

### **Introducing Stephen Jennings**

It is an honour to introduce Stephen Jennings to this audience and a real pleasure to acknowledge his wife Yulia who has joined us for this occasion.

I have known Stephen since we were both in Treasury in the early 1980s. Stephen was a member of an outstanding tax policy unit in Treasury that was soon to be charged with leading major post-1984 tax reform policies.

We both subsequently worked for CS First Boston NZ in Wellington. Stephen's group specialised in giving expert economic advice on governance, restructuring and competition policy issues.

I am sure I can speak for all his colleagues in saying that we still feel proud of the job he did.

I particularly remember his work helping Ngai Tahu design its novel and innovative governance structure.

When Stephen unfurled his wings and left for a global role with Credit Suisse in London I remember Sir Tipene O'Regan saying that it felt like he was losing a son.

His move to London was timely. The Iron Curtain had been rent asunder. Investment banking opportunities in Eastern Europe and the former Soviet Union were knocking.

Stephen managed to get transferred to Moscow. Once again he was in the forefront of major structural change, but this time in much more turbulent and daunting circumstances. After ups and downs that would have overwhelmed most businessmen, he moved from Putin's Russia when further beneficial change had become impossible.

Another colleague from CS First Boston NZ was at a function Stephen put on in England around that time. He found himself talking to a hard-bitten Russian journalist. The journalist volunteered that Stephen's honesty and integrity was exemplary, and that he was highly regarded in what was an extraordinarily challenging environment. That's the Stephen we know.

And now Stephen is at the front of daunting structural change in Africa. He is working far harder and more intensively than most of us have ever done to put know-how and capital together to help African countries build commercial capability and prosperity.

I once saw a graduation address advising Massey students to “*take big bites*” in life and “*chew hard*”. I think relative to most of us, if not all of us, that is what Stephen has done. And what a difference it makes.

But of course, courage to take on big challenges is just one aspect. Wisdom, capacity to execute and exceptional focus and energy are also necessary if they are to be overcome.

A few years ago I heard Stephen being interviewed about business opportunities in Africa by a polished but disdainful BBC interviewer. Perhaps inevitably the interviewer implied that Stephen was trying to profit at the expense of Africans.

Stephen replied, politely and calmly but with inner steel, that Africa was crying out for capital, know-how and infrastructure amidst deep problems of poverty, corruption and weak governance. Those with capital could either sit on the side-lines and jeer, ignoring the challenge, or they could try to help.

The interviewer said “fair comment” but did not change his tune. No surprise there. People who see capitalism as a zero sum game of exploitation can’t begin to understand what they are looking at.

It is a constant challenge to inform the public about the positive role of markets, competition, property rights and entrepreneurship. Stephen is a fine advocate of these liberal values. They also represent what The New Zealand Initiative stands for through its research and advocacy.

It is now seven years since Stephen’s Sir Ron Trotter lecture to a Wellington audience encouraged us to seize our opportunities rather than be left behind. His point that better national governance arrangements can result from the pressure businesses put on governments to reduce corrupt practices in order to make honest business was particularly thought-provoking.

Well a lot has happened since 2009, and more is going to happen, not least since the Brexit vote. Global events are as challenging for New Zealand as ever.

Please join with me in welcoming Stephen to the podium to talk about “*The Market Path to Prosperity*”.

Dr Bryce Wilkinson.

## Introduction

Good evening. Thank you Bryce for your generous introduction and thank you to The New Zealand Initiative for the opportunity to give this address.

When I joined the Treasury as an analyst in 1984 Bryce was one of the intellectual leaders the young economists all looked up to, often with a degree of trepidation. It's unnerving to have much the same feeling 30-odd years later when reading Bryce's recent work.

It's great to be back in Auckland. I studied economics here in the '80s and I'm grateful to Auckland University for sparking my interest in how markets and institutions really work. The windsurfing was pretty good as well.

As a newly minted economist I lived in Wellington for eight years working at the Treasury and in the private sector as a policy analyst focusing on New Zealand's economic liberalisation programme.

Then, almost twenty-five years ago, I flew out of Auckland bound for Eastern Europe. I took with me the mind set and zeal of a well-indoctrinated economic missionary destined to save the former-communist world.

The couple of years of intended OE morphed into almost complete immersion into the markets, cultures and politics of several of the world's most complex and rapidly changing emerging markets. I spent 20 years living and working in Russia and have clocked up my first decade of building businesses across sub-Saharan Africa.

This has included large-scale enterprises in investment banking, consumer finance, forestry, agriculture and urban development. In the process I've lived through and survived – just – two of the biggest crises in the history of emerging markets.

Foreigners sometimes talk about having a ring-side seat in emerging markets; my experience is more akin to full participation in the protracted ruck of early stage development – and try to think of the days when rucking was an integral part of the game!

Needless to say these experiences had a considerably greater impact on the would-be missionary than he did on his environment.

However, tonight I don't intend to regale you with war stories.

Instead I would like to highlight two trends that emerge from my business experience which I think will be critically important to New Zealand in the coming decades. Both of these are poorly understood. One falls broadly into the opportunities category; the other is much more of a threat.

The first trend is the rise of Africa - the dramatic improvement in the economics, security and health of sub-Saharan Africa over the last fifteen years and the even more important improvement in governance and political competition. The important message for New Zealand is that this presents a massive trading and investment opportunity.

The second trend relates to the broader impact of the medium-term ascendance of the emerging markets for the West, including New Zealand.

This raises questions regarding competitive challenges, incomes, skills and public policy responses.

The last time I spoke publicly in New Zealand I was privileged to be delivering the Sir Ronald Trotter Lecture organised by the New Zealand Business Roundtable. Roger Kerr headed the Roundtable at the time. Very sadly, Ron and Roger are no longer with us. They were both men of enormous integrity with the commitment and courage to change New Zealand for the better. I would like to dedicate tonight's address to these two great New Zealanders.

## **Africa**

By Africa I am referring to sub-Saharan Africa (SSA), which comprises the 45 countries below the Sahara. I'm going to describe the dynamic that is already well underway and then talk about the broad direction of change likely in the coming decades.

To help get my message across I would like you to try to briefly park a few preconceptions.

Right now I suspect that most of you are convinced that Africa is the 'Hopeless Continent'; home to the poorest people in world, in the region with the most conflict, disease and starvation and with the most corrupt and autocratic leaders on the planet. And of course you are partly right. The problem is that conventional wisdom also holds that none of this is going to change.

Many of you will find it hard to believe but for the last fifteen years Africa has been one of the fastest growing regions globally, with the world's most rapidly improving health statistics, school enrolment, governance and conflict reduction.

To get you thinking without bias, I want to briefly explore why those negative preconceptions are so strongly held.

First, the media and the aid industry have been extremely effective at entrenching Africa's hopelessness as the conventional view – all those starving children, famines, wars and despots.

No doubt many of you still remember being traumatised by images from the horrific drought in Ethiopia way back in 1984, which killed at least 600,000 people and carved 14 per cent off the economy in a single year. The West was bombarded with images of the distended stomachs and fly-blown faces of starving children. The magnitude of the crisis certainly justified the massive international assistance.

I've just returned from Ethiopia. The country is again experiencing its worst drought in over a generation, which is threatening the food supplies of 20 million people. But, did the media or the aid industry tell you that this time round the country's mortality rate isn't going to rise at all and that Ethiopia will continue its 15-year trend of being one of the fastest growing economies in the world? And the reasons for the change: peace, improved governance, vastly greater agricultural production and improved infrastructure within Ethiopia.

Negative preconceptions about Africa are further entrenched by the difficulty we all have in comprehending structural change. We forget that for the majority of human history there was little variation in income levels and life expectancy across the major regions of the world.

We forget that until the mid-70s it was Asia that was considered the over-populated, politically incompetent, war-driven basket case beset by ethnic conflict, malnutrition, disease and illiteracy, all complicated by poorly drawn borders. With the exception of Japan, per capita income in Asia hovered near a paltry US\$400.

Many find Africa's complexity disorientating. Moreover, structural change is inherently slow and can become frustrating. But it is the underlying forces for change that will shape the future.

So, what are those trends and what is driving them?

Economic growth in Africa has averaged nearly 6 per cent over the last 15 years, its fastest since independence. Six of the ten fastest growing economies in the past decade are African with the same being projected for the coming decade.

The resurgence is broadly based – economic growth has accelerated in 27 of Africa's 30 largest countries.

And this is benefiting Africa's poorest. World Bank data indicates that the proportion of Africans living on less than one dollar and ninety cents a day has fallen from 56 per cent in 1990 to 35 per cent in 2015 following decades of deterioration.

Africa's non-GDP economic indicators have also improved impressively. From the 1990s to the 2000s inflation fell by 64 per cent, government debt by 28 per cent and fiscal deficits by 60 per cent.

Africans are also better educated than ever before. Literacy rates among the young now exceed 70 per cent almost everywhere. Primary school enrolment rates are steadily approaching those in emerging Asia.

### Primary School Enrolment in SSA Versus Asia



*Net enrolment rate in SSA versus Asia 1975-2013, primary schools, both sexes, %, World Bank data*

The rise in secondary school enrolment has been even faster – an increase of more than 50 per cent in just eight years from 2000.

Life expectancy is also improving rapidly. Since 2000, life expectancy has increased by as much as 42 per cent, and the 15 countries globally with the largest percentage increase in life expectancy have all been African. Annual malaria deaths across Africa have fallen by more than 60 per cent just since 2000 and new HIV infections are down 40 per cent over the same period.

Not surprisingly the recent collapse in global commodity prices and slower global growth have affected Africa. GDP growth in the region slowed to 3.6 per cent last year down from 5.0 per cent in 2014. Other macroeconomic indicators have also deteriorated.

However, the balance of the evidence strongly suggests that Africa's rise has been due to structural factors not commodity prices.

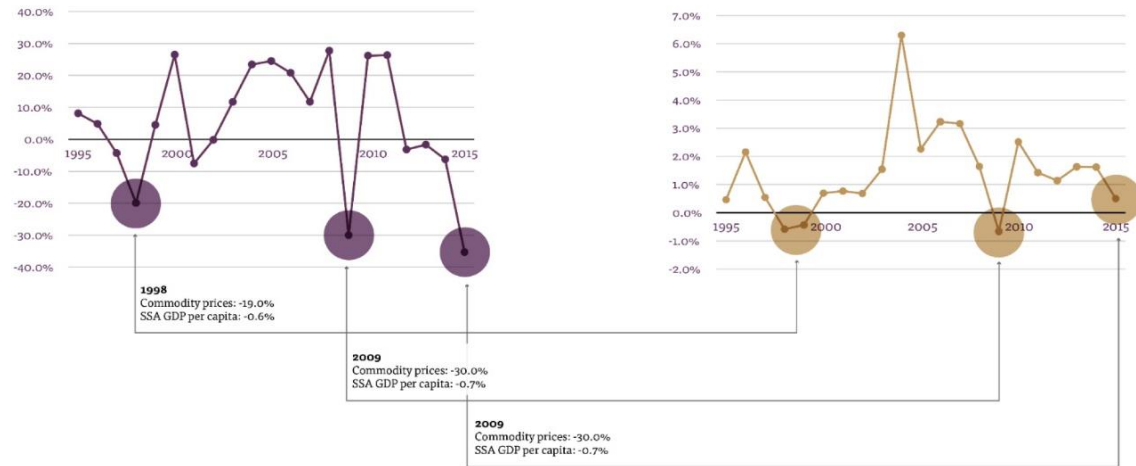
First, during the recent commodity boom, IMF data showed that natural resource endowments and geography had not been decisive factors in explaining the growth take-off.

Second, over the last twenty years Africa's economic performance has become less sensitive to successively bigger commodity shocks. In contrast with previous commodity shocks, in 2015 per capita GDP rose despite a massive 35 per cent fall in commodity prices and a 71 per cent fall in oil prices – biggest 20-month collapse for more than 50 years.

**Impact of Commodity Prices on Growth in Sub-Saharan Africa**

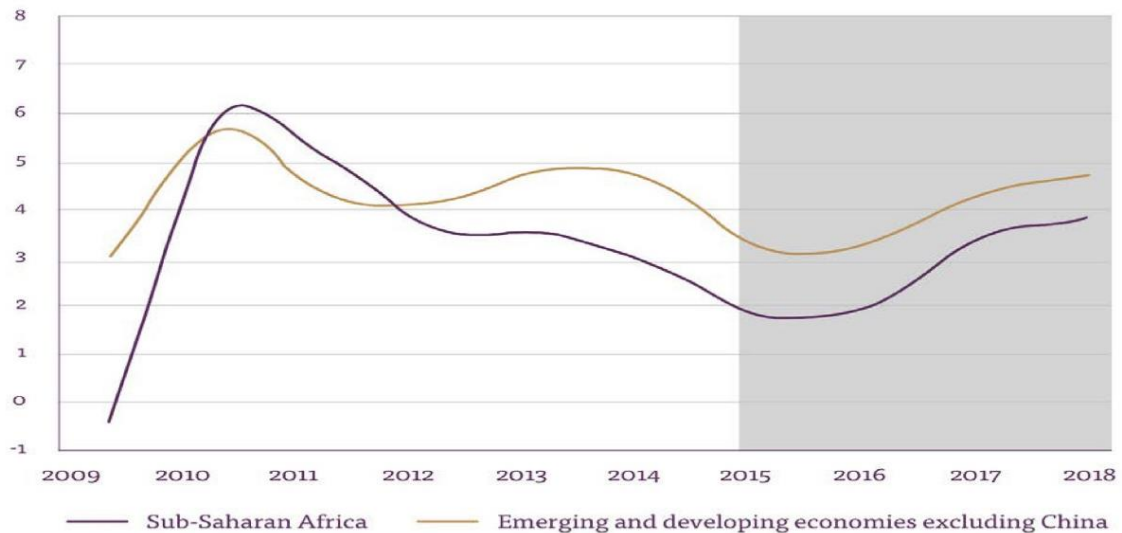
IMF All commodities and energy index, yoy % change

SSA GDP per capita, yoy % change, World Bank



Finally, Africa is consistently out performing other developing economies, excluding China, and that gap has been maintained during the recent commodity downturn.

**GDP Growth and Prospects for Sub-Saharan Africa**



SSA GDP growth versus developing economies (excluding China) 2009-2018, %, World Bank data

The World Bank forecasts that the majority of the 33 countries in the world that will grow by 5 per cent or more in 2016 will be African. Looking further ahead, the IMF predicts that Africa will be the second-fastest growing region in the world between 2016 and 2020.

So what is driving this sustained improvement in Africa's economic performance and what do those drivers tell us about Africa's potential.

The first driver may surprise you but is possibly the most important – governance and political pluralism have improved. Incredibly, in the 1960s, 70s and 80s only one African government was peacefully voted out of office. Nic Cheeseman from Oxford University has recently published an excellent and comprehensive account of the evolution of democracy in Africa. He shows that a quarter of African countries have made significant progress towards establishing stable and accountable multi-party systems. Using somewhat broader definitions than Cheeseman, the United Nations claims that between 1989 and 2003 the number of democracies in Africa increased from 3 to 23.

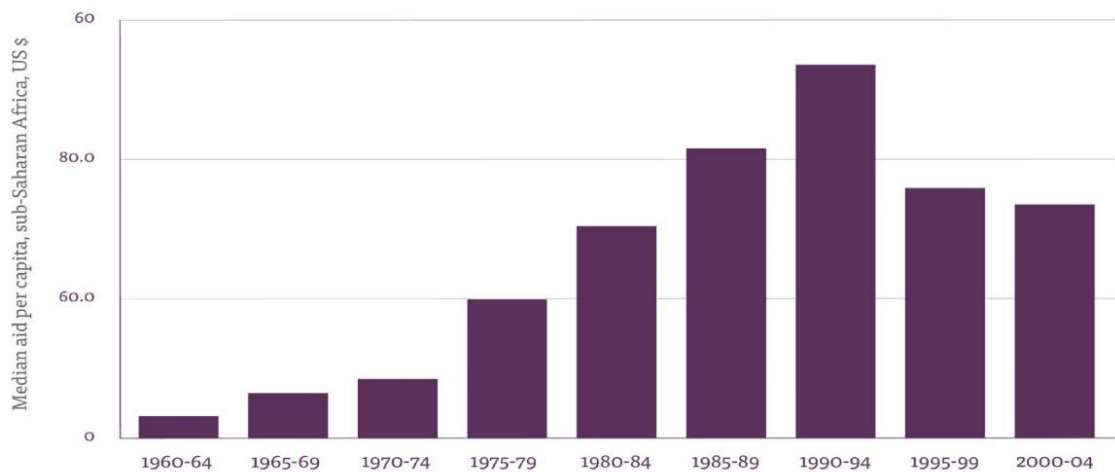
Importantly, the move towards greater democracy has been matched by improvements in standard measures of governance. The World Bank's latest survey on the Ease of Doing Business indicates that Africa is the fastest reforming region in the world with five of the 10 fastest reformers being African. Rwanda, once synonymous with genocide and abject poverty has been *the* fastest reforming country in the world in recent years.

As in Asia in the '60s and '70s, the acceleration of growth in Africa coincided with reduction of wars and conflict. Between 2002 and 2011, Africa's share of worldwide violent conflict more than halved. This frequently had a major impact on economic growth. For example, post-conflict, economic growth rates increased by 10 percentage points in the Democratic Republic of Congo and 15 percentage points in Sierra Leone.

The reduction in conflict in Africa coincided with the end of the Cold War. This marked a dramatic reduction in interference by foreign governments in African affairs. As the next chart shows one measure of this was the sudden fall in aid to Africa with the unpleasant joke at the time being – "the Cold War is over and Africa lost". However, Africa's decline only turned around when aid fell once the Cold War ended.



### Median Per Capita Aid to Sub-Saharan Africa



Source: *The Great Escape*, Angus Deaton

Previously, with the West on one side and communist governments on the other, outsiders played a devastating role in supporting some of the most destructive and repugnant tyrants in modern history.

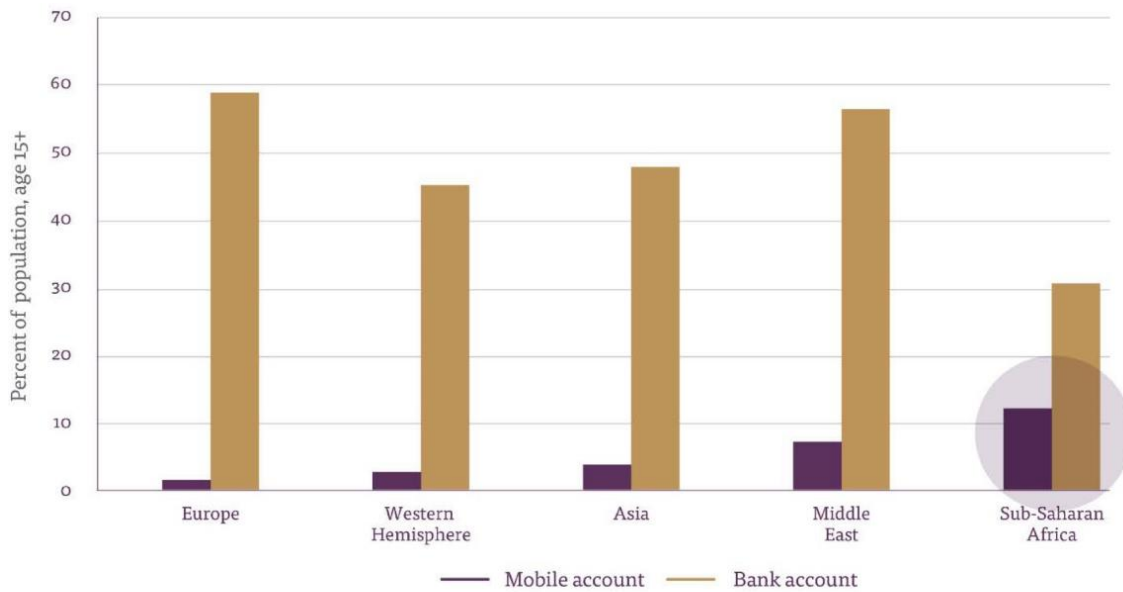
Another driver of change is Africa's ability to leapfrog in the adoption of new technologies. Only a tiny percentage of Africans ever had access to landline telephones. Imagine the impact of mobile penetration increasing from 2 per cent of the population in 2000 to 55 per cent in 2013, with 91 per cent penetration expected in 2020.

It is estimated that by 2020 over half of Africans will have access to smart phones.

Mobile telephony has greatly improved the inclusiveness of the financial system.

Africa now leads the world in the adoption of mobile banking. 11 per cent of the African population holds mobile banking accounts, almost twice that of any other region.

### Mobile Banking Accounts in Sub-Saharan Africa Versus Other Regions



Source: World Bank, World Development Indicators

The number of transactions via mobile devices has almost doubled in the last two years alone.

The dilapidated nature of existing infrastructure provides opportunities for technology leapfrogging in other, sometimes-unexpected areas. Africa has a sixth of the world's population but only 3 per cent of its generating capacity and is typically associated with chronic power shortages. However, a number of African nations are rapidly building new capacity and have seized the opportunities presented by the falling cost of renewable energy technologies. For example, Kenya generates more than two-thirds of its power from renewable sources and is a top ten geothermal producer globally. In the last seven years the proportion of Kenyans' with access to power has more than doubled, to 50 per cent.

Kenya has also pioneered the fusion of mobile money and new electricity generation. For as little as 45 cents a day paid via their mobile a Kenyan living in a remote village can pay for a new solar panel.

It is frequently argued that Africa is benefiting from a massive 'demographic dividend' at a time when much of the rest of the world is confronting the economic headwinds of aging populations and declining work forces. Africa's population is expected to double to 2.5 billion by 2050 meaning one in four humans will be African.

Approximately 13 million Africans are entering the work force each year. Africa will have the largest working-age population in the world by 2030. In addition, Africa is urbanising faster than any other region in history.

So what do these drivers of change tell us about the medium-term future for Africa?

In my view it is very likely that Africa *will* continue to be one of the highest growing regions in the world, quite possibly the fastest growing, over the next several decades.

The virtuous cycle between improved governance and improved economic performance is likely to continue in most countries in the region.

The generally poor state of African infrastructure and Africa's dreadful rankings in governance and corruption are actually further reasons to be positive. Being at the back of the pack simply creates greater scope for catch up. This is demonstrated by Asia's remarkable renaissance and by what Africa has already achieved.

### **Opportunities for New Zealand Businesses**

So now that you are Africa converts, I think we can turn to the opportunities across the continent for New Zealand businesses. Let's start with the most obvious points: Africa's markets are big and will become huge. They are fast growing, the opportunities are often very poorly understood and the competitive landscape is usually weak. In other words, the prize is massive and the competitive barriers to entry are low.

The majority of African countries are English speaking and many proudly share our Commonwealth ties.

I'm not sure how New Zealand's No. 8 wire mentality is doing these days, but this mind set is extremely helpful in Africa. To generalise just a little, African's are fed up with window-shopping, carpet-bagging, big-talking foreign investors. They respond well to people who are pragmatic, on-the-ground doers.

For Kiwi businesses Africa also provides a valuable opportunity to diversify. Most of our markets have either low growth or deteriorating demographics. China involves increasing structural and political risk.

The next question is: what are the most interesting industries? In my opinion agriculture is very near the top of this list. Historically Africa was a strong player in agriculture and nowhere in the world today is there greater potential for agricultural development.

Half of the uncultivated arable land in the world is in Africa. Until recent decades many African countries had vibrant agricultural sectors and were major exporters of agricultural products. For example, Nigeria was once the world's biggest producer of palm oil; Ghana of cocoa; and Kenya and Ethiopia of coffee.

A thriving agriculture sector depends heavily on strong land title, good infrastructure and properly functioning financial markets. The conflict and economic chaos that followed independence in Africa were devastating for agriculture. The continent's global share of agricultural exports collapsed from over 8 per cent in the 1970s to a mere 2 per cent in 2009.

The negative trends in agriculture have begun rapidly reversing with Africa's greater stability, growth and reduced conflict. Between 2000 and 2013 Africa's output of cereals grew faster than any other region in the world.

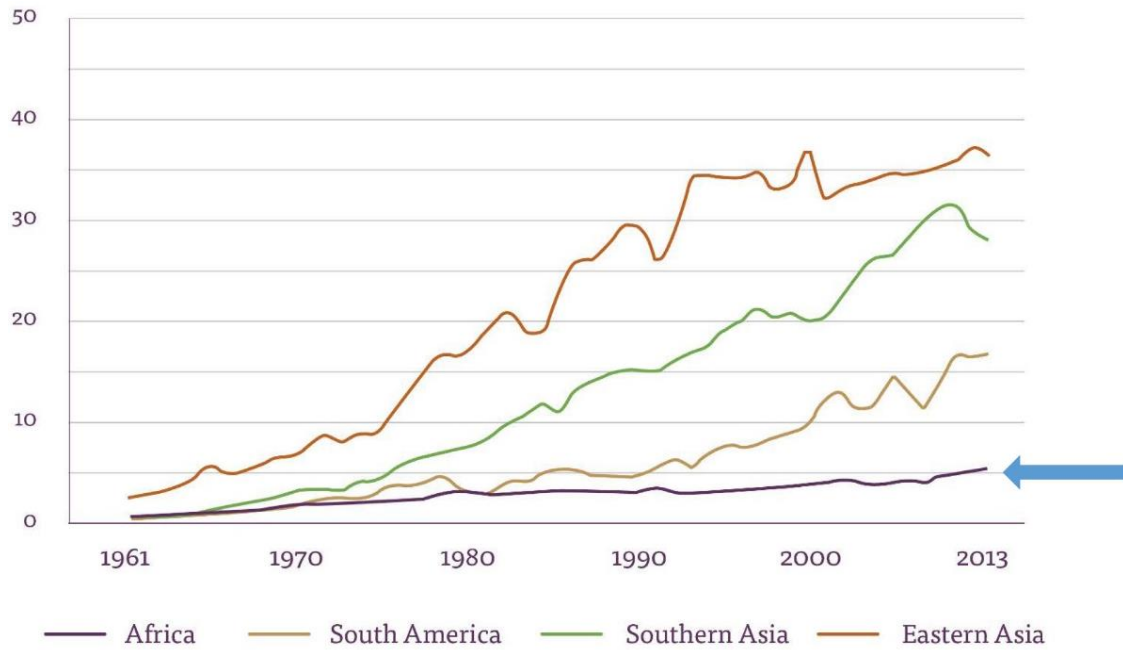
According to the UN Food and Agriculture Organisation, Rwanda's farmers produced three times more grain in 2014 than in 2000 and seven times more maize. Cereal production in Ethiopia tripled over the same period.

Improved farming techniques, including better-fertilised crops and the use of higher yielding hybrid seeds, have fuelled much of the progress.

Massive new agricultural sectors have been built. On average, 360 tonnes of cut flowers are flown out of Nairobi daily to international markets. Since 1998, the Kenyan flower industry has grown more than tenfold, partly due to the proximity to the cheap geothermal power mentioned earlier. The flower industry has also grown spectacularly in Ethiopia.

Despite this progress, in almost all African countries agriculture is a very, very long way from achieving its potential. Just consider Africa's tiny fertiliser utilisation compared to South America and Asia.

### Fertiliser Consumption in Africa Versus Other Regions



Underferd: Fertiliser consumption, tonnes m, Food and Agriculture Organisation data

New Zealand’s leading human and intellectual capital in agriculture could be a game changer in many sectors and in many countries if applied with ingenuity and determination.

To illustrate the potential, I would like to tell you about one notable Kiwi success story. It highlights the diversity of the opportunity for New Zealand’s ag businesses as well as the fact that you don’t need to be big to win.

### Olivado



Olivado is a vertically integrated producer of avocado oil and sells a range of quality food and cooking oils under its own brand in 35 countries. The business is owned and managed by Kiwi Gary Hannam.

1,500 small farms supply Olivado with avocados in Kenya and Tanzania. This is expected to increase to 4,000 over the next two years. Olivado trains and supports the farmers to improve productivity. They operate a five-year improvement plan with Plant and Food Research (New Zealand) and NZ Aid.

Olivado now produces over 90 per cent of the world's organic fair trade avocado oil and 65 per cent of total global retail sales of extra virgin oil.

Demand in the sector has increased 500 per cent in the last five years.

Olivado is expanding rapidly with new capacity being built in Kenya and Tanzania.

## Rendeavour

Quite a few other Kiwi businesses are making good inroads in a range of sectors, including building materials. Some of these are supplying Rendeavour, the urban development business I founded and manage.

Rendeavour builds new satellite cities from scratch and controls over 12,000 hectares of urban land.

The next chart shows our current portfolio of seven projects across Ghana, Nigeria, the DRC, Kenya and Zambia.

### Rendeavour portfolio

Chart 8: Rendeavour is Africa's Largest Urban Land Developer



Rendeavour buys raw land, typically within 35 kilometres of existing major conurbations, master plans an entire new mixed-use and mixed-income development and then installs all requisite bulk infrastructure. We then either sell developed land or, as is frequently the case, work with developers to build houses and apartments, light industrial facilities or commercial real estate.



A typical project for Rendeavour encompasses around 2,500 acres or 1,000 hectares and is designed to provide housing for around 70,000 residents and facilities for 30,000 daily visitors. may sound large, but in two of our developments we are already running out of land.



Each development has the potential to create approximately 100,000 permanent and 200,000 temporary jobs during its twenty-year project life.



In each major project we are committing over USD\$250 million in infrastructure investment.





Our bigger projects also include large industrial parks. These tend to be major catalysts for industrial investment.

The 420 acre Tatu industrial park in Nairobi is the largest in East Africa and has attracted well in excess of half a billion US dollars in modern light industrial investment. Unilever are building their largest manufacturing facility in Africa at Tatu and we have attracted many of the leading industrial groups in East Africa.



### Aerial of Roma Park



What are some of the key lessons and ‘to dos’ for Kiwi businesses thinking of entering Africa?

- The African markets are challenging and the processes of change are long-term in nature. You need to be incredibly committed and prepared to stay the course;
- Desktop research is useful, as is networking with experienced Africa players. However, in opaque and rapidly changing markets hard earned experience is the best way to learn. And don’t dream of just dipping your toe in the water – you may not see it again;
- A strong locally based management team is critical and must be closely aligned with the core shareholders;
- Bake resilience into all aspects of your business – shocks are inevitable;
- Look to diversify across countries – the biggest risk is single country political and macroeconomic risk; and
- Be ready to expand rapidly to fill market vacuums as you gain experience and credibility.

To summarise, the opportunities for New Zealand businesses in Africa are very big, numerous and long-term in nature. Not surprisingly, so are the challenges and so is the necessary commitment.

## **The Challenges for New Zealand**

The development process behind Africa's rise is mirrored by challenges at home. These arise from global convergence. New Zealand's terrible productivity growth and our weak global linkages amplify these threats.

The key message from my Trotter Lecture in 2009 was that we are living through the age of global convergence; that the rise and increasing ascendance of the West, which began with the industrial revolution, is over.

This historic process is now rapidly reversing as more and more emerging markets adopt the technologies, management practises and some of the institutions that underpinned the West's success. More than 5.5 billion people live in countries with higher growth rates than the G7. Emerging markets now account for 60 per cent of global GDP compared with 40 per cent as recently as 2000.

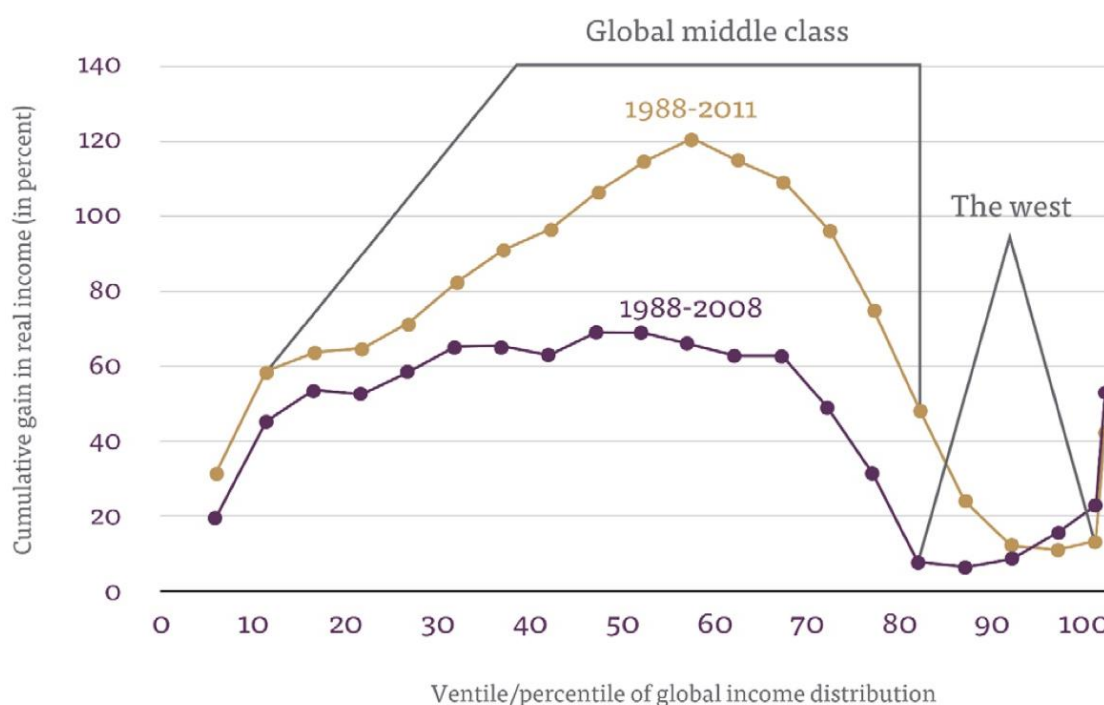
Recently some commentators have argued that convergence is running out of steam because of the slowdown in countries like Russia and Brazil. I don't buy these arguments. In the long-term the biggest drivers for global convergence will be China, India and Africa. In 2030 these regions will be home to 4.6 billion people or 55 per cent of the world's population. Growth in India this year is forecast to accelerate to 7.6 per cent; China is set to grow at 6.7 per cent and I have discussed why I think Africa will achieve high-medium term growth. This sounds more like a tsunami than a slowdown.

## **Global Inequality**

New empirical analysis shows that global convergence is having a profound impact on both the global inequality of incomes and on income inequality within the wealthy countries in the world. The very good news is that for the first time in several hundred years' global inequality of income is falling, particularly since 2000.

A new book by Branko Milanovic provides one of the most comprehensive analyses of changes in global inequality. This maps the dramatic rise in the incomes of what Milanovic calls the "global middle class" since the fall of the Berlin Wall and how this growth accelerated following the global financial crisis.

### Relative Gain in Real Per Capita Income by Global Income Level



This is precisely what I predicted when I gave my Trotter Lecture in 2009.

Most of this new global middle class is from Asia. Importantly, though, even if China is excluded from the analysis convergence is still evident from around 2000.

Milanovic's analysis also highlights that the incomes of the rich world's middle and lower-middle class have been stagnant for the last twenty years. From 2008, that stagnation began extending into the bracket of higher earners in the developed economies.

He also quantifies the emergence of what he calls a 'global plutocracy', the top 1 per cent of global earners. These people have been huge winners from globalisation.

Based on his analysis Milanovic poses a very interesting question: "*[i]f this wave of globalisation is holding back the income growth of the rich world's middle classes, what will be the result of the next wave, involving ever-poorer and more populous countries such as Bangladesh, Burma, and Ethiopia?*" Indeed, and what about India and the rest of Africa?

In the case of New Zealand, detailed analysis suggests that there is little evidence of a sustained rise or fall in inequality over the last two decades. In addition, the share of total income received by the top one per cent of individuals is at the low end of the OECD rankings. My interpretation of this is that New Zealand doesn't have a top tier of professionals actively involved in globalisation so doesn't participate in the global

top 1 per cent. Instead the rise of the emerging markets is constraining income growth right across the income distribution. This is reflected in our dismal performance in productivity and income growth, which I will discuss shortly.

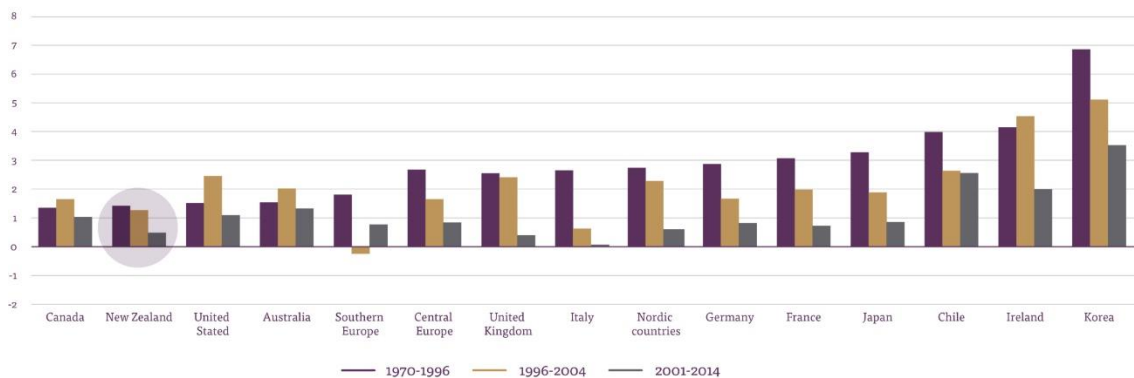
Most rich world voters don't care at all that the world is becoming far more equal. Instead, in the West the squeeze of the middle class and the rise of the top one per cent is resulting in enormous polarisation and political friction together will increasing opposition to free trade.

## Productivity

New Zealand is particularly exposed to the competitive threat from global convergence because of our consistently weak productivity growth.

If there is one thing that economists of all political persuasions tend to agree on it is that productivity growth is the key determinant of future prosperity. In the decade following the Douglas/Richardson reforms per capita income growth in New Zealand exceeded the OECD average. However, apart from this brief respite, New Zealand has been a perennial under performer in the global productivity race.

### Growth in Labour Productivity in Advanced Economies Since 1970

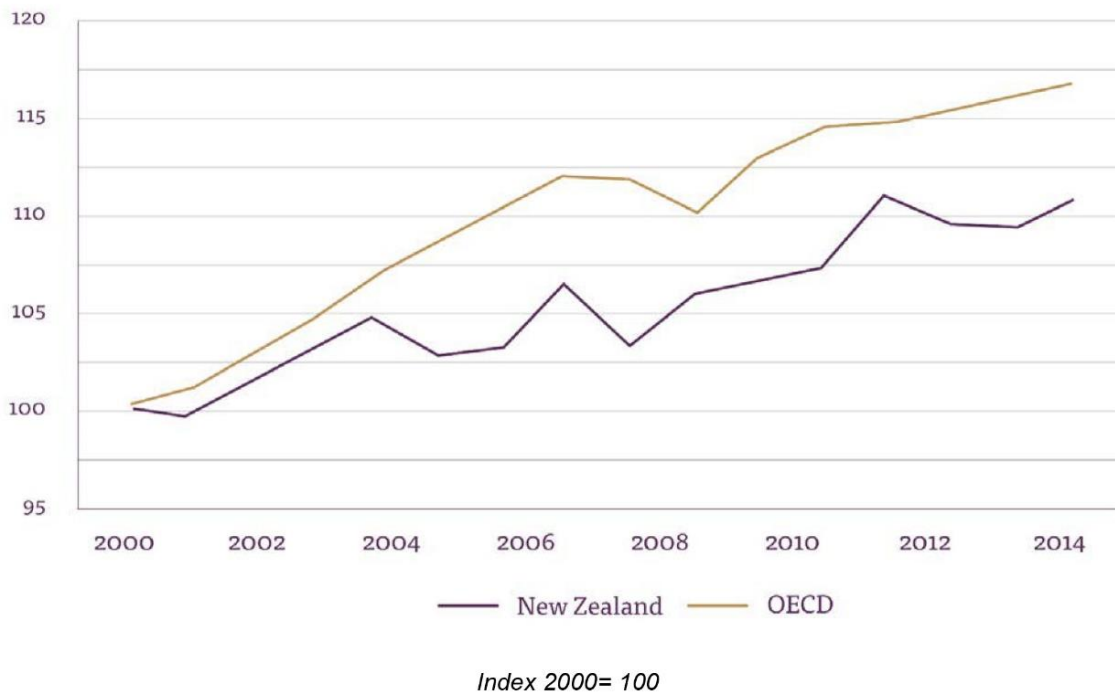


GDP per hour worked, percentage change at annual rate, OECD data

This chart from the OECD compares labour productivity growth in advanced countries; the picture is pretty shocking and would be even worse if we added the major emerging markets. Basically over a period of almost 50 years we have been one of the global laggards in productivity growth. Moreover, our productivity growth has been steadily declining.

New Zealand has performed better in recent years in terms of GDP growth. But to a large measure this is due to high immigration and the significant increase in the hours Kiwis have worked, both in absolute terms and relative to the OECD average, since 2001. Neither of these factors on their own will make a sustainable long-term contribution to the future prosperity of New Zealanders.

**Evolution of GDP Per Person Employed in New Zealand Versus OECD**



The most recent OECD data on GDP per person employed highlights our on-going slippage relative to OECD averages. And the picture would be even worse if allowances were made for the extra hours Kiwis are working. In other words, New Zealand's recent GDP data are masking and deflecting attention from a deep-seated underlying problem.

As the Secretary of the Treasury has said, New Zealand suffers from a productivity paradox. New Zealand has immense natural capital, excellent institutions and outstanding indicators for ease of doing business. We also have a fiscal position and government debt situation that should be the envy of the Western world.

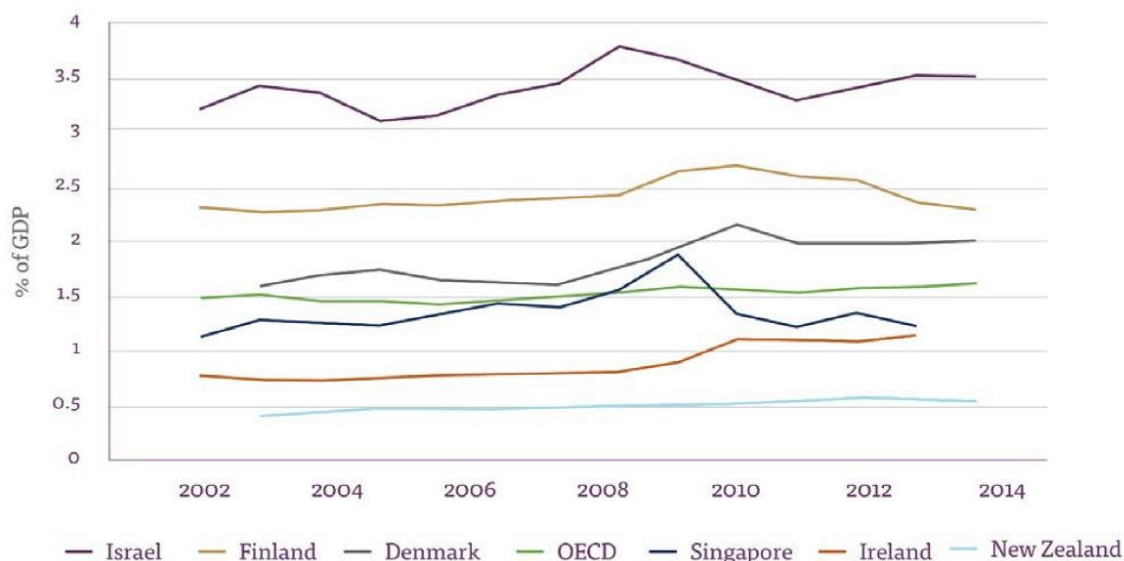
Nevertheless, we suffer from persistently low productivity growth.

Given existing data availability, understanding the precise reasons for this is partly a matter of conjecture. However, drawing on the work of the New Zealand Productivity Commission and other sources I think the following points deserve emphasis.

First, our poor productivity growth does not appear to be due to a low investment in ICT. We are currently at the top of the OECD rankings of investment in ICT as a proportion of overall capital formation.

Second, we have a low level of business expenditure on research and development and the shortfall is almost entirely due to our large businesses. Many of our large businesses are foreign-owned, state-owned or co-operatives. It is generally recognised that co-operatives and SOEs are poor innovators.

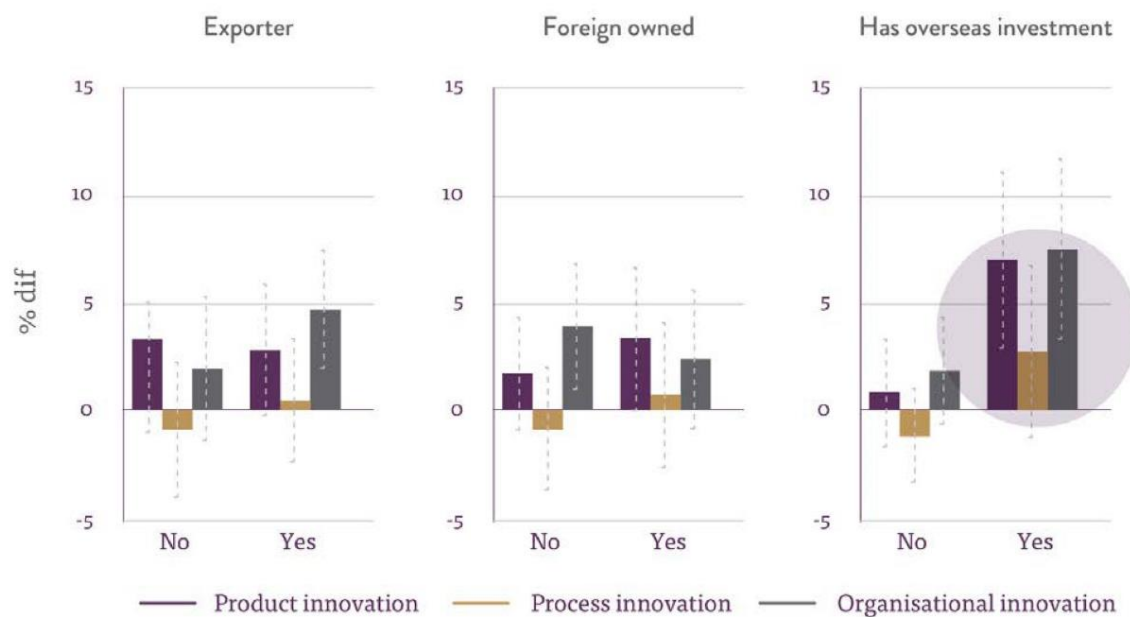
**Business R&D (BERD) as a % of GDP**



*Target to lift business R&D to 1% of GDP (from 0.54% in 2014), Source: Priorities for Innovation Policy, Peter Crabtree*

Third, there is increasing evidence supporting the importance of international linkages. This includes information networks, participation in large-scale value chains and linking those connections into local intellectual capital. Small markets tend to limit innovation. As the below chart from the Productivity Commission shows, our internationally connected businesses are much more likely than other businesses to increase productivity after attempts to innovate.

**Globally Connected Firms Show MFP Growth Through Product or Innovation**



*Relative change in MFP over 3 years by international connectivity*

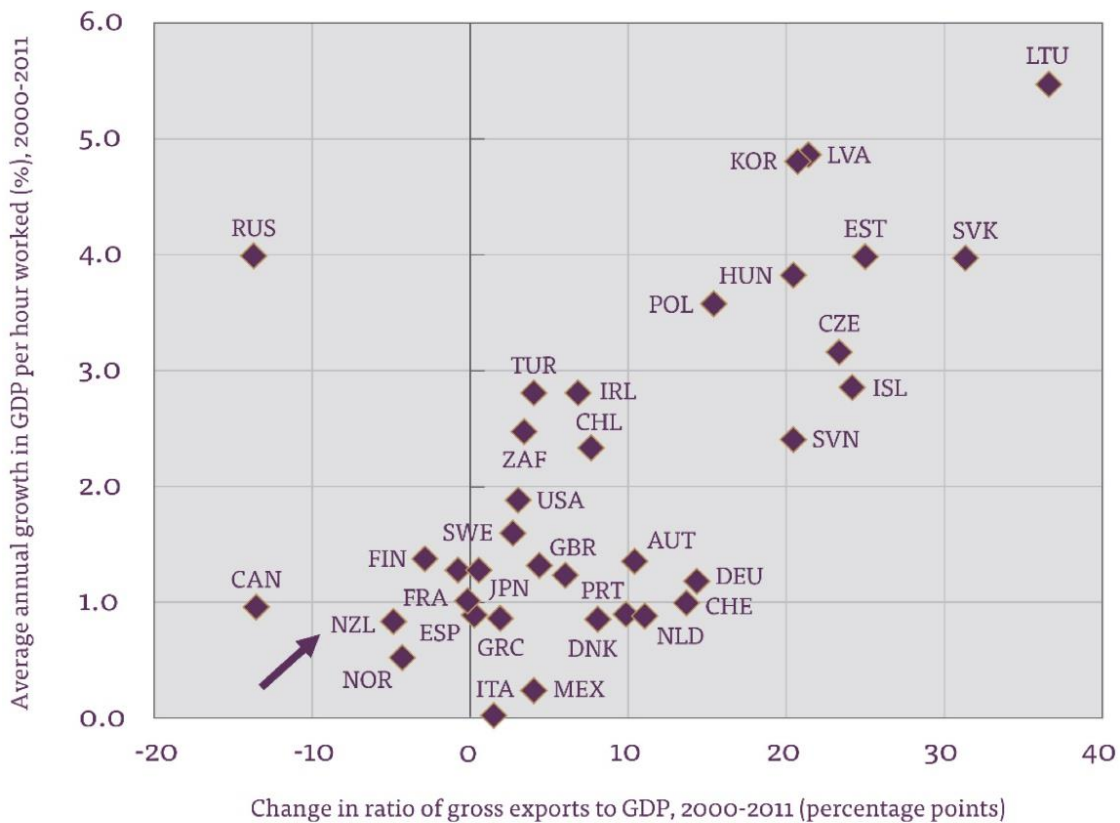
This linkage is particularly strong if they have international investments.

Regrettably, New Zealand's international connectedness through inwards and outwards foreign direct investment has stagnated since 1995, in sharp contrast with the global trend. It is of particular concern that our stock of outward investment has fallen as a percentage of GDP since the early '90s and is now a fraction of the world and OECD averages.

Fourth, and building on the previous point, analysis by the OECD highlights that productivity growth is correlated with increases in the ratio of exports to GDP. Unfortunately, the decline in New Zealand's export to GDP ratio is one of the fastest in the developed world.



Change in Exports to GDP Ratio and Growth in GDP Per Hour Worked



Finally, as also noted by the Secretary of the Treasury, gains in productivity and GDP per capita will increasingly depend on knowledge-based capital. Sadly, in internationally benchmarked tests such as TIMSS, PIRLS and PISA New Zealand students are steadily slipping down the international league tables. All of these tests highlight a decline in reading, science and maths since the early 2000s.

The most sobering, and I would say, frightening, of these are the PISA tests, which are conducted in 65 countries including 34 OECD countries. Between the 2009 and 2012 tests, New Zealand's ranking dropped from 7<sup>th</sup> in reading, 7<sup>th</sup> in science and 13<sup>th</sup> in maths to 13<sup>th</sup>, 18<sup>th</sup> and 23<sup>rd</sup> respectively. Moreover, New Zealand's absolute score declined in each subject while the average OECD scores were relatively stable. These low rankings are not a one off: in the TIMSS 2011 survey, New Zealand's Year 5 students placed 30<sup>th</sup> internationally, beating only 16 countries.

It is particularly concerning that the proportion of students who struggled to answer basic maths questions increased from 15 per cent in 2003 to 23 per cent in 2012. In fact, we have one of the largest gaps in the world between high- and low-performing students.

This is partly due to New Zealand's so-called 'decile divide', with 35 per cent of students in lower decile schools leaving without NCEA Level 2 compared to 12 per cent in higher decile schools. A similar degree of relative underperformance applies to Maori and Pasifika students. And don't think this is somehow 'normal': OECD data shows we have one of the widest gaps between rich and poor when it comes to reading and that this hasn't closed despite increased talk about raising achievement for 'priority learners'. From an equity perspective there are clearly major problems with our education system.

Against this background it is not surprising that in-depth reviews of New Zealand's schools, including those undertaken by The New Zealand Initiative, find evidence of systematic failure in identifying excellent performance and dealing with underperformance. Incredibly, 99 per cent of teachers eligible for annual promotion to the next salary band are promoted after going through a formal appraisal. No wonder the OECD has criticised our appraisal processes.

So what does this all mean for New Zealand? When I gave my Trotter lecture I noted that the New Zealand economy was not performing at all well in the early stages of the era of accelerating global convergence. I concluded that without a change in policy settings and attitudes we would drop further down the global league tables as fast-growing emerging markets leapfrog us. Scarily, despite our strong institutions and considerable fiscal discipline, New Zealand's economic decline has continued at pace.

The balance of the evidence suggests two factors that are critically important for prospering in the current era: first, strong global linkages in trade, investment and know how; and secondly a highly skilled and highly trained work force. New Zealand is performing poorly on both of these fronts and, in my opinion the negative trends are set to continue. Our strong institutions and fiscal policies may themselves come under threat.

What concerns me most is that these factors are reinforcing each other, potentially in a downward spiral. Negligible productivity growth makes it extremely difficult to fund a world-class education system. Weak international linkages reduce our exposure to sophisticated value chains and global know how which reduces the skills and training of our work force. This in turn undermines the demand for top quality education, which further reduces our international competitiveness.

The risk is that this general demise eventually begins to erode our institutions. In 2009 I emphasised the risk of a slide in our excellent standing in corruption rankings; sadly, this is exactly what has happened.

I am also concerned that rising house prices and immigration-fuelled economic growth are concealing the iceberg that lies ahead. If the current negative trends continue the decline is unlikely to be linear; as weaknesses compound each other,

economic or social crises will become increasingly likely. We are sleepwalking to an economically ugly place.

Before making my suggestions about what to do about these challenges I do want to acknowledge that there is much that New Zealand is doing right, some of which is excellent. For example, in the latest World Economic Forum's ranking of global competitiveness New Zealand improved significantly and now ranks ahead of Australia. New Zealand also ranks very highly in measures of economic freedom.

The Key government should also be complemented on its welfare reforms. These have been far-reaching, well thought though and implemented in a manner that built consensus. Fiscal performance has been exemplary from a Western perspective. However, the tidal movement of global change is such that these improvements are nowhere near enough.

In terms of further change, my first and major comment is about leadership. The changes New Zealand needs are fundamental: they require new attitudes; they require the courage to confront deeply entrenched vested interests.

They are about economic efficiency but they are at least as much about social justice. There is nothing fair about our current education system, the gaping holes in our tax base or the affordability crisis in housing. Efficiency and fairness will need to be addressed in tandem. Otherwise social divisions will increase and we will suffer the kind of irrational political discourse afflicting much of the Western world.

There are six critically important areas for reform.

The first and most important is a total overhaul of our education system with the goal of being a top 5 performer globally. This should include greatly strengthening the link between teachers' promotion and pay and their performance. The goal should be to recruit, train and retain very high quality and highly motivated teachers. The current approach to reform is too piecemeal, too akin to central planning and too limited in vision. There should be scope for a much wider range of governance and ownership models, facilitating solutions tailored to the needs of minority groups and disadvantaged children. Much will be learnt by enabling competition between alternative approaches and encouraging experimentation.

Second, there should be a comprehensive review of the tax treatment of housing and capital gains. A basic principle for fair and efficient income taxation is that all income should be taxed equally. The taxation of housing and many other assets in New Zealand does not meet this test. One of the most recent official reviews of the New Zealand tax system was the McLeod Report in 2001. This noted that the current tax treatment of housing distorts investment decision-making and favours richer people over poor. A form of housing tax was considered but rejected because the authors

considered it unlikely to gain political favour, hardly a robust basis for technical advice. The absence of a generalised capital gains tax creates similar distortions and inequities. Capital gains taxes raise relatively complex technical issues but these have been resolved in many other countries. Partial solutions like taxing the capital gains of foreign house owners are a cop out and will create new distortions without addressing the underlying issues.

Third, we need a comprehensive review of the ownership and governance arrangements for the processing and marketing arms of our primary industries. In too many instances, including the dairy industry, the incentives for world-class performance and innovation simply aren't strong enough. I saw first-hand how Fonterra failed to capture a massive market opportunity in Russia while Nestle and Danone built new multi-billion dollar businesses. Group think, over confidence and lack of risk taking is a recipe for New Zealand trade and investment to fail in Africa also. How can near-monopolists create high margin, innovative products that fully leverage New Zealand's natural strengths? How can we have strong global linkages if our biggest exporters aren't entrepreneurial?

Fourth, the government sector including SOEs requires a further round of performance enhancement to increase efficiency and service quality. The quality and effectiveness of services for lower socio economic groups requires massive improvement in a number of areas. All our SOEs should be sold absent overriding competition or regulatory concerns. Also, based on my experience with many Western country's diplomatic and trade missions in developing markets, I believe New Zealand has massive scope for improvement, particularly in new markets. This will be critical to achieving greater international integration.

Fifth, urgent steps need to be taken to address the issues underlying New Zealand's housing crisis. International benchmarks place most New Zealand cities firmly in the "unaffordable" category; the situation in Auckland is particularly acute. This is ridiculous given that less than one per cent of New Zealand is built upon. Moreover, the current regulations favour the old and the rich and make it very difficult for people on lower incomes to own their own home. In fact, detailed analysis of relative income poverty statistics suggest that if New Zealand does have an issue with poverty it is largely due to rising housing costs.

Research by The New Zealand Initiative highlights the importance of planning reforms to free up the availability of land and reduce restrictions on density and height. These would go a very long way towards resolving the affordability mess.

Finally, we need to safeguard and where possible enhance our existing institutional, fiscal and regulatory strengths. This should include streamlining regulation wherever feasible and taking steps to reinforce our strong anti-corruption credentials.

## Conclusion

In summary we are living in the age of global convergence. Africa will play an increasingly decisive role in this process and this presents New Zealand business with tremendous new opportunities.

However, technological change and globalisation also entail major threats for the West. Given our terrible productivity track record and isolation these threats are particularly acute for New Zealand. Failure to address these threats will have very serious economic and social consequences for New Zealand including likely crises. The reversal of our long-term decline will require considerable political courage and very broad structural reform.

As a Taranaki boy raised in the '60s I always find it helpful to think in terms of sporting analogies. So consider these three questions:

1. Do we think it would be acceptable for our international sports teams to aim to be 20<sup>th</sup> in the world or worse?
2. Do we think our athletes should have coaches and training facilities that are worse than the average for their international competitors? And
3. Do we think our sports teams will be winners on the international stage if they have very limited international competition?

Of course not, it would be absurd.

So why should our economy and our businesses be any different?

Thank you.