

The Street View

Actis Macro Forum

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Challenge and opportunity

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Welcome to this edition of Street View. As usual our team looks at investment related issues drawing on local knowledge and global presence. If you're looking for economic forecasts or stock market predictions please look elsewhere. This is the view on the ground and from the street as seen by the Actis Macro Forum and our network of research affiliates.

Nicolas Escallon runs his ruler over Colombia. He points to the growing need for infrastructure investment and economic diversification. For cycling fans like me there is a vivid parallel drawn between the astonishing triumph of 22-year-old Colombian Egan Bernal in the Tour de France and the challenges facing his home nation. We think the hard work is well underway to allow the 4th largest economy in Latin America to continue to win through. Like this prodigious young talent, we recognise there are many mountain passes to cross in the future.

Felipe Villaneda and Juan Garcia from Actis Energy Infrastructure provide an expert view on the development of electricity supply and distribution in Colombia. Their conclusion is that many of the building blocks needed to translate the country's amazing natural advantages into sustained foreign investment are in place. Provided that barriers including tariff reform and (outdated) perceptions of corruption risk can be overcome we can see opportunities in this key sector.

In the June 2019 issue we wrote about the role played by effective onshore savings pools in stabilising volatility. The recent passage of a long overdue pension reform through Brazil's Lower House could mark a turning point for Latin America's largest economy. Our team on the ground, as documented by Felipe Vivacqua, feel that for all the bombast of President Jair Bolsonaro his economic team are making progress on several fronts. Whilst Brazil is a world class generator of false dawns when it comes to reform this latest iteration is off to a good start.

Switching continents, we look at the sustainability of recent rapid growth in Vietnam. Concerns over trade wars pose risks for Vietnam's export led model. But far from being gloomy, Simon Ogus, CEO of DSG Asia and a close friend of Actis, believes Vietnam can continue to benefit from China's rising cost base through relocation of manufacturing foreign direct investment (FDI). Simon focusses in part on the under development of domestic infrastructure and the repositioning of the role of the state as areas where change can yield considerable opportunity.

This is echoed by David Tran from the Asia Real Estate team at Actis. David shares research we have undertaken about the real estate opportunity in Vietnam including logistics as well as housing. His Street View is that the current upswing in Vietnam's real estate market is solidly based on end demand growth and an improving regulatory and financial climate.

Any journey through the emerging markets includes some focus on political risk. Most commentaries tend to focus on these risks as seen from afar. This results in single dimensional views. As with our investments though we try to understand the problems and challenges from the inside out-a type of Street View of how risk may develop.

The Iran/US standoff provides an example of how risks should be perceived from inside and outside of a country. Actis does not invest in Iran but events there could impact the entire world. Understanding this high-risk, high stakes standoff, trigger points and red lines is vital.

A Street View from inside the Iranian government or population is hard to come by. So, we commissioned three external experts to look at the crisis through the lens of Tehran. Timothy Voake, Clovis Meath Baker and Nicholas Beadle have backgrounds in intelligence production and analysis which we believe allow them to provide an insider's view of Iranian priorities and practice. These are their insights and conclusions, but we find them easy to comprehend. No spoilers here-make sure you read their views.



Guest view: Vietnam – will it continue to deliver?

Simon Ogus

CEO, DSG Asia Ltd,
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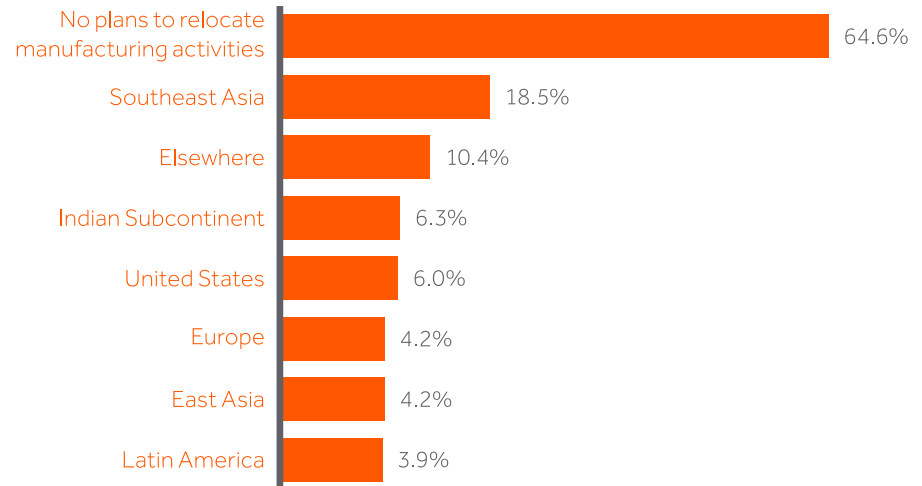
Out of the dysfunction that currently passes for US-China relations, the ASEAN economies (and those of the Indian subcontinent) have a real opportunity to exploit a recalibration of global supply chains that, both predated Donald Trump, and only seems likely to accelerate. Vietnam appears to be better positioned than most, attracting significant amounts of foreign direct investment (FDI) across a wide range of industries. However, can it continue to upgrade its productive and institutional capacities to absorb even greater inflows?

To be sure, not all production is going to move out of China despite an increasingly high cost base and burgeoning (and likely-to-be-long-lasting) trade, investment and security tensions with the US. Although there has been much wasted investment in the People's Republic of China over the years, the physical infrastructure and intricate network of sub-contractors put in place to support global supply chains cannot be easily and quickly replicated. At least not in size with anything approaching similar levels of productivity.

Nevertheless, if even a relatively small percentage of existing production were to decide to up sticks, or marginal decisions for greenfield investments and capacity expansions were to start to move in the favour of other destinations, then the impact on smaller recipient economies would be disproportionately large. Assuming – and this is the key – that absorptive capacity can be expanded concomitantly.

What is absorptive capacity? At the physical level sufficient provision of ports, roads, power and communication networks, as well as the ability to secure usable land for operations. However, while physical infrastructure is a necessary condition, it has to operate in tandem with the requisite human capital. This, in turn, is a function of both education, training and labour laws that while offering necessities of worker protection, also encourage companies to hire in the first place. Finally, the ease of doing business and the greater the certainty in contract and security recourse available, the

Exhibit 1: If you have relocated or are considering to relocate China-based manufacturing facilities to other countries because of the tariffs and/or concerns over the future of U.S.-China trade relations, where are you relocating to?



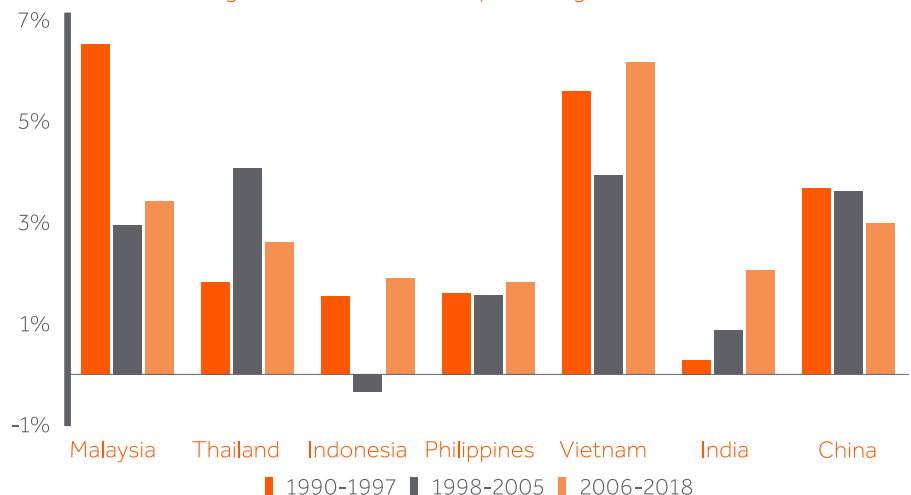
Source: AmCham China

Exhibit 2: Relocating China-based manufacturing by industry

Consumer products	Southeast Asia	33.3%
Other industrial	Southeast Asia	33.3%
Retail & distribution	Elsewhere	30.8%
Aerospace	Indian Subcontinent	27.3%
Technology & telecom hardware	Southeast Asia	26.7%
Automotive	Southeast Asia	25.0%
Chemicals	Southeast Asia	23.1%

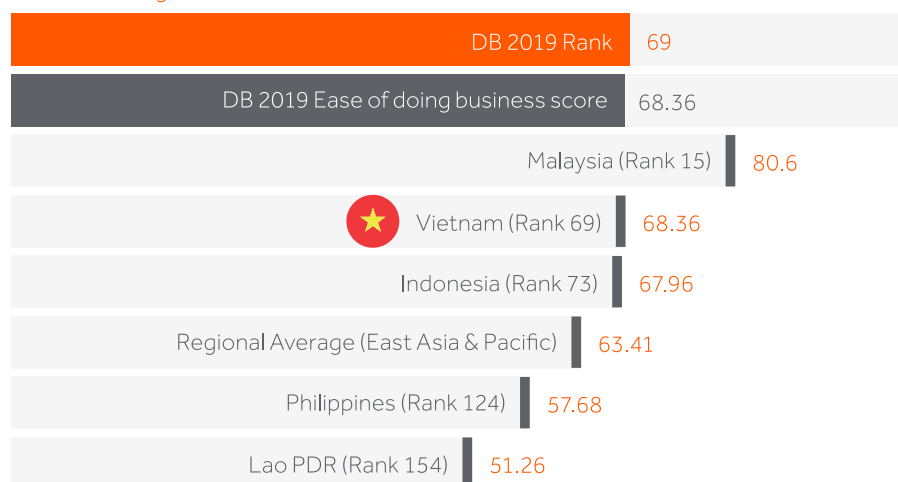
Source: AmCham China

Exhibit 3: Inward foreign direct investment as a percentage of GDP



Source: DSG Asia Limited calculations based on Government and other supranational data sources

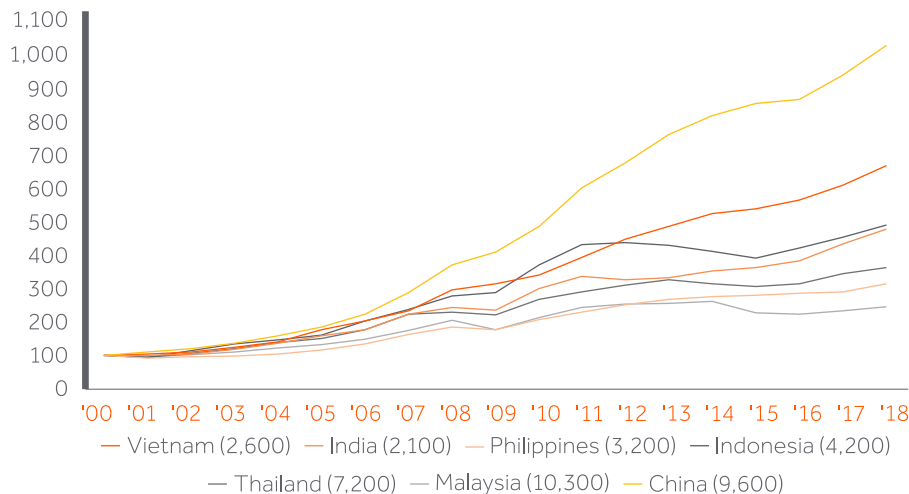
Exhibit 4: Doing Business 2019, Vietnam



Note: The ease of doing business score captures the gap of each economy from the best regulatory performance observed on each of the indicators across all economies in the Doing Business sample since 2005. An economy's ease of doing business score is reflected on a scale from 0 to 100, where 0 represents the lowest and 100 represents the best performance. The ease of doing business ranking ranges from 1 to 190.

Source: World Bank Group, doingbusiness.org

Exhibit 5: Nominal GDP per capita, US dollars, Index 2000=100



Numbers in parentheses: 2018 USD Nominal GDP Per Capita

Source: DSG Asia Limited calculations based on Government and other supranational data sources

greater the likelihood that long-term capital will engage. The ASEAN countries (and India) are certainly being eyed up again by potential suitors as Exhibit 1 & 2 from a September 2018 American Chamber of Commerce in China report suggests¹. Similar surveys of European and developed northeast Asian companies yield similar responses.

Although the survey does not detail specific country relocation plans, Exhibit 3 makes abundantly clear, Vietnam has been the region's FDI darling for the past decade, while the country has risen sharply up the World Bank's "Ease of Doing Business" rankings from 93rd place in 2010 to 69th today (Exhibit 4).

Such inflows have helped propel stellar growth rates, second only to China's over the past twenty years. Yet because

Vietnam was starting from such a low base when the Doi Moi reforms tentatively began in 1986, it remains one of the region's poorer countries with per capita GDP less than a third of China's. There would seem to be plenty more catch-up potential to be exploited (Exhibit 5).

Average wages have been on the rise with companies recently reporting accelerating wage settlements and investment inflows. Nevertheless, wage levels remain less than a quarter of China's while production volumes have risen on average at double digit rates over the last decade, suggesting that unit labour costs have remained highly competitive. Indeed, notwithstanding Vietnam's attractive demographic profile, a greater medium-term risk may arise from burgeoning labour supply constraints – especially as demand for more skilled workers increases (Exhibit 7).

Another potential Achilles Heel is the country's recent inability to further boost investment rates to levels that might facilitate even faster growth. A fixed capital formation rate of 25% is a more than respectable outcome but (non-bubble) rates of 30% or more have been regularly experienced by other rapidly-developing Asian economies over the decades.

There are several explanations why capital formation has been relatively moribund in recent times. Foremost amongst these is the relatively slow clean up of a lending boom gone awry a decade ago. The state-sectors ongoing outsized and distortionary role in credit and other resource allocations hardly helps as well. Subtracting FDI and public investment from the total leaves private domestic investment hovering at only around 10% of GDP. China too recorded similar private investment rates in the 1990s but the state was subsequently willing and able to create the space and conditions for this to rise to nearer 30% today.

None of this is to say that capital has not been successfully mobilised from the ground zero starting point of the late 1980s. However, capital deepening clearly has a long way to run and could be further aided by a state more willing to allow domestic private sector initiatives to flourish, and able to create greater simplicity and transparency in infrastructure procurement and delivery.

1 "Impact of US and Chinese Tariffs on American Companies in China" survey by AmCham China, September 2018.

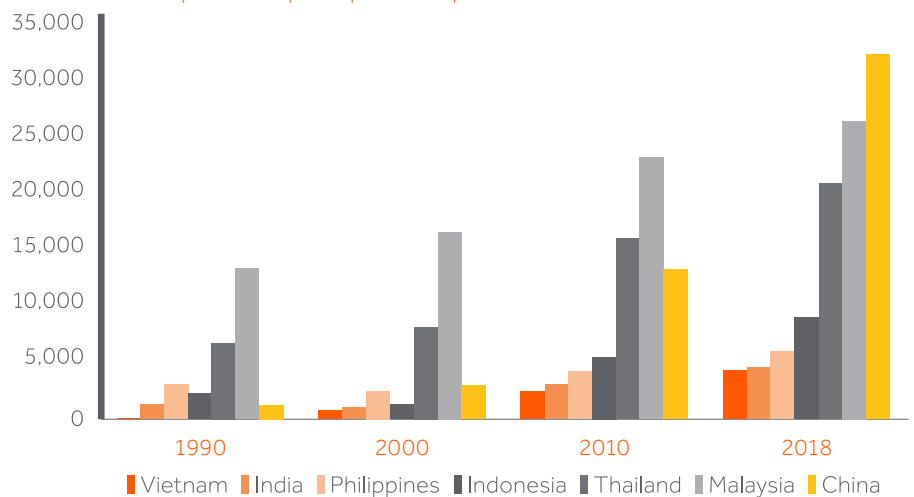


Capital markets development, which would provide alternative avenues for mobilising domestic household savings, could also potentially boost sustainable investment rates further. Currently households largely save via property since the growth of the domestic stock and bond markets remains stunted and, in the case of equities, more akin to a casino than a home for long-term investment. Households have also discovered the joys of consumer credit rather earlier than many of their neighbours and peers. Although ratios of household leverage are not yet, in aggregate, at highly dangerous levels, they do seem rather stretched for a country with Vietnam's low average level of income. This trend will bear watching

alongside the pay back between levels of corporate debt and associated returns on investment (Exhibit 8).

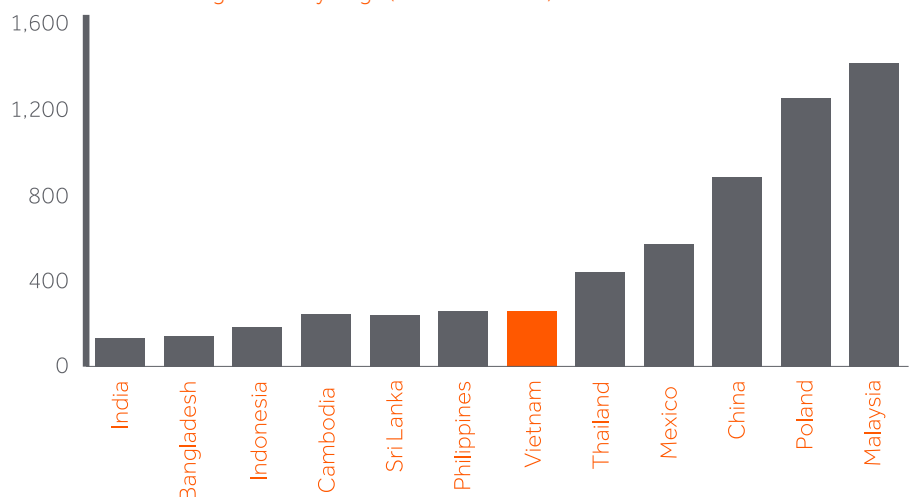
An over-weening government with a strong tilt towards SOEs has arguably constrained the development of the domestic private corporate sector. More positively though, the State *has* been willing to put out the welcome mat and *has* largely kept out of the way of foreign invested enterprises engaged in employment creating export industries. Such an influx of foreign capital combined with Vietnam's young, hardworking and relatively well-educated workforce, has also allowed the country to move up the value-added chain. For example, electronics exports comprised less than 10% of total exports at the beginning of this century; they now account for a third.

Exhibit 6: USD capital stock per capita, 2018 prices



Source: DSG Asia Limited calculations based on Government and other supranational data sources

Exhibit 7: USD average monthly wage (2010-18 CAGR)



Source: DSG Asia Limited calculations based on Government and other supranational data sources

Vietnam has been one of the region's export stars with dollar shipments rising 18% per annum on average over the last decade. This aggregate figure masks a marked bifurcation though: the foreign invested sector now accounts for 70% of total exports and has delivered an annual average rate of dollar export growth since 2010 of 26%; the 30% of exports produced by domestic entities has only compounded at 13% per annum by contrast.

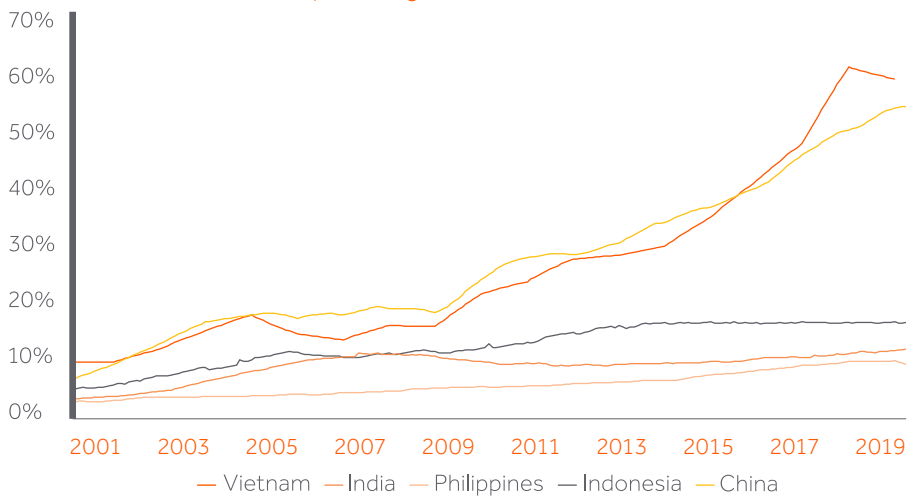
Over the medium-term, it seems fair to conclude that Vietnam has broad potential to further boost its absorptive capacity and its reputation as an attractive destination for FDI. Nevertheless, wholesale relocations of production facilities do not happen overnight and there is growing evidence that Vietnam,

short-term, is also benefitting strongly from other countries re-routing their shipments, especially to the USA (Exhibit 9).

This may be a double-edged sword. 30% annualised growth of Vietnamese exports to America, while laudable on the surface, does not quite smell right and Washington is starting to train its protectionist sights on Hanoi. An overall current account position broadly in balance, and a Dong that does not ostensibly appear particularly cheap, might argue against the Trump Administration's building accusations of currency manipulation. However, when one is dealing with a POTUS who views bilateral trade deficits as *prima facie* evidence of malfeasance, economic logic may take a back seat.

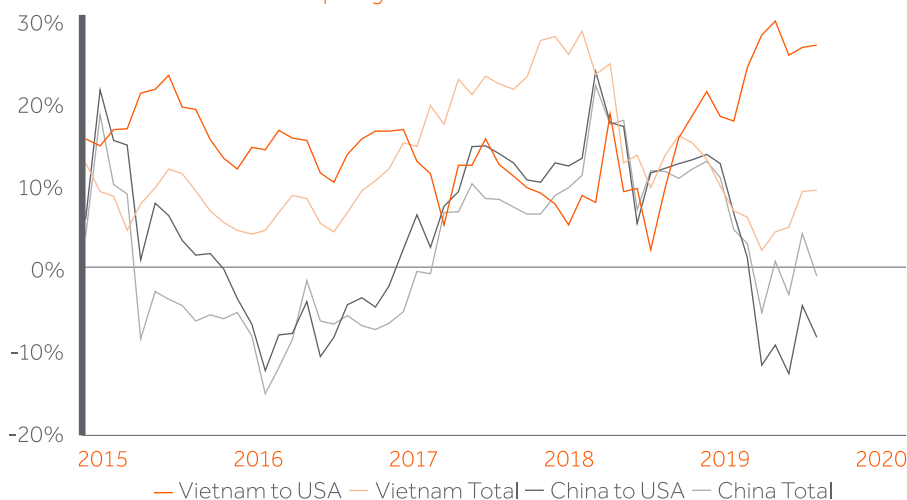
Vietnam can and most probably will make the grade as a fully-fledged emergent economy capable of challenging others in Asia for middle income status. But the pathway is not smooth and external issues as well as the internal challenges of regulation, margins of safety for debt accumulation and the role of the state remain important barriers to overcome in the medium term.

Exhibit 8: Household debt as a percentage of GDP



Source: DSG Asia Limited calculations based on Government and other supranational data sources

Exhibit 9: Vietnam and China export growth

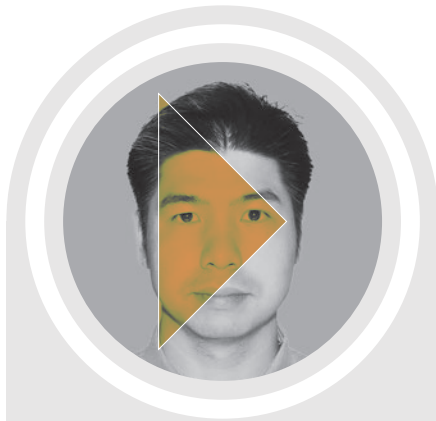


Source: DSG Asia Limited calculations based on Government and other supranational data sources



The Golden Bridge Danang, Vietnam

Street view: Vietnam - building for the future



Please watch this podcast at www.act.is

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Vietnam's real estate market has demonstrated solid fundamentals after recovering from the 2014 downturn. Demand has been good with strong take-ups and robust price increases across all sectors. In Ho Chi Minh City, the economic centre of Vietnam, the residential, office and retail sectors recorded close to full take-ups, with prices and rents on consistent uptrend over the last five years (Exhibits 1 and 2).

The Vietnamese real estate market has gone through three cycles since opening up in 1987. Easy bank credit and speculative demand were the main drivers of previous upswings in 2000-2002 and 2007-2009, which resulted in painful corrections when the government tightened monetary policy. Today's market seems more sustainable due to several factors. First, higher income and better access to mortgages at lower interest rates have significantly improved affordability; enabling the middle class to own a home without government subsidy. Second, developers who have survived the last downturns are now more prudent and realistic - they target fundamental demand. For illustration, the percentage of new supply for grade C apartments, the most affordable category, increased from 36% in 2015 to 58%

in 2018. Total grade C apartments sold increased almost three times in the same period. Finally, learning from past mistakes, the government also introduced new policies and regulations to safeguard the property market. Capitalisation requirements have been increased to deter incompetent developers, buyers' protection with mandatory bank guarantee has been raised and real estate credit directed to serve end-users demand.

While performance has been upbeat across all sectors, the most compelling investment opportunities lie in serving the expanding middle class. Our research identifies pent-

up demand for workforce housing, which we define as apartments that are affordable to the 50th to 70th percentile of the population by income. Supply in this segment is now close to full take-up after taking into account projects under construction. Middle-income retail is also an important theme in targeting the increasing purchasing power of the middle class, which has driven retail sales growth averaging 11% p.a. over the last five years. Just as vital, real estate for logistics is a major theme benefiting from the conjunction of high economic growth, e-commerce proliferation, and the relocation of more manufacturing facilities and/or supply chain to Vietnam.

Exhibit 1: Residential - strong absorption

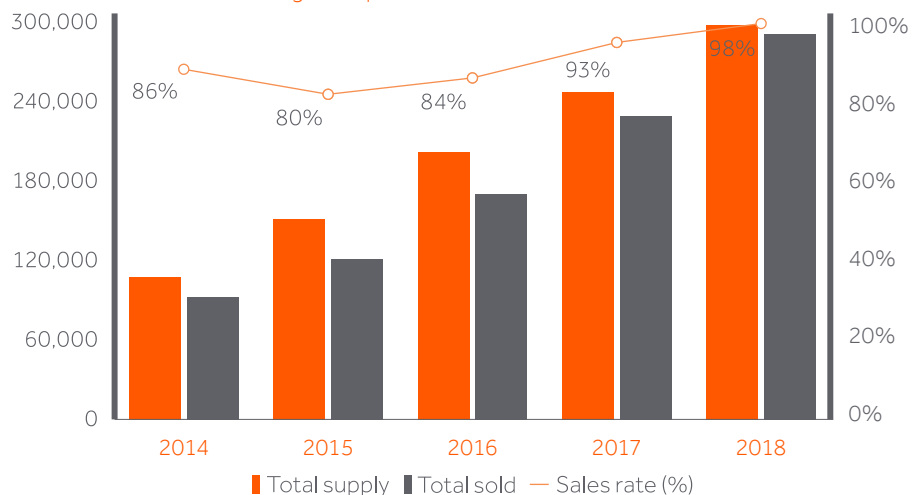
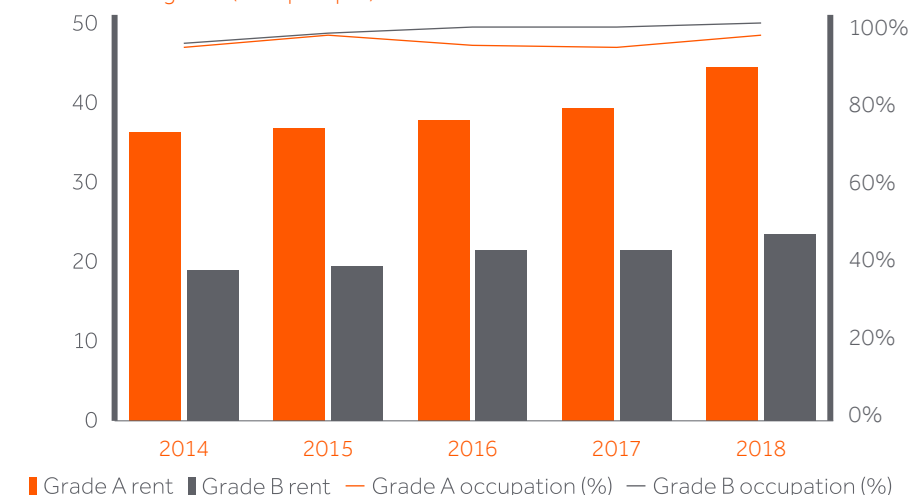


Exhibit 2: Asking Rent (USD psm pm)



Source: Savills, CBRE, Actis Asia Real Estate analysis

Although Vietnam's real estate market offers many good opportunities, there are also challenges. First, the process of land acquisition and securing project approvals is cumbersome and time-consuming. Second, major infrastructure projects, such as roads and bridges, are usually behind schedule, hampering projects that rely on them. Working with competent and credible local partners is crucial to acquiring land with clean titles at fair values and effectively navigating the relationship with local government.



Guest view: Understanding Iran

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The West often finds Iran hard to understand – a revolutionary theocracy yearning for an Islamic past, yet at the same time an educated society able to develop an indigenous nuclear programme in the face of forty years of sanctions. As tensions mount in the Gulf, how events turn out will rely to a large extent on how the Iranian leadership in Tehran sees the world. In common with the importance placed on understanding the “street view” in markets in which it invests, Actis believes that looking inside out often makes more sense than relying on the view from afar.

The US withdrawal from the Joint Comprehensive Plan of Action (JCPOA) followed by additional sanctions targets structural and behavioural changes beyond restricting the Iranian nuclear project. Iran must counter this or risk losing influence in the region which it sees as vital for her security. If Iran fails to keep China, Russia and Europe onside, the JCPOA UN sanctions that were lifted as a part of that agreement would snap back into place. This could well lead to a long-term stand-off with the US risking economic collapse which will bring about the same result and provoke internal instability.

The situation is finely balanced: Iran's current policy choices threaten to push France, Germany and UK (E3) towards the US position. Tehran calculates that recent meetings and the promise of further dialogue will be enough to prevent that for

Exhibit 1: Export destinations (Total: \$53.7B)

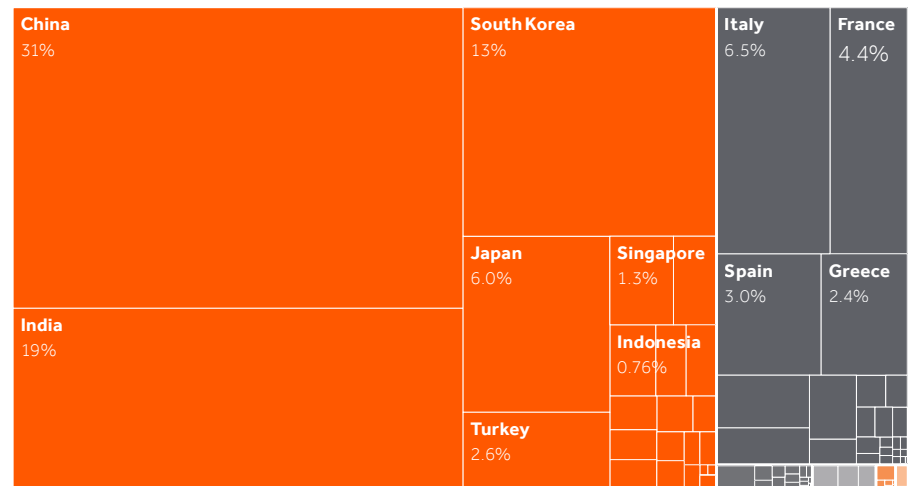
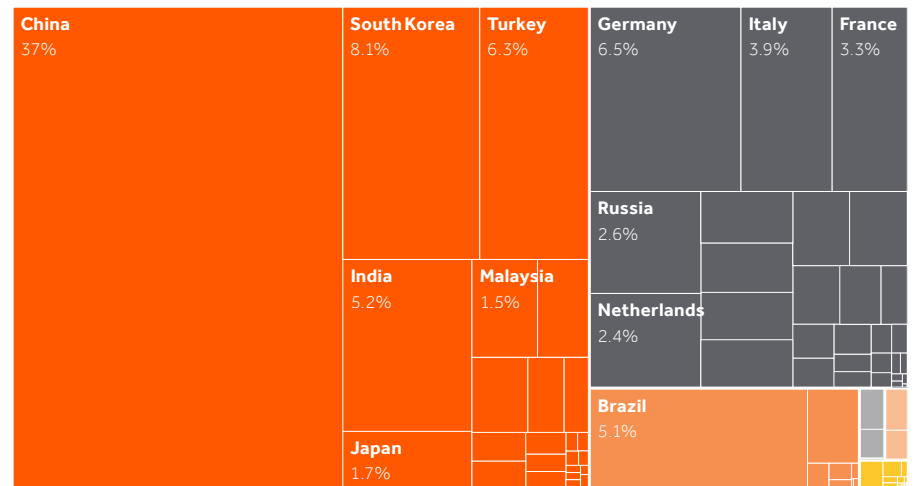


Exhibit 2: Import origins (Total: \$49.9B)



Source: OECD

now. China and Russia will resist moving to the US position for wider geo-political reasons.

A SWOT analysis, *as seen from an Iranian perspective*, and data on the economic realities highlight some interesting policy options.

Strengths

Relative size – Iran is big, as big as the UK, France, Germany and Italy combined. Its population is approximately 82m, similar to Germany, but with a much younger profile with 50% of the population under 30. Iran sees itself as the natural regional leader.

Leadership of the Shia world – Iran is one of the few majority Shia countries in the world (Iraq being the other big one) and is the avowed leader and supporter of Shia minorities all over the Muslim world.

These minorities are Iran's natural allies, which Iran can use as proxies to destabilise Sunni-led countries which oppose it.

The Shia crescent – Iran can send men and materiel overland on the route Iran-Iraq-Syria-Lebanon in order to supply its most effective, and oldest, ally, Lebanese Hezbollah, as well as reinforce the Syrian regime and influence Iraq.

Internal stability – The émigré opposition have almost no support inside Iran, and domestic opposition is contained and suppressed by the security forces. Divisions of view between 'hardliners' and 'moderates' in the ruling elite will disappear if the regime is under threat.

The nuclear programme – In the long term a nuclear weapon will ensure Iran is never defeated militarily like Iraq and Libya. Even reaching the stage of nuclear ambiguity

would be a safeguard against a US attack. North Korea stands as an obvious example of this belief.

Oil – Iran has about 10% of the world's proven oil reserves. Energy is cheap, and hard currency earnings from oil exports make Iran's economy potentially strong.

The IRGC and hybrid warfare – Iran has developed a range of aggressive techniques and tactics just short of conventional war which make it a regional power. Examples include cyber, use of Shia proxy groups (in at least Syria, Afghanistan, Yemen, Lebanon, Iraq and Syria), missiles, drones, special mines, small boat swarm tactics.

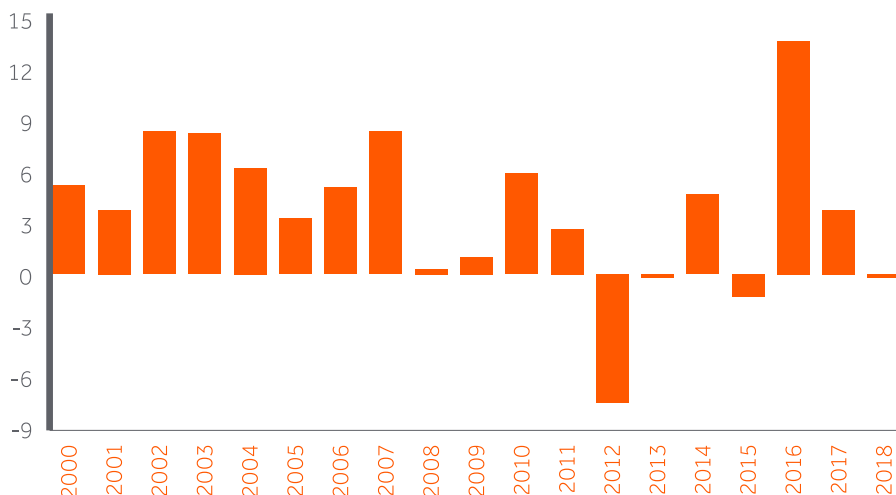
Weaknesses

The economy – has tanked, largely as a result of sanctions. The latest US measures have had a severe effect, targeting corporations that have significant trade with Iran, including in oil and banking. Many Western companies have shelved investment plans for the foreseeable future, whilst China is attempting to focus on domestic companies with no US exposure. Total, for example, reluctantly scrapped its investment in the South Pars gas field, its position being taken by CNOOC.

Historical sanctions have cut the economy off from international debt markets leaving low levels of overseas debt. Overall debt to GDP is a modest 35% which is likely sustainable given limited levels of government spending (25% of GDP), domestic financial repression and fiscal inflows equally balanced between oil and non-oil revenues. But there is limited room for anti-cyclical deficit spending which leaves the door open to internal unrest, particularly in a scenario where the economy contracts in line with IMF projections.

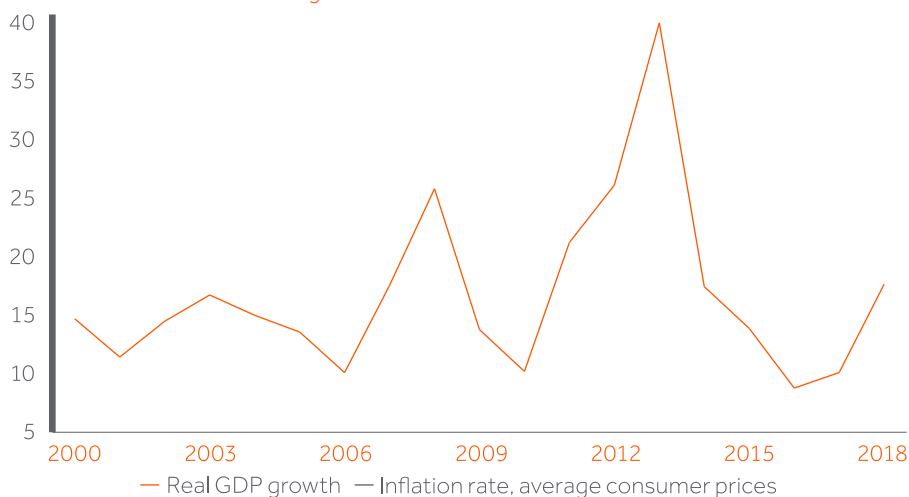
Like much of the Middle East, Iran has seen China and India as their main growth customers for hydrocarbons, but with wide ranging Chinese imports from consumer goods, to railways the domestic economy has seen little diversification away from oil and its derivatives (>80%).

Exhibit 3: Iran Real GDP Annual Growth %



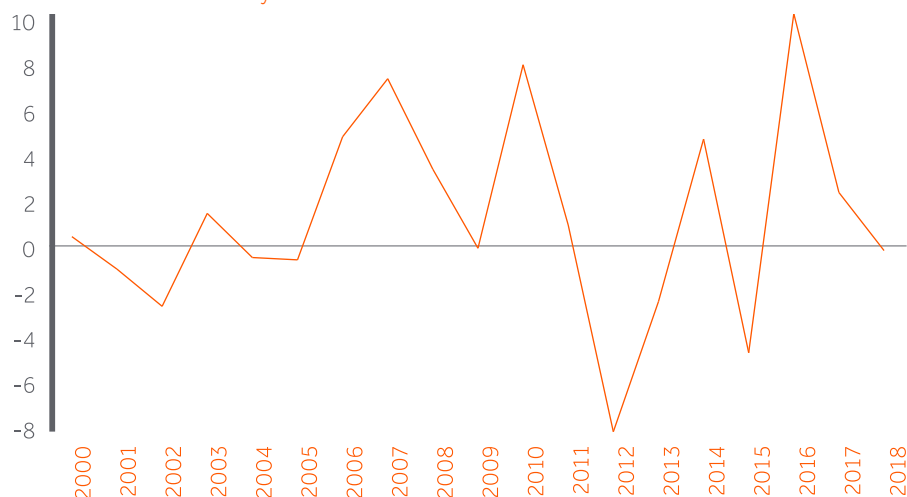
Source: Oxford Economics

Exhibit 4: Iran Inflation % change YoY



Source: Oxford Economics

Exhibit 5: Iran Productivity Growth % Year



Source: Oxford Economics

Exhibit 6: **Top Trading Partners of Iran (2017)**

China	19.5%
UAE	16.8%
EU	16.3%

Source: EU

Lots of enemies and no strong allies – Iran is seen as a major threat by most of its neighbours, particularly the Gulf Arab states. It has no big power ally – although China and Russia have interests in Iran, they were both full signatories to the Iran nuclear deal and both see radical Islam as a threat. Iran's only full ally is Syria.

Weak conventional defence forces – Although Iran has bought arms from Russia and China, Iran's defence forces cannot take on the US using conventional means.

Opportunities

Divide the West – If the US is isolated it will be hard for it to attain its goals except through very unpopular direct military action.

Get closer to Russia and Turkey – Russia and Iran are on the same side in Syria, where Russian intervention shows how far Putin will go to thwart the US.

China – China sees Iran, with a deep history of trade, as a long-term link for Asia to the Persian Gulf and onwards to Europe. It will oppose US military action against Iran but will not act as a guarantor of security.

Threaten the GCC countries – Destabilise the UAE economy or attack the Saudi oil economy through proxy terrorism. The IRGC has threatened to escalate violence across the region if Iran is attacked.

Block the Strait of Hormuz – Either selectively to some countries' ships, or to all commercial shipping. Whilst this would provoke an international response, it would not lead to the invasion of Iran. This would only be worth doing if Iran's oil exports were already blocked, otherwise Iran would be blockading itself.

Terrorist attacks – in Western Europe by Hezbollah. These would be deniable but would make the European electorates question why they were getting sucked into a dispute with Iran.

Threats

The US – The US will never accept the Islamic regime in Tehran. To accept Pompeo's 12 demands would be a surrender of sovereignty which no state could accept. A combination of sanctions, cyber attack, and limited conventional strikes to destroy elements of Iran's defence forces could bring Iran's formal economy to a standstill. The US believes a failing Iranian economy could result in civil unrest and threat to the regime.

United pressure from the international community – was what forced Iran to accept the 2015 nuclear deal. If that international consensus were re-established, and became harder line, it would be problematic for Iran.

Iranian policy options

Iran will feel there is no good deal to be done with the US but recognises the *status quo* is not sustainable. Therefore, something needs to change.

The balancing act - If the big powers remain disunited on their policy Iran has a much better negotiating position. Therefore, Iran must not inadvertently bring them together in a way they did in 2015.

China, France, Germany, Russia and UK (in Iranian trade order) continue to support the JCPOA accord but each has a distinct set of national interests to support. Iran calculates they will not abandon the nuclear deal without a credible alternative.

Pressuring the European countries to make up the economic shortfall of US sanctions by threatening to reduce compliance still further may go too far. They risk one of the E3 triggering the dispute resolution process that

could result in a 'snapback' of U.N. sanctions. Iran, supported by Russia, is demanding that crude oil is included in the EU mechanism (INSTEX) for avoiding sanctions.

In a similar vein, further action against shipping in the Strait of Hormuz risks pushing the E3 towards the US position.

Tread carefully - with China, urge increased oil trade and bank the Chinese commitment to a big Belt and Road Initiative investment. China is supporting the export of Iranian oil, but their official imports of Iranian oil are at a three-year low, reflecting perhaps China's concern over the US trade war.

Succeed with Russia - Part of that would be to win the war in Syria. It would mean a stronger block of mutual support. Turkey's rapprochement with Russia, means there may be a deal to be done there.

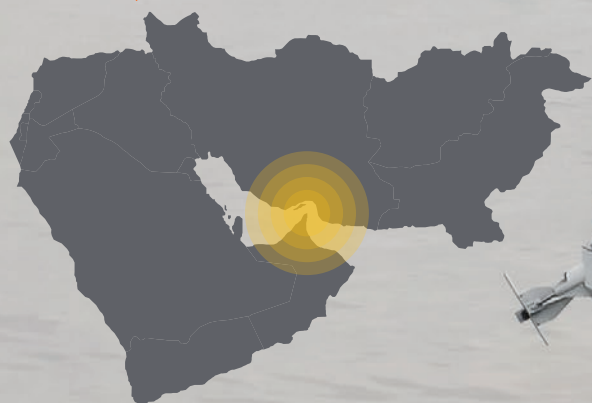
Demonstrate regional reach – Iran will continue to build its strengths, in war technologies, in regional alliances, and through support for Shia militias. The US has been unable to stop this; Hezbollah in Lebanon and the Houthis in Yemen have got stronger over the past 10 years.

More radical options - If faced with unbearable pressure on the economy, Iran has many options for causing disruption in the West, through cyber and/or terrorist attacks, further disrupting the Strait of Hormuz, and as a last resort, a regional conflict with Israel. Iran feel they would survive a regional conflagration, albeit at a heavy price, but the Gulf monarchies would be more vulnerable to revolution from within.

Think long-term - The nuclear programme is seen as essential as a long-term guarantee of Iran's sovereignty. In the shorter-term, elements of it are a useful bargaining chip, but not to be given up entirely.

In summary, the key question is whether Iran buckles under extreme pressure or lashes out. US policy assumes a rational reaction with concessions made to relieve economic pressure rather than risk internal unrest and regime change. This ignores the nationalist ideology of the revolutionary elite running Iran and their successful deployment of asymmetric offsets which the US finds difficult to counter. Red lines for the US would be targeting of US military personnel or closure of the Straits of Hormuz. Tehran's line in the sand is US military strikes on Iranian territory. Crossing one or either of these positions would represent an immediate and noticeable escalation of current levels of political risk with far reaching implications beyond the Middle East.

Exhibit 7: Map of Straits of Hormuz



Prof. Nicholas Beadle

Nick is a former private secretary to successive Secretaries of State for Defence and a cross-Whitehall senior adviser on policy for operations. He led the Cabinet Office Afghanistan/Pakistan Strategy and Communications teams from 2008-10 and served in Baghdad in 2004-05 as the coalition's senior adviser to the Iraqi Ministry of Defence. He has also worked in No10 and the FCO, and on NATO, European Union, and UN policy. His final post before retiring from the Civil Service was in the National Security Secretariat on the Government's response to the Libya uprising. Nick became a Senior Associate Fellow of the Royal United Services Institute in January 2012. Nick is a founder member of the Risk Officer's Number, an empirical approach to economic and geopolitical risk.

Clovis Meath Baker CMG OBE

Clovis Meath Baker was seconded to GCHQ as director of intelligence production from 2010-13. Prior to this he filled senior Foreign Office roles dealing with the Middle East, counter-proliferation and Iran, and regularly attended meetings of the National Security Council, the Joint Intelligence Committee, and COBRA. He has served abroad in Afghanistan (the first time during the Russian occupation, the second time immediately after the fall of the Taliban regime), Czechoslovakia (during the Velvet Revolution), Turkey, Pakistan and Iran. He is an Associate Fellow of the Royal United Services Institute. Clovis is a founder of the Risk Officer's Number.

Timothy Voake

Timothy is the CEO of Voake LLC and was previously a founder of Eddystone Capital, a long/short equity hedge fund based in New York. Prior to this he was a Managing Director at HSBC, heading Asian and Emerging Markets equities in the US. In 2015 he was made a Consultant Fellow of the Royal United Services Institute. Tim is a founder of the Risk Officer's Number.

Colombia: Cycling upwards

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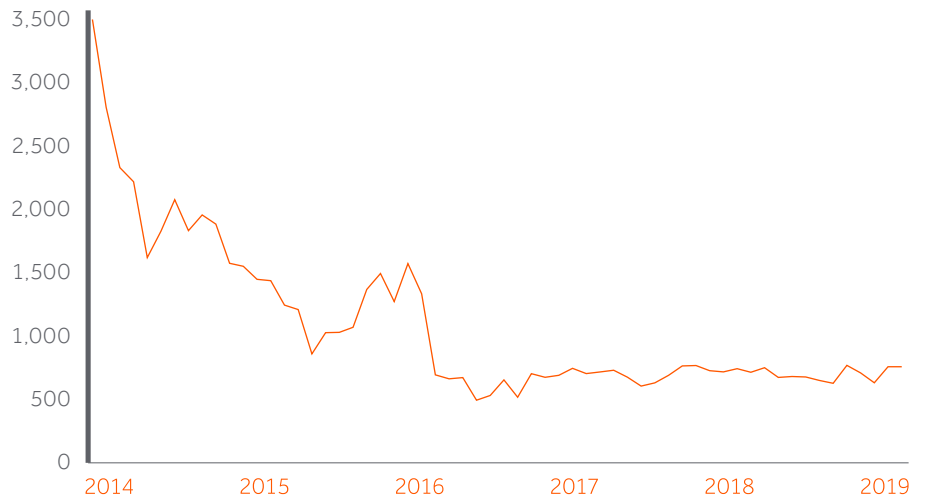


On Sunday 28 July 2019, Egan Bernal, an unassuming 22 year old from the small town of Zipaquirá, Colombia, achieved a highly improbable, others would say impossible, feat. He became the youngest winner of the Tour de France in the last 110 years, and the first ever South American to win the mythical cycling event. From incredibly humble beginnings – Egan trained on a hand-me-down steel framed bike in his early career – the young cyclist was shaped against consistent adversity in his youth, ultimately leading him to crown Col del'Iseran, the highest paved mountain pass in the French Alps and the preeminent obstacle in the Tour.

Colombia, the land of Gabriel Garcia Marquez's magical realism, is no stranger to improbable feats. With a population of 50 million and as Latin America's fourth largest economy, Colombia is a core emerging market today. It has recently earned OECD status, following Chile and Mexico's footsteps, and maintains an investment grade rating on the back of decades of orthodox macroeconomic policy and stable democratic rule. Colombia is the only Latin American country to have had no political coups in the last century and to have never defaulted on its debt. It has come a long way since its civil-war-torn past. Nearly two decades of consistent growth have more than halved poverty and made Colombians as prosperous as its more developed emerging market peers.

However, the country faces its own mountain pass. Three decades of oil discoveries and bountiful production, pioneered by Ecopetrol and subsequently by junior players, have made Colombia's economy excessively reliant on the commodity. Over half of the country's exports rely exclusively on oil and coal, two out-of-fashion products with an uncertain demand outlook. This has caused latent fiscal weakness, significant exchange rate volatility, recurring current account deficits, and increased foreign currency indebtedness, all held hostage by commodity price swings. All this amidst a forecast of dwindling domestic oil production, which could make Colombia a

Exhibit 1: Colombia oil exports (USDm)



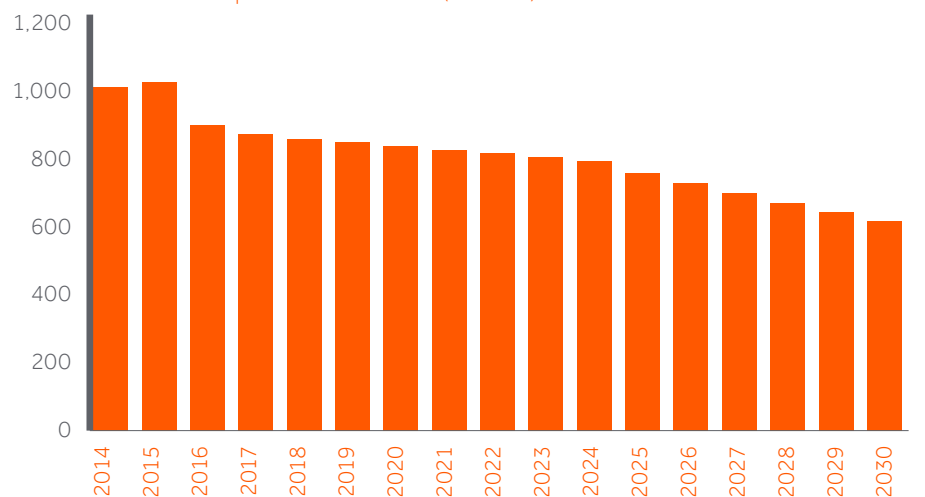
Source: Bloomberg

Exhibit 2: Colombia coal exports (metric tonne)



Source: Bloomberg

Exhibit 3: Colombia oil production forecast ('000b/d)



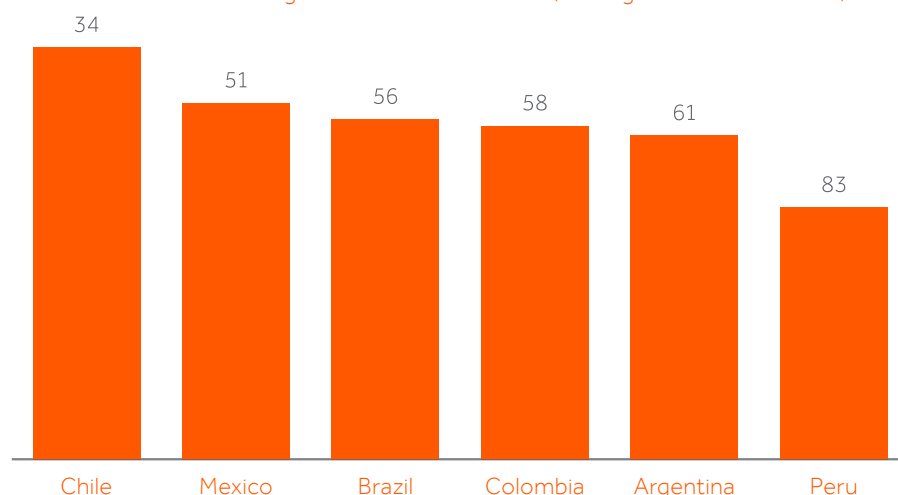
Source: Oxford Economics

net importer by 2030. The country has one key mission; it must successfully diversify its economy away from oil and coal.

The good news is that there are a series of identified policies and measures to achieve this and to battle the symptomatic weaknesses that oil-reliance has created. In particular, three actions are paramount: i) overcoming infrastructure bottlenecks that impede economic diversification, ii) implementing fiscal reform that provides solid ground to push forward a diversification agenda, and iii) proper implementation of a peace agreement to foster economic activity across the territory. The troubling news is that this requires significant political capital. One year into his term, Ivan Duque, Colombia's young, centre-right, technocratic President, has lacked the political skill to implement this agenda. A protégé of former President and now Senator Alvaro Uribe, Duque has often fallen hostage to larger political forces at play, which have impeded swift action on these three fronts.

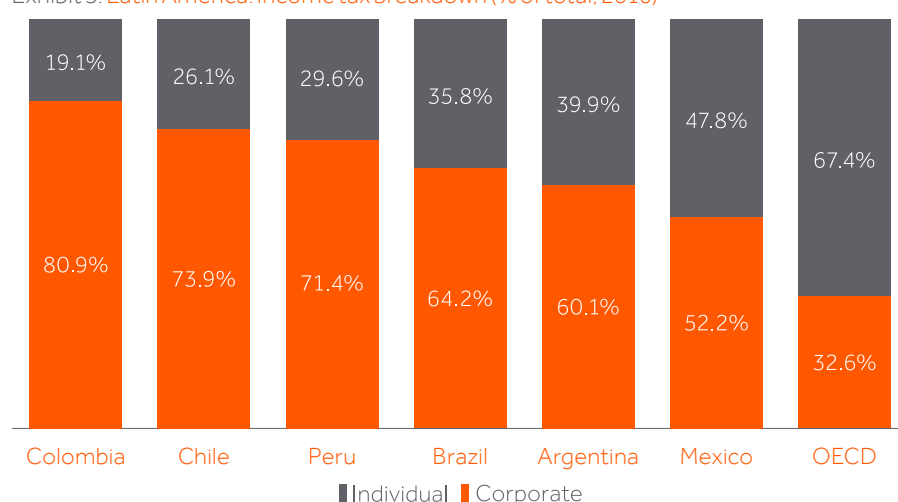
With a highly fragmented geography, it is not surprising that Colombia has significant transport infrastructure gaps. The Andes break into three separate mountain ranges in the country, creating a dramatic topography. The same mountains where Bernal trained also create severe logistical barriers for Colombian entrepreneurs to get their product across the country and overseas. As an example, an emblematic 90 km two-lane mountain pass ironically called "La Linea" (The Line) which connects the Pacific port of Buenaventura with the capital Bogota often takes 5-10 hours for truckers to cross. This has impeded cluster formation and economies of scale hindered the creation of new productive industries and raised costs for exporters.

Exhibit 4: Latin America: Logistics Performance Index (ranking out of 160 countries)



Source: World Bank

Exhibit 5: Latin America: Income tax breakdown (% of total, 2016)



Source: OECD

The country has the most to gain from transport infrastructure investment out of all its Latin American peers based on several studies. An emblematic road initiative called 4G, fostered by the prior president and launched in 2014, set out

to tackle this challenge. Thirty projects came up for tender in total. Five years later the initiative has had some success but has also had challenges. Several projects were mired in the Odebrecht corruption scandal, and the contract and risk

Exhibit 6: LatAm Macro View 2018

	Population, total	GDP, real, annual growth	GDP per capita, real, US\$, constant prices	Gross government debt (as a % of GDP)	Reserves, foreign exchange, US\$	Electricity Consumption Per Capita (MWh/capita)	Road Density (per 100 sq KM)
Brazil	209,673.5	1.1	8,478.4	77.2	371,934.0	2.5	18.6
Colombia	49,538.0	2.6	6,287.5	50.8	46,087.0	1.4	18.8
Mexico	126,362.2	2.0	9,919.0	46.8	165,197.0	2.3	19.1
Peru	32,538.0	4.0	6,521.1	26.7	57,930.1	1.5	10.0

Source: Oxford Economics, IEA, Land Portal

structures offered failed to attract broad foreign investor and lender participation resulting in construction delays. The administration needs to take note of this first round's shortcomings to accelerate the creation of a robust transport infrastructure network.

Creating the conditions for diversification is costly. Strong fiscal coffers with adequate ammunition are required to drive infrastructure investment and other diversification policies such as President Duque's "Orange Economy" (a battery of policies aimed at fostering the tech and creative industries). Furthermore, oil and mining production, which today provide c. 20% of fiscal revenue, are subject to evaporating over the next decades and must be substituted. The country also faces additional cost pressures in dealing with the wave of Venezuelan migrants, now estimated at over two million, coming in through Colombia's eastern border and driven by its neighbour's internal crisis. As is often the case with fiscal matters in any economy, Colombia's regime is born out of political compromise. Well-intended and comprehensive reforms enter Congress only to come out as a patchwork of insufficient policies. The last one of these took place in 2018 and also fell short of its ambitions. Colombia has progressed mildly to relieve the massive fiscal burden it places on corporations vis a vis individuals (c. 80% of tax-take is provided by corporations vs. 33% on average in OECD peers). High levels of economic informality, tax regime complexity, and excessive exemptions make the system suboptimal. This must be addressed in order to create a strong fiscal position from which to drive diversification policies.

Finally, diversification must stem from all corners of the country. In late 2016, the government signed a peace agreement with revolutionary armed forces FARC ending a 60-year conflict. There are multiple theories on what the much awaited "peace dividend" will bring for Colombia, with optimists stating it could increase structural long term GDP growth by as much as 30-50 bps. Meanwhile the short-term costs of implementation of the agreement are high, with over 70% of these borne by central government. Achieving a lasting peace will require thorough implementation of a peace accord, which in turn requires significant funding and political will.

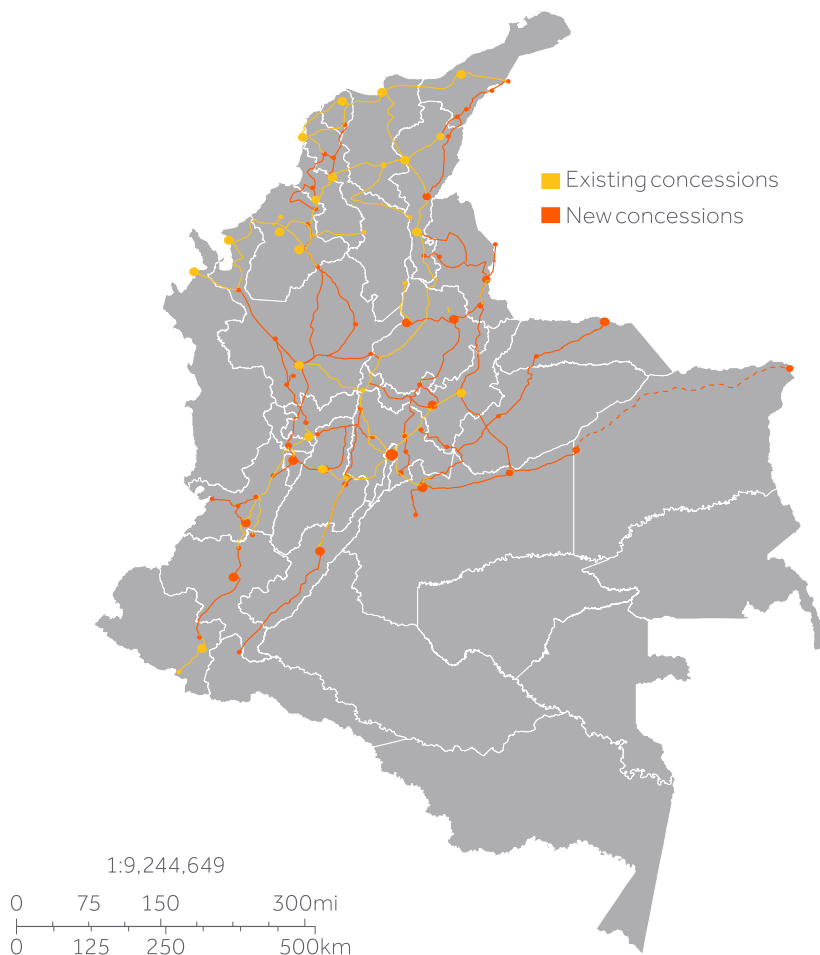
Exhibit 7: Doing Business 2019, Colombia

DB 2019 Rank		65
DB 2019 Ease of doing business score		69.24
	Colombia (Rank: 65)	69.24
	Peru (Rank: 68)	68.83
	Brazil (Rank: 109)	60.01
	Regional Average (Latin America & Caribbean)	58.97
	Argentina (Rank: 119)	58.80
	Ecuador (Rank: 123)	57.94


Note: The ease of doing business score captures the gap of each economy from the best regulatory performance observed on each of the indicators across all economies in the sample since 2005. An economy's ease of doing business score is reflected on a scale from 0 to 100, where 0 represents the lowest and 100 represents the best performance. The ease of doing business ranking ranges from 1 to 190.

Source: World Bank Group, doingbusiness.org

Exhibit 8: Road Concessions



Source: Agencia Nacional de Infraestructura

An aerial photograph of a mountainous region in Colombia. A winding road snakes through the steep, green and brown hillsides. The terrain is rugged, with exposed soil and sparse vegetation. A river flows through the valley below the road. The lighting suggests late afternoon or early morning, with long shadows and warm tones.

Like Egan Bernal, Colombia and its President face their own versions of an upcoming Col de l'Iseran on the horizon. In its push to successfully diversify the economy and enable Colombia to continue on its solid trajectory, the country must relentlessly prioritise its policy objectives and leave aside less fruitful political bickering. Meanwhile, President Duque must learn quickly from his first year in office and garner the political support for his well-oriented policies. This might involve some key cabinet changes and a willingness to step down from his technocratic pedestal to engage with his political reality. Let's hope that like Egan, he is sharpened by adversity too.

Street view: Colombia – from river hydro to smart grid



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Enjoying steady year-round sunshine, heavy rainfall, significant oil and gas reserves, and exceptionally strong winds along its northern coast, Colombia is a dream-come-true for power generation. Growing prosperity and reduced security risks since the early 2000s have significantly boosted private consumption, industrial output and energy demand. However, there is still substantial room for energy demand growth, as evidenced by comparing energy consumption per capita across the region.

On paper, investment in Colombia's energy infrastructure should have been an attractive opportunity for international players decades ago. However, Colombia's energy agenda has been behind that of regional peers since before the turn of the millennium. Even though the government made, and continues to make, efforts to implement bespoke investment initiatives to accommodate concerns from foreign players, this has been a decades-long process of trial and error. Progress has been made though, and foreign investors have responded accordingly. Today, the government is keen to promote further privatisations.

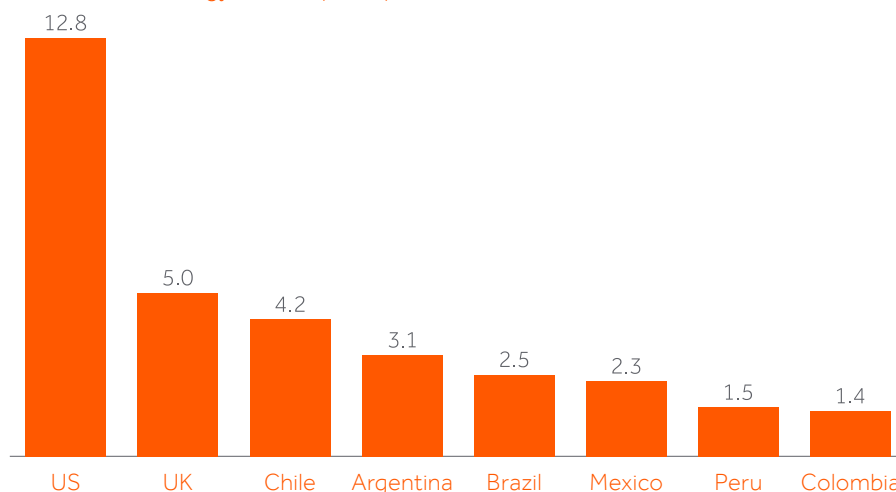
renewable auctions and upgraded regulatory reforms across selected power verticals to keep improving the country's energy infrastructure via foreign investment. How has Colombia overcome the barriers for foreign investment, and what specific opportunities and challenges remain in its energy infrastructure sector?

Hydroelectric is the core power technology taking over 65% of the country's installed capacity. Dependence on hydro was even more pronounced back in the 1980s, which made the country particularly vulnerable to changing rainfall patterns. Back then, utilities were inefficient, government-owned, vertically integrated players operating in different regions. Enter the early 1990s, a strong El Niño phenomenon, characterised by long droughts, wreaked havoc across the country, causing repeated nation-wide blackouts. The energy crisis coupled with political will for reform triggered restructuring of the energy sector. The industry was unbundled and the first wave of privatisations began. However, the 1990s were particularly fraught with security risk arising from drug-related insurrection and internal conflict. The only players willing to bear the country's security risk were local strategic investors and Spanish utilities; other international

players remained wary of entering the country. These much needed funds helped revamp the previously government-owned utilities, but fell short of fully developing and diversifying the sector and the country's energy matrix, still heavily reliant on hydro.

Alvaro Uribe was elected as President in 2002 with the promise of defeating the guerrillas. He almost succeeded: the FARC guerrilla movement was weakened significantly which contributed to the signing of a peace agreement with Mr. Uribe's successor. Besides his strong military stance, Mr. Uribe had a pro-market agenda which touched the energy space. International industrial players and regional funds, invested in the sector through project finance type structures: thermal power plants thrived on the back of dollar-denominated reliability charges introduced in 2006 to guarantee energy supply through severe weather conditions. Dollarized reliability charges were assigned to 46% of the country's installed capacity, helping to mitigate foreign exchange risk in power generation (today's figure is 51%). By the end of Mr. Uribe's two terms in office, Colombia was en route to an investment grade rating, opening the country to much larger pools of foreign direct investment. He stepped down in 2010, yielding

Exhibit 1: 2016 Energy demand per capita (kWh)



Source: IEA Atlas of Energy

the presidency to his political heir and defence minister, Juan Manuel Santos.

While Mr. Santos continued the economic agenda of his predecessor, he drastically changed his approach towards the armed conflict, negotiating a peace agreement with the FARC in 2016. This further positioned Colombia's positive international momentum. With security risks mitigated, a twenty-year track record of private sector participation, and growing energy demand, Colombia's attractiveness for energy infrastructure investments improved significantly. A third wave of privatisations took place in which more institutional players entered the country. Following the privatisation of Isagen (acquired by Brookfield), the government allocated sale proceeds to fund the US\$40 bn game-changing 4G roadway concession program. However, several risks still loomed, encumbering the mass entry of foreign capital into the energy sector: peso-denominated prices (only reliability charges are dollar-denominated), short contract terms, unfavourable dispute resolution structures, and corruption.

It wasn't until 2019 that Colombia jumped on the non-hydro renewables bandwagon, several

years after peers like Mexico, Chile and Peru implemented large-scale programs. February 2019 witnessed the first attempt of increasing non-hydro renewable generation from 50 MW of installed capacity today to over 500 MW within 4 years. Even though bidders submitted proposals totalling 1.5 GW (to supply c. 2% of Colombia's generation) the process failed due to tender design failures. Bidders sought longer term contracts, ideally dollar-denominated prices, and improved offtake structures. This feedback was incorporated by the government and should partly be reflected in the second tender that will occur in October 2019. One key term remains unchanged, though: foreign exchange risk. Prices will still be peso-denominated which will undoubtedly pose challenges for certain investors and could hinder the program's success – as a point of reference, Chile, Peru and Mexico have all implemented dollar denominated auction programs, Brazil being the only local currency advocate.

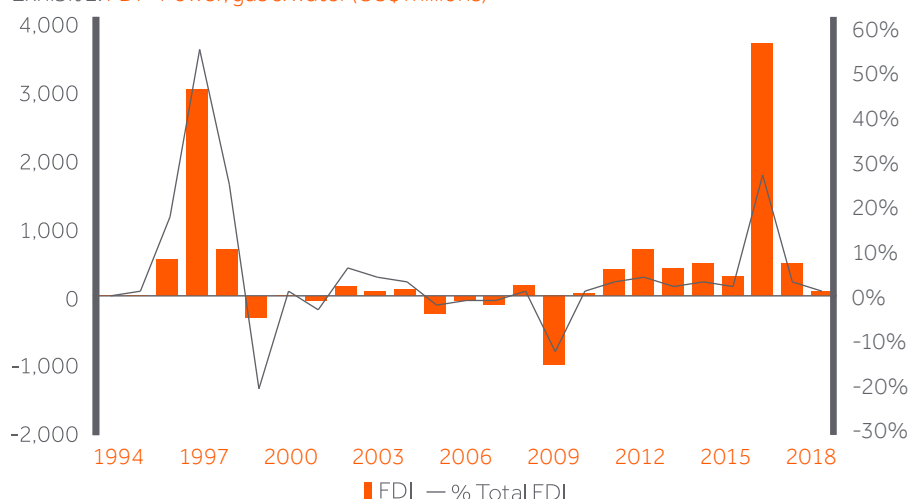
The outlook for the sector looks bright. In power transmission, the highlight in the short term will be the privatisation of the government's 51.4% stake in ISA, Colombia's electric transmission backbone and South America's largest transmission company. The company holds a 75% market share across the country and has international presence in

Peru, Chile and Brazil. This could be one of Latin America's largest M&A transactions in the energy space in 2020. During the next twelve months, recently upgraded tariff regulation will bring Colombia's distribution sector to OECD standards and will encourage significant low-risk investments at an attractive rate of return. Mr. Duque's government is also promoting the privatisations of several regional distribution companies aggregating over 1 million customers and Electricaribe, a distribution company with a 23% market share (2.5 million customers).

Looking ahead, power and infrastructure investments will be driven by liberalised energy market policies and sustained regulatory stability. Several growth avenues will emerge in the sector from 2020 onwards: i) smart metering and distributed generation, ii) wind and solar auctions and iii) transmission and distribution privatisations. Regulatory change is already underway for some of these opportunities, fostering new business models for small-scale self-generation and propelling distribution companies into a new billing era through cutting edge smart meters.

Improving the quality of the energy sectors efficiency and incentivising foreign investment have been key priorities for the government during the past 25 years. Four waves have shaped the power infrastructure initiatives in the country, cultivating the field for foreign players. Colombia has demonstrated its willingness to listen and act on the concerns of potential investors and has improved significantly since the days of nation-wide blackouts. Foreign investors have taken notice and responded accordingly. However, foreign exchange and other risks remain, hindering mainstream investment into the sector. Investors' eyes will be set on the results of the second renewable energy tender in October 2019, the next test of the sectors attractiveness to foreign capital.

Exhibit 2: FDI – Power, gas & water (US\$ millions)



Source: Banco de la República de Colombia (Central Bank)

Street view: Saving Brazil - a milestone moment



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Wednesday 7 August 2019 saw a major step in much needed reform of Brazil's antiquated pension system, when the lower house approved proposals before final approval in the senate, expected in late September.

After decades of debate, often muted by years of positive demographic bonus and economic expansion, it is encouraging to see a difficult and intrinsically unpopular reform moving forward.

Interestingly, the approval was achieved despite the discredit of government leaders in a fragmented congress and the pessimism of many reputable market participants just a few months ago.

In addition to the expected savings of c. R\$900bn over 10 years, the pension reform sets the ground for a return to stability, reduces risk perception and potentially unlocks a long list of other desirable reforms, both macro and micro, across Brazilian economy and society.

The reform has a multifaceted impact to the Brazilian economy: not only does it help stabilise future social security expenditures, it also creates externalities with incremental positive effects to debt/GDP level and stability, such as lower long term interest rates, a stronger financial system, lower FX volatility and relatively better economic prospects.

Despite all the noise around Mr. Bolsonaro's controversial rhetoric and his dwindling popularity, behind the scenes his economic team is gradually making progress. Privatisations, trade liberalisation, tax reforms and reduction of the so called "Custo Brazil" (cost of doing business in Brazil), are all long overdue critical structural reforms which are now back on the government's agenda.

If implemented these should lead to greater productivity, renewal of sustainable growth and give support to a structurally low interest rate environment, all key for long-term economic development of the Brazilian economy.

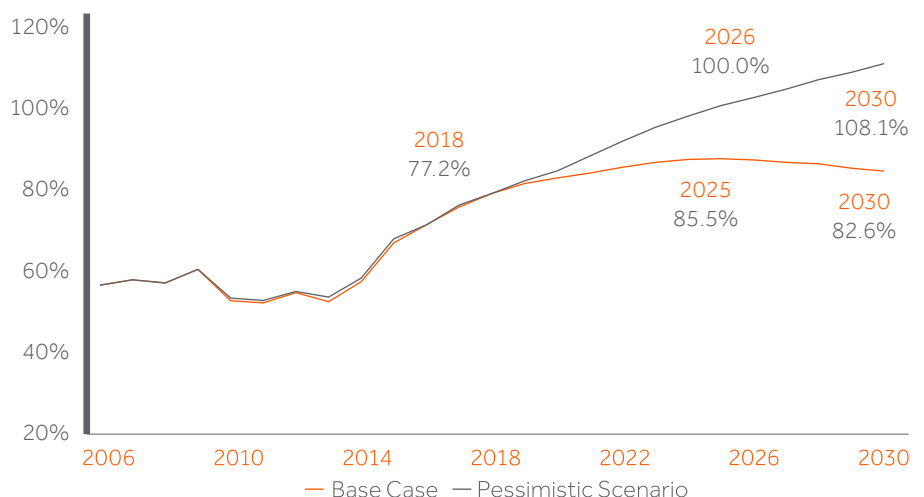
In addition, the pensions reform will naturally increase the number of Brazilians planning their future retirements. As financial services investors, Actis is seeing financial services businesses providing new savings and pensions offerings; opening up new investment opportunities.

Longer term, the reforms could allow Brazil to develop a solid base of domestic savings, which would eventually help reduce currency and financial volatility as Ewen Cameron Watt wrote in our June 2019 edition "*Saving the Future*".

It is clearly too soon to celebrate just yet but the tangible progress is encouraging in a country full of untapped opportunity. Elsewhere - from Chile to Mexico, Malaysia to Korea pension fund reform has led to stronger domestic financial systems and relatively reduced exchange rate volatility. Latin America's most populous economy may continue this trend...stay tuned.

Exhibit 1: **Government debt as a % of GDP**

The pensions reform is critical as it has a multifaceted impact to the Brazilian economy: not only does it help stabilise future social security expenditures, particularly in the long term, but also creates externalities with incremental positive effects to Debt / GDP level and stability, such as potentially lower long term interest rates, stronger financial system, lower FX volatility and relatively better economic growth prospects.



Source: Senate IFI - Instituto Fiscal Independente





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