defining Challenges of Our Time

given to the states. This decentralisation of power, while state control was maintained for important decisions, is in many ways still in existence today. Indian states can make their own decisions on some topics like the choice of what language to use, and what kind of economies to develop. This has important consequences for India's development. In China, 70%-80% of the population speaks Mandarin, while in India, Hindi is spoken by just 41%. India has 22 official languages today, of which just six are spoken by more than 5% of the population⁶⁷. Economic development is also starkly different between the states. So, even though both India and China are on the rise, they have chosen a very different governance strategy along the way.

Visual 25: Africa might house half of the world's poor people



* World Bank baseline forecast
Source: World Bank predictions, Global Economic Prospects 2007: Managing The Next Wave of Globalization.

After the British occupation, India's economy continued to suffer from extensive regulation, bureaucracy and public ownership of large monopolies, but lately, it has made steps towards a market-based economy. India joined the WTO in 1995, and with that accepted some of the worldwide regulations – such as patenting rules – that make it easier to do business with other countries. Although it is still not easy to do business in India (the country is ranked 130 out of 190 countries on the World Bank's 2017 Ease of Doing Business index), the situation is improving as the country slowly becomes more liberal and less bureaucratic. The 2014 election of Narendra Modi as prime minister spurred optimism as he was deemed pro-business.

The small tax base – estimated to be just 1% of the population⁶⁸ – is one of the country's main problems. It has led to some of the largest socio-economics experiments on the planet. For example, to stop tax evasion, the government took 86% of the country's cash out of circulation in 2016 after only four hours' notice from Prime Minister Modi. This created a shortage of cash and, some believe, it still affects growth today. The government aims to widen its tax base and stimulates people to open bank accounts and have social security identities. For this reason, India created the world's largest biometric identification system, called Aadhaar⁶⁹. This system, using a combination of iris scans, fingerprints and a 12-digit identification number, will be used for welfare purposes and tax returns. Already close to 90% of the 1.3 billion people in the country have an Aadhaar number⁷⁰. With this system, India is leapfrogging the rest of the world with biometric identification.

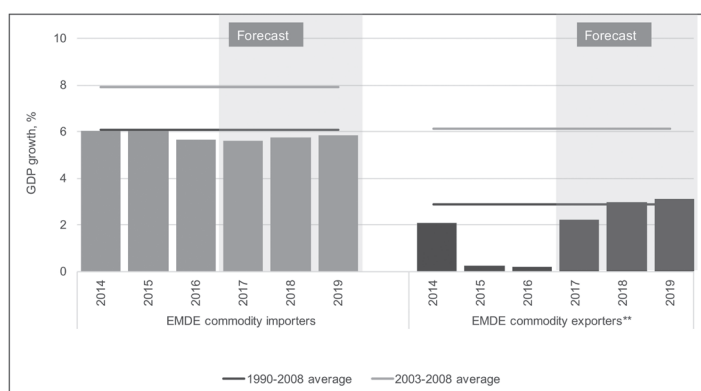
The second main challenge for the Indian economy is high-quality education. Although India has managed to make education nearly universal for its 260 million school-age children, the quality of that education remains poor, with the average 15-year-old Indian student from states like Tamil Nadu and Himachal Pradesh a full five years behind their counterparts in Shanghai, China. Ranked in the American education system, they would be in the bottom 2% of their class⁷¹. This will have grave consequences later as school performance is intricately linked to higher wages and faster economic growth.

To complete our look through the economic lens of the world today, there are a few more players we should briefly look at, and one more shift to highlight. Let's start with Russia, which remains a troubled state. So far it has not been able to successfully move up the value chain (from low-value exports, like raw goods, to high-value exports, like technology) and has continued to mainly rely on commodities (e.g. oil and gas). It is therefore vulnerable to the volatile prices of those commodities. It suffers from opaque business rules and continued state intervention. In fact, Russia's GDP growth and exchange rate seem to track the crude oil price closely⁷², and the richer areas of Russia are the ones that produce oil. This has led some media, like *The Economist*, to conclude that many of the political events in Russia, such as the annexation of Crimea, are related to the price of crude oil too⁷³. Sadly, Russia represents the resource curse theory, also known as the paradox of plenty,

The Defining Challenges of Our Time

which says that countries with an abundance of natural resources tend to have less economic growth and lower levels of democracy in general. Other countries suffering from this include Saudi Arabia, Venezuela, Congo, Libya, Algeria and Iraq – all of which seem challenged at least in some ways *because* they have resources. The only known outlier of this theory is Botswana where the exploration of diamonds has led to sustainable GDP growth through a joint venture with De Beers⁷⁴. This is the final economic tectonic shift since it is expected that **the 21st century will increasingly see a struggle of resource-rich countries to diversify** and overcome this curse. As resources deplete and international policies aimed at reducing environmental harm take effect, the pressure for these countries will increase. Like Saudi Arabia has highlighted in its Vision 2030 document⁷⁵, diversification of the economy will be essential to create future growth.

Visual 26: Commodity exporters are set to grow slower



* Oil used as example, other relevant volatile commodities are gas, gold, silver, zinc, wheat, sugar, coffee, copper etc.

** Examples: Venezuela, Russia, Saudi Arabia, Libya, Algeria, Kazakhstan, Congo, Iraq

Sources: Macrotrends database; World Bank projections; The Economist, A Risky State

As can be seen in visual 26, commodity exporters have already suffered from lower growth compared to importers in recent years. Countries that rely on exports are vulnerable to any changes in the prices of these products and therefore depend on forces they do not control to grow. The price of oil has been especially volatile in recent years, reaching a peak of US\$156 per barrel in January 2008 and a low of US\$29 in the same month in 2016 (visual 27). When global recessions hit, oil prices can plunge. Between January 2008

Purpose+Profit

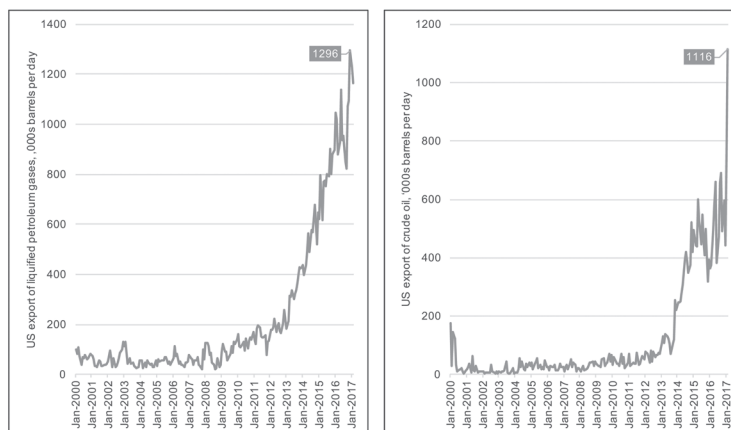
and January 2009, the oil price declined a full 70%. To add to the possible problems commodity exporters face, the US has recently shown a dramatic increase in the export of natural gas and oil (see *visual 28*) due to the widespread implementation of new techniques like hydraulic fracturing (frack-ing). The newly available supply in both oil and gas that the new technological advances create can put a further downward pressure on prices for commodity exporters.

Visual 27: Commodities can be a volatile business



Source: Macrotrends database

Visual 28: The US has stepped up the oil and gas game



* For reference: Saudi Arabia and Russia, the world's largest producers of crude oil, produce ~10mn barrels per day
Sources: www.eia.gov, January 2010 – February 2017 data export; The Fix, How Nations Survive and Thrive in a World in Decline, Tepperman (2016)

The Defining Challenges of Our Time

Although it is possible that resource-rich countries will see higher levels of growth in the near future when the price of commodities rises again, especially the price of oil, it would be unwise to hold on to commodities as the main strategy for economic prosperity. Some observers, including the US Energy Information Administration, believe that the price of oil will indeed rise due to increased global demand. This, however, will depend on a multitude of factors such as successful OPEC agreements, economic growth being realised, US shale oil production, and so on. In the long term, therefore, commodity exporters will need to find a way to overcome their resource curse, minimise volatility and diversify their portfolio to stay ahead. The pressure to do this will increase by environmental policies in the 21st century (more in the chapter on environment).

To summarise our total story around economics, we can be cautiously optimistic about the economic prospects of our planet. There is a good chance that our future world will be economically healthier, more productive, still innovative, and spread more evenly across the planet. Although global economic growth in the 20th century was close to miraculous, the experience in the first half of the 21st century has the potential to prolong that for EMDEs. These changes will not go unnoticed, however. The most important shifts we discussed are the following:

1. **Re-balancing of the global growth engine:** most economic growth is likely to come from EMDEs, not from advanced economies. In particular, the simultaneous rise of China and India will create a new economic centre, shifting the economic centre of gravity east. In economic terms, the 21st century will be the Asian century.
2. **Rising levels of inequality.** As levels of inequality rise, they may contribute to increased levels of social unrest in and between societies. Some countries run the risk of creating hourglass economies and deflating their current central philosophies. The lower-half of the income spectrum in advanced economies is likely to be increasingly challenged unless special measures (e.g. universal basic income, better access to education) are implemented.
3. **The slowdown in productivity growth.** Particularly challenging for already indebted countries, and countries with declining populations, productivity growth may well slow down. A change in the

perception of work for the new generation of workers may contribute to this phenomenon.

4. **The increasing emotional disconnect for investors.** Due to the rise of both algorithmic and passive trading, investors can increasingly be emotionally disconnected from what they invest in. This might create ethical problems, as distinguishing ethical companies from less ethical ones will be less obvious (or decided by machines).
5. **The middle-class fuelled consumption boost.** With billions of new middle-class consumers entering the market, mostly in Asia, the global consumption landscape will change dramatically. Consumption will rise to unprecedented levels. This increase may also affect prices of some goods.
6. **China as the new largest economy.** The rise of a new global leader will have economic, political and moral consequences for our planet. China's problems will increasingly be the problems of the world.
7. **The race for diversification for commodity exporters.** As resources are finite and can have highly volatile prices, they can limit the growth rates for countries that depend on them. Commodity exporters will face a race against the clock to diversify their economies successfully in the next century.

To end this chapter, it is worth noting that most of the challenges ahead are collective in nature. They are not created by a single institution, nor do they limit their impact to single institutions. Instead, they are more correctly classified as by-products of the progress made, and the ideology embodied. These shifts will directly affect organisations, who are at the heart of our economy. For example, the re-balancing of the economic engine means ever more intense competition from the east, a significant increase in consumption from EMDEs, and organisational cultures that will likely be increasingly diverse as teams are spread across the world, working in different time zones and through different cultures. Having a local presence, understanding local markets and needs, and embracing multiculturalism will be increasingly relevant. The high levels of inequality in the world outside organisations will, in some ways, be reflected on the inside as well. Leaders in the organisation, as well as investors, increasingly earn more relative to the workforce at large. Meanwhile, the slowdown in average productivity growth will put organisations under pressure from shareholders to do

more with less. Automation is a logical solution but may come with human consequences. Finally, the increasing disconnect with investors will prove challenging for organisations with a broader stakeholder view, or a long-term perspective. In our view, as the collective shifts continue to impact organisations, our organisations will turn out to be the main locus of innovation; it is within our organisations that new economic models – more balanced, long-term, inclusive – will be piloted first.

1.3 Geopolitics

Although economic trends run like the quiet engine in the background, geopolitical trends in recent years have been the centre of our attention. Some significant events – the Arab Spring, the 2016 US presidential election between Clinton and Trump, the 2016 Brexit referendum and the fall of the presidents of Brazil and South Korea through public protests – have shown us glimpses of a new world. This chapter describes six geopolitical tectonic shifts in the 21st century: the diffusion of power, the global trust deficit, rising anti-globalisation sentiments, the rise of the strongman leader, the increase in international tensions, and the great divide between the elite and the rest.

In his well-received 2013 book, *The End of Power*, the executive director of the World Bank Mosés Naím claims that **power in the future will be increasingly diffused**, which will create a more volatile world. This is the first geopolitical tectonic shift as this trend is deeply relevant. Naím argues that the concept of power, in general, is decaying in the sense that people with power can do less with it, and it's easier to lose it. The trend Naím describes applies to all systems of centralised power, which includes governments⁷⁶ and organisations. He believes that the drivers that reinforce the decentralisation of power are more powerful than the drivers that reinforce the centralisation of power (see *visual 29* for a summary of the forces). Powerful forces, like universal access to information through the internet, the 'democratisation of voice' (Twitter, YouTube, Facebook, and other social media), and better overall access to education stimulate the decentralisation of power. The drivers to centralise power, like 'country first' thinking and the need for fast decision-making, seem to be less potent. Another clue for this decentralisation of power is the state forms we seem to prefer (*visual 30*). Although