

BRICS Economies & Commodities in the Spotlight

Macro-economic and commodity trends

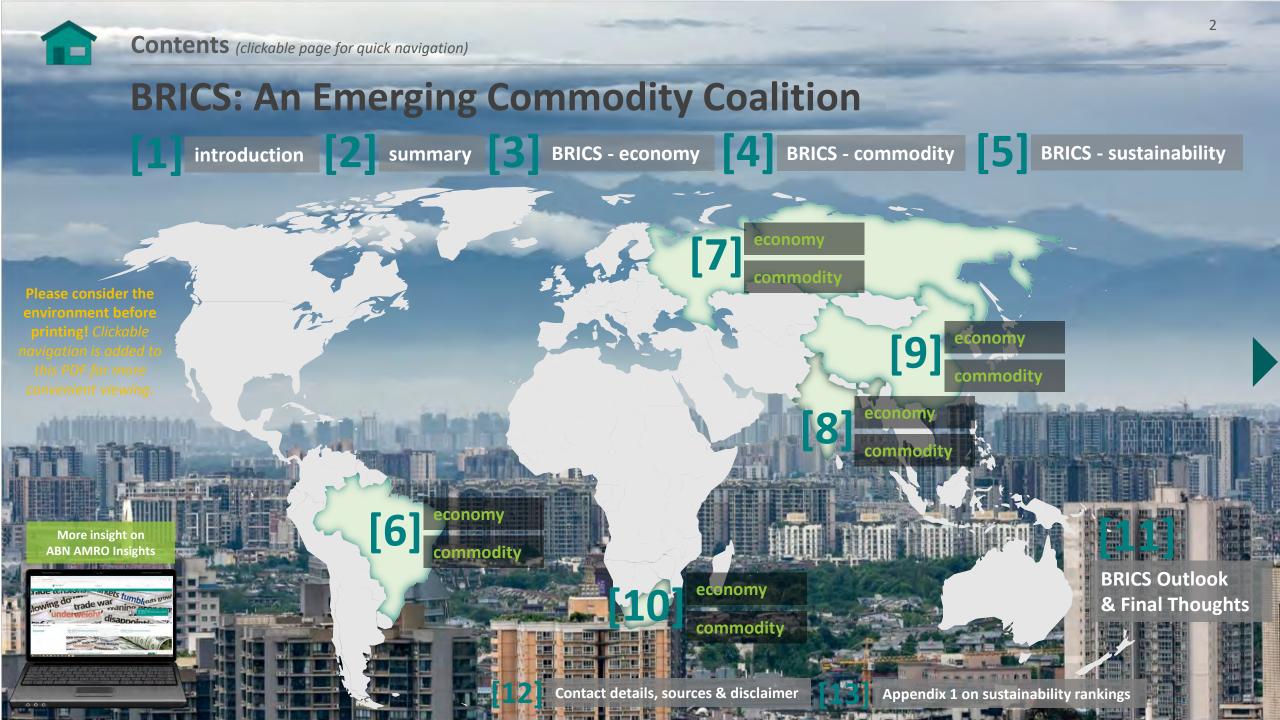
An Emerging Commodity Coalition

ABN AMRO Group Economics

Emerging Markets & Commodity Research

November 2019







[1] Introduction

BRICS in the global economy

Back in 2001, the term BRIC was introduced by Goldman Sachs (Jim O'Neill), as an acronym for emerging markets (Brazil, Russia, India and China) with similarities in economic development. New economic stars were born. As time progressed, it became clear that the growth and the impact of the BRIC-countries on the global economy was substantial, especially China's growth. In economic, commodity and also demographic terms Brazil, Russia, India and China became top players in the world. BRIC was formally institutionalised in 2009. South-Africa was invited to join formal BRIC-meetings in 2010 and became a full member in 2011. Although South Africa's economy and its resources are relatively small, its potential is nevertheless promising. Nowadays, they refer to themselves as 'The Big Five'. Although this is arguable, in some areas this is true. Currently, the combined share in de global economy adds up to 22%. Next to that, more than 40% of commodity supply and demand originates from the BRICS and more than 40% of the world's population live in the BRICS-countries. In these impressive numbers, China has a significant share and the country has been very dominant in the further development of the BRICS as a coalition.

In our view it is therefore time to investigate again what both the economic and commodity impact and the path forward is for the BRICS. Chances are high that the BRICS-countries remain amongst the world's most important economies in the years ahead. If the rate of economic development remains high, than that means that the need for commodities will also remain high.



Why this report?

Regardless of size in global GDP, the BRICS are responsible for almost half of consumption and production of commodities. This makes BRICS an interesting topic to address. But the BRICS will face some major challenges in the (near) future. What will be the impact of the trade war? What economic hurdles lie ahead? To what extend and how are BRICS-countries dependent on commodity markets? How do these countries secure their commodities flows? What key sustainable issues must be addressed? History has shown that not all countries are always successful in tackling these challenges.

With this report we want to provide a comprehensive overview of macro economic developments, commodity market fundamentals and also touch briefly on sustainability issues for the BRICS-countries. We focus on the current economic and commodity impact of BRICS-countries and address some of the key sustainability trends. Next to that, we give an economic outlook and provide insight into the future role of the BRICS-countries in commodity markets. All-in-all, we ask ourselves: is this really an emerging commodity coalition?



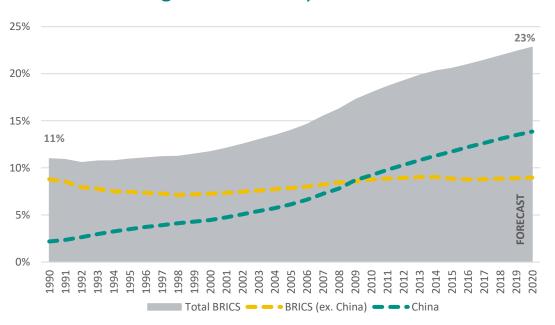


Markets & Commodity Research



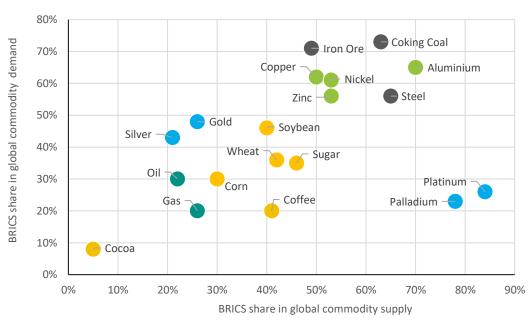
[2] Executive summary – Economy & Commodity

BRICS share in global economy since 1990



The combined share of the BRICS in the global economy has more than doubled since 1990, from around 10% to over 20% in 2018, and we expect this share to rise further. In PPP terms, corrected for prices and exchange rates, the BRICS share is even around 33%. This rising share is fully attributable to China, whose share in the global economy has risen from 2% in 1990 to around 15% (in PPP terms, China has surpassed the US). Market oriented reforms and, particularly, access to the WTO in 2001 laid the foundation for an extensive period of high growth rates, averaging 9% this century, although the Chinese economy has gradually slowed since the global financial crisis. Over the past years, India's growth has also accelerated, helped by structural reforms and a demographic dividend, but India has faced a clear slowdown over the past year as well. India's share in the global economy is gradually rising, but at 3-4% it is still relatively low. But we expect this share to rise going forward. The shares of Brazil and Russia have dropped back to 2%, as average growth has slowed to 1.5 and 2.0% since 2010. South Africa's share has remained small at 0.5%, with growth falling to an average of 2% since 2010.

BRICS current share in commodity supply and demand



Together, the BRICS account for a 45% share on average in global supply of commodities. That is a significant proportion and provides the BRICS a solid base in commodity markets. Brazil and Russia are important commodity producers, while China and India are big commodity consumers. The BRICS have especially high shares in the supply of precious metals (platinum and palladium) and industrial metals (both ferrous and non-ferrous metals). In precious metals, South Africa is a significant producer. The BRICS are also a top supplier to the world in many agricultural commodities (except cocoa). On the demand side of commodities, they have a particular high share in demand for industrial metals. For a large part, however, China is dominating in this area. China alone has a share of over 50% in the demand of industrial metals. China is also a top consumer of many agricultural commodities. Demand for gold and silver is also significant, which is mainly due to high levels of demand from China and India for the investment and gems & jewellery sector.



[2] Executive summary - Economy



External position remains an important shock absorber

...pension reform can finally proceed in congress, but structural weaknesses will hamper growth prospects.

The country has not yet recovered from a severe contraction in 2015/16. Growth stayed at an anaemic 1% a year in the last two years and is expected to grow with just 1% as well in 2019. The longawaited adoption of the pension reform will eventually lead to an improvement of the dire fiscal situation. This is also pivotal to maintain a supportive monetary policy. Uncertainty about global developments, such as the deepening trade conflict will however keep business and consumer confidence subdued. Brazil's sound external financial position will continue to act as the main shock absorber against a possible rise in risk aversion.



Sanctions exacerbated macroeconomic challenges for Russia

...Russian government has geared its economic policy towards making Russia more shock-resistant

After a period of negative growth, economic growth turned positive end-2016. Driven by higher oil prices and strong private consumption, Russia grew slightly above 2% in 2018, but overall economic performance in the last years have been lacklustre. Russia has reduced external debt and government finances are in good shape. Higher oil prices and government policies have mitigated the adverse impact of sanctions over the last years. However, weak domestic factors such as a poor investment climate and longstanding structural inefficiencies are curbing economic growth.



More reforms possible under Modi 2.0 would support India's growth potential

...strengthening the banking system remains a key challenge

Since early 2018, economic growth has fallen back, as domestic demand slowed and the external environment deteriorated. Still, India is relatively shielded to US-China tensions, as it is less exposed to the global business cycle than other east Asian countries. While we cut our growth forecasts for 2019-2020, we expect growth to recover, assuming more monetary and fiscal stimulus. This also reflects India's high growth potential, that could profit from more reforms under Modi 2.0 and a demographic dividend. Strengthening the banking system remains a key challenge. India tries to improve current account by reducing gold and oil input.



More piecemeal stimulus should offset drags from conflict with US

...but decoupling between the US and China has already started

The escalation of the trade/tech conflict with the US since 2018 has added further drags to the economy. As a result, Beijing has shifted its macroeconomic policy stance from financial deleveraging/targeted tightening to piecemeal monetary and fiscal stimulus. We still expect the authorities to refrain from big bazooka stimulus, as that would run counter to their longer-term goal of stabilising overall leverage. We expect the gradual slowdown to continue, although risks to China's transition have risen due to the escalated trade/tech conflict with the US. The collapse of bilateral trade shows that decoupling between the US and China has already started.



Unemployment is only one symptom of the enduring malaise

...twin deficits keep country vulnerable to a negative turn in investors sentiment

South Africa is compared to the other BRICS a small country and the economic structure has several weak spots, which reflects the legacy of apartheid. These weaknesses, together with the negative impact of recent rating downgrades and international uncertainty limit the growth potential. GDP growth slowed from an annual average of 3.6% between the end of apartheid in 1994 and 2008, to 1.6% between 2009 and 2018 and is expected to remain subdued. The room for fiscal stimulus and monetary stimulus is limited. The substantial current account deficit in combination with high fiscal deficits and high inflation rates will keep the country vulnerable for a negative turn in investors appetite.





[2] Executive summary - Commodity



Iron ore, soybeans and coffee are key economic drivers

...the value of commodity exports increased strongly over the past decade

Brazil is an important exporter of iron ore, soybeans and coffee. The country is a key global player in these commodities. This means also that these commodities are of value to the economy. In recent years, Brazilian oil production steadily increased. As a result, with a recent record production of almost 3 mb/d, Brazil has become one of the top-10 oil producers. Although the percentage of – mainly associated – natural gas production is rising, Brazil is still a net-importer of natural gas. The Brazilian electricity mix is well diversified. Especially due to the large share of Hydro energy, its dependency of fossil fuels for power generation is below 20%. In terms of renewable energy capacity, Brazil is ranked 12th in the world.



Major commodity producer in energy, metals and wheat

...volatile energy prices are a challenge for economic growth

Russia is an important supplier of oil, gas, palladium, nickel and aluminium. Around 40% of world's supply of palladium comes from Russia and 12% of the world's platinum supply. With a production of more than 11 mb/d of crude oil. Russia is the second largest oil producer in the world. Besides that, Russia is the largest supplier of natural gas towards Europe. Nevertheless, its share in the global gas production dropped to 18% in 2018 from near 30% in 1990. New export infrastructure projects to both the east and the west should safeguard their position as a reliable energy supplier during the coming decades.



High gold and silver demand, self sufficient in agriculturals

...agricultural sector plays a vital role in the Indian economy

India has a significant current account deficit because of large oil and gold imports. It is a large buyer of gold and silver: 18% of world gold demand and 27% of world silver demand. India is also a large energy consumer. And with its economy expected to expand further rapidly, energy demand is forecasted to increase further. India is self sufficient in agricultural commodities such as sugar, wheat, soybean and coffee. On corn and cocoa the country is dependent on imports. India also has vast resources of iron ore, of which only a small proportion is destined for export. Further industrialisation and urbanisation will make India long term dependent on commodities.



China's hunger for many commodities remains high

...even small shifts in China's economy can have high impact on many commodity prices

China is the largest buyer of precious and industrial metals. In global precious metals demand it has an average share of 23%. In industrial metals this is almost 50%. Also in mining, smelting and refining of these metals, China is a key player. This means that economic trends and developments ultimately have high impact om metals market conditions. China is a crucial importer of oil. Expectations regarding the Chinese economy, and thus the demand growth of oil, could trigger large price swings for oil prices. Although China is seen as a front-runner regarding the energy transition, it is also the country which invests the most in fossil fuel to meet its rapid increase in energy demand.



High stakes in precious metals, rich in iron ore

...economy supported by gold and the platinum group of metals

South Africa is good for 38% of global palladium supply and 72% of global platinum supply. The country has high resources of gold, but due to lack of sufficient infrastructure and energy supply, mining is highly challenging. Lack of skilled personnel and experience remains a hurdle for further development. Thanks to foreign direct investments (mainly from China), growth in the mining sector is secured to some extend. South Africa is a net-importer of energy. Its electricity demand is mainly met by coal-fired power plants.



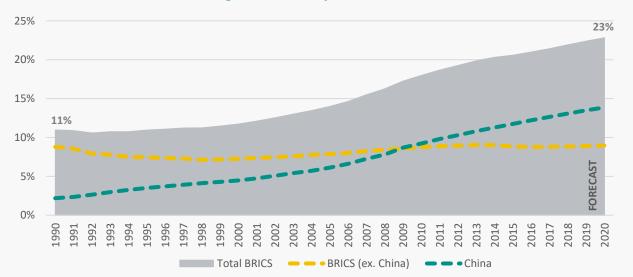


Markets & Commodity Research

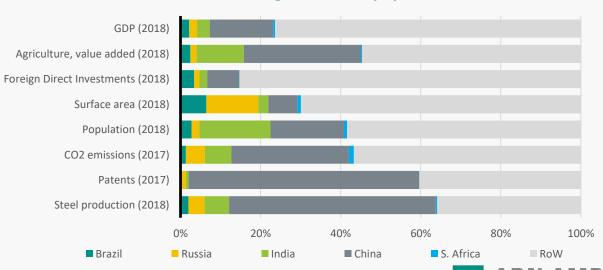
BRICS – Economy Snapshot

	BR	AZIL	RU.	SSIA	L. Marie		CHI	NA	SOUTH	AFRICA
(source: EIU)	2017	2018	2017	2018	2017	2018	2017	2018	2017	2018
GDP USD (bln nom.)	2,053	1,868	1,578	1,654	2,652	2,718	12,062	13,368	350	368
GDP/capita (USD)	9,887	8,931	10,729	11,253	1,981	2,010	8,747	9,652	6,136	6,370
GDP % (global share)	2.8%	2.8%	2.1%	2.1%	3.3%	3.4%	12.6%	13.1%	0.5%	0.5%
	2019	2020	2019	2020	2019	2020	2019	2020	2019	2020
Growth GDP	1.0%	2.0%	1.0%	1.5%	6.5%	7.0%	6.2%	5.8%	1.0%	1.5%
Inflation	4.0%	3.7%	4.5%	4.0%	3.5%	4.0%	2.5%	2.5%	4.8%	5.1%
Unemploy. rate	11.2	11.1	4.7	4.7	8.5	8.4	4.1	4.2	28.2	29.3

BRICS share in global economy since 1990



BRICS share in global economy by indicator

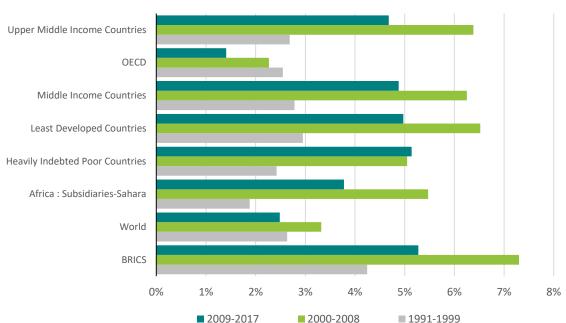


Markets & Commodity Research



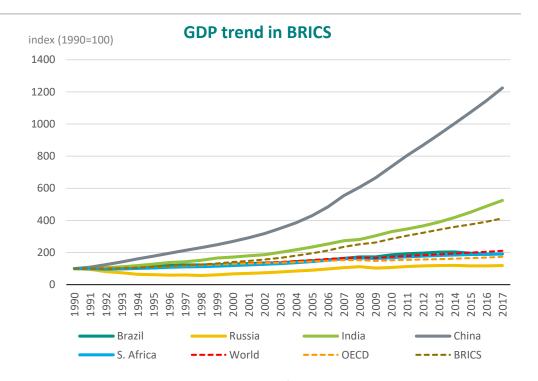
BRICS – Economic performance since 1990

Average GDP growth (in period): BRICS vs other regions



Growth rates in the BRICS have outperformed those of peer groups over the past decades, not only the advanced economies but also several samples of other emerging and developing economies. However, this outperformance is fully attributable to China and India. So far this century, the average growth rate of China and India was 9% and 7%, respectively, compared to around 4% for Russia, 2.5% for Brazil and almost 3% for South Africa. Since the global financial crisis, global growth rates have generally trended lower, and the same is true for the BRICS. However, the difference in growth performance between China and India, at the one hand, and Brazil, Russia and South Africa, at the other, has not disappeared:

• China's growth rate has fallen from over 10% in 2010 to around 6% in 2019-20. This gradual slowdown comes alongside Beijing's attempts to shift the growth model (from industry/investment to services/ consumption) while moving up the value chain. Escalation of tensions with the US (particularly on the technology front – is an important headwind. In reaction, the government has shifted from a policy of financial deleveraging/targeted tightening to piecemeal stimulus. Meanwhile, there are signs that the trade/tech tensions



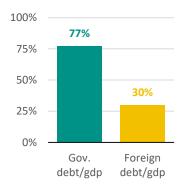
have started to drive a broader decoupling of the US and Chinese economies, while speeding up the shift of global supply chains.

- India's growth rate is more volatile, averaging 7.4% since 2008. India is on its way to surpass China as fastest growing giant profiting from structural reforms, catch-up effects and a demographic dividend -, but growth has fallen sharply since last year due to both domestic and external factors.
- Average growth in **Brazil** has fallen to 1.2% in 2009-18, as political turmoil and weak public finances weigh on growth (the country even faced a sharp contraction in 2015-16).
- Russian growth has also fallen back sharply compared to the early 2000s, reflecting among other failures to diversify the economy (leaving Russia vulnerable to oil price fluctuations) and a sharpening of sanctions since Crimea annexation in 2014.
- Political turbulence and a lack of structural reforms are also important factors in explaining subdued growth in South-Africa over the past years.



BRICS – Public Debt & External Debt burden (% GDP in 2018)

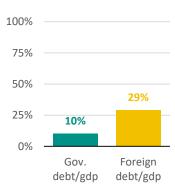




Government debt levels have risen during the last ten years from 50% to over 80%. To reverse the debt-to-GDP ratio, the OECD and other institutions estimate that a primary surplus of 2% of GDP is necessary. Though not a realistic target for the coming two years, a prospect of improvement may be sufficient to keep Brazil's credit rating intact. The long-awaited adoption of the controversial pension reform by congress would seem a necessary condition to achieve this.

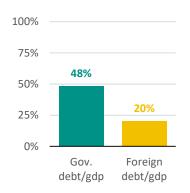
Still it will take several years before the benefits of the pension reform become visible and in the mean time other measures to curb fiscal spending will be needed.





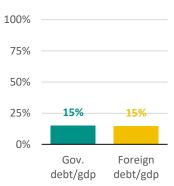
Public debt in Russia is relatively low compared to other BRICS-countries. The government maintains a fiscal framework anchored in a mediumterm primary balance target and is adding to its fiscal reserves as long as the oil price exceeds USD 40/bbl. In 2018, the government balance was in surplus (2.6% of GDP) and is expected to remain in surplus for the coming two years. Gross external debt has fallen from USD 668bn in December 2013 to a current level of USD 480bn, largely due to sanctions preventing Russian from borrowing on international capital markets in combination with domestic policies to improve borrowing conditions.





India's fiscal stance has been quite prudent over recent years compared to the past. The Modi government has kept the budget deficit in check at around 3.5% of GDP over the past years. With annual growth levels between 6-8%, the government debt to GDP ratio has continued to fall, to an estimated 48% this year. The improving fiscal dynamics was one of the drivers of Moody's rating upgrade to Baa2 in 2017. External debt levels are manageable, both in terms of GDP and export revenues.

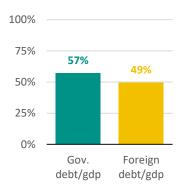




China's central government debt burden is low. Still, these numbers do not tell the full story. Outstanding credit to the general government (incl. local governments) stood at 50% of GDP per end 2018.

Moreover, S&P estimates 'hidden' local government debt at 25% of GDP. In addition, there are large contingent liabilities related to the banking system and SOEs. External debt levels are manageable, while FX reserves' coverage remains very high by all standards.



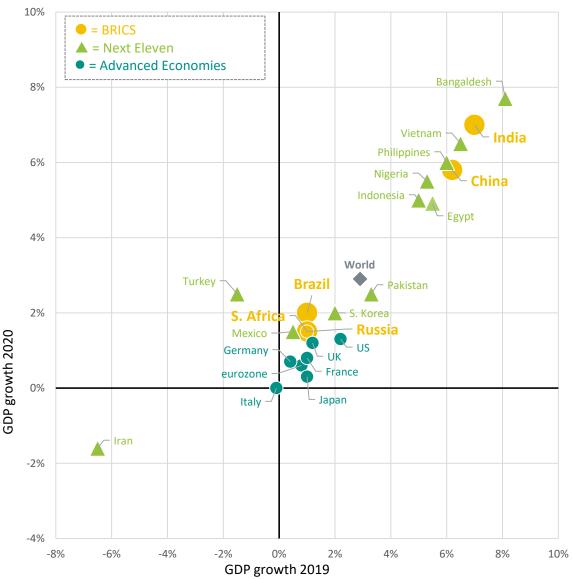


Government debt levels have doubled in the last ten years to almost 60% of GDP. If guaranties on loans issued by state owned enterprises is included the debt level might be even 15-20 percentage points higher. Interest expenses are rising as the governments' debt sustainability is increasingly questioned. The fiscal deficit is near to 5% of GDP and the current account deficit as well. In line with the increase of the current account deficit the foreign debt stock has doubled in the last decade as well to 50% of GDP and 1.5 times exports. Still international reserves hold up well and cover close to 5 months of imports and roughly twice the level of short term debt.





BRICS – Economic developments & outlook



BRICS in the global economy: still relevant, but less so

We believe that the concept of the BRICS from a macroeconomic perspective has lost some, but not all of its relevance. When Jim O'Neill (Goldman Sachs) presented the BRIC acronym in 2001, he believed Brazil, Russia, China and India were on a path to sustainable outperformance over advanced economies and on their way to surpass most of the developed nations by 2050. Almost twenty years later, we can conclude that only China and India have succeeded in structurally outperforming the advanced economies. Barring extreme shocks, China is on its way to become the largest economy somewhere in the next decade, although a severe escalation of tensions with the US could complicate this path. India is in a strong position to regain the status of fastest growing giant. It will reach the top 5 of largest economies this year and could reach the top 3 by 2025. Meanwhile, commodity producers Brazil and Russia (as well as South Africa) have not succeeded in keeping the outperformance that O'Neill predicted. That said, the concept of BRIC is still relevant, as China, India, Brazil and Russia will remain the largest emerging economies for the foreseeable future (disregarding South-Korea, that is categorised as 'advanced' by the IMF) and key commodity producers and consumers

BRICS economic outlook in 2019-2020

We expect China's gradual slowdown to continue, with growth falling from 6.6% in 2018 to 6.2% in 2019 and 5.8% in 2020. We do not foresee a hard landing scenario for China, although the risks have risen due to the trade/tech conflict with the US. We expect growth in India to pick up again from the current levels, although we have lowered our forecasts to 6.5% for FY 2019-20 and 7.0% for FY 2020-21. For Brazil, Russia and South Africa, we expect growth to remain subdued and below potential, although we see some pick-up in these countries in 2020.

Beyond BRICS

Given the changing dynamics in the BRICS countries, we would like to highlight that for companies and investors it is important to look 'beyond BRICs'. Many other emerging economies – and some of them also quite sizeable - are showing structural outperformance, particularly in Asia (e.g. Indonesia, Vietnam, Philippines, Bangladesh) but also in Africa (e.g. Nigeria, Egypt). These countries are part of the so-called Next Eleven, a group presented by again Goldman Sachs in 2011. Also in this group, we see divergence, as growth in Mexico, Turkey, South Korea, Iran and Pakistan has fallen back due to a combination of political and economic reasons.



[4] BRICS: Commodity Powerhouses of the World





BRICS – Commodity Snapshot

(% share in world total)	BRAZIL		RUSSIA				CHINA		SOUTH AFRICA		BRICS (total)	
	Supply	Demand	Supply	Demand	Supply	Demand	Supply	Demand	Supply	Demand	Supply	Demand
Oil	3%	2%	13%	7%	1%	6%	5%	14%	0%	1%	22%	30%
Gas	1%	1%	18%	13%	1%	2%	6%	4%	0%	0%	26%	20%
Gold ¹	2%	1%	8%	1%	0%	18%	12%	28%	4%	0%	26%	48%
Silver ²	0%	1%	5%	2%	3%	21%	13%	19%	0%	0%	21%	43%
Platinum ³	na	na	12%	na	na	na	na	26%	72%	na	84%	26%
Palladium ³	na	na	39%	na	na	na	na	23%	38%	na	78%	23%
Aluminium ⁴	1%	3%	6%	3%	5%	4%	57%	54%	1%	1%	70%	65%
Copper ⁴	2%	3%	4%	4%	4%	4%	39%	50%	1%	1%	50%	62%
Nickel ⁴	3%	2%	17%	3%	na	3%	31%	53%	2%	na	53%	61%
Zinc ⁴	1%	2%	2%	2%	6%	4%	43%	48%	1%	na	53%	56%
Steel	2%	1%	4%	3%	6%	6%	52%	45%	0%	0%	65%	56%
Iron Ore ⁵	20%	3%	4%	5%	8%	8%	14%	55%	3%	0%	49%	71%
Coking Coal	na	2%	8%	7%	4%	7%	51%	57%	0%	0%	63%	73%
Wheat	na	na	10%	6%	14%	13%	18%	17%	na	na	42%	36%
Corn	7%	5%	na	na	na	na	23%	25%	na	na	30%	30%
Soybean	32%	13%	na	na	4%	4%	4%	29%	na	na	40%	46%
Sugar	16%	6%	4%	3%	19%	15%	6%	10%	1%	1%	46%	35%
Cocoa ⁶	5%	5%	na	1%	0%	1%	na	1%	na	na	5%	8%
Coffee	37%	14%	na	1%	3%	3%	1%	1%	na	1%	41%	20%

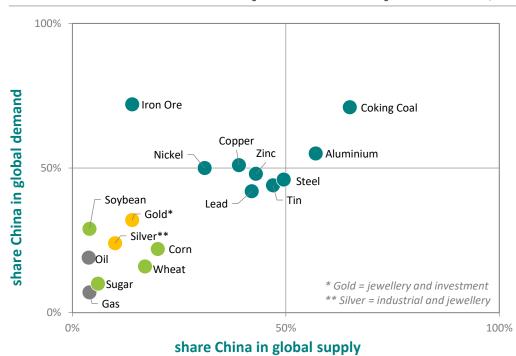
¹⁾ Gold: supply = mine production, demand = consumer demand - 2) Silver: supply is mine production, demand = fabrication, incl. scrap - 3) Platinum & Palladium: supply = mine production -



⁴⁾ Base metals: supply & demand based on refined material - 5) Iron Ore: supply base on mine production, usable ore - 6) Cocoa: demand based on grindings

Markets & Commodity Research

China dominates many commodity markets, in particular industrial commodity markets



China has an important stamp on many commodity markets

The role of China in commodity markets is quite impressive. China consumes 50% of global consumption of base metals (such as aluminium, copper, nickel and zinc) and a 48% share in the production of these metals. The country also produces 50% of global crude steel. In the consumption of precious metals (investment, jewellery & industrial demand) and agricultural commodities, China has an important position. Imports of these commodities have risen sharply in a relative short period of time, which has led to shares of 30% in the demand for precious metals and an average 23% in the demand for agricultural commodities. Around 20% of global demand for soybeans and corn is destined for China. This is also the case in the demand for oil. China has abundant resources of coking coal. But in 2016, governmental policy was introduced to tackle overcapacity and create environmental sustainability. The number of mining days per year were restricted. On average, approximately 40% of global reserves of all kinds of industrial ores and minerals are located in China. Although the reserves of many minerals are considerable, the quality is sometimes low and the difficulty of mining is often high.



This comes at the cost of the competitiveness of some ores and minerals. The role of Chinese energy consumption also is seen as an important driver for oil prices. An outlook for weakening oil demand growth normally leads to increased pressure on oil prices. An important driver for global electricity prices are the imports of coal by China. This will remain as long as coal is part of the electricity mix within a certain country.

China has a powerful position in the mining of rare earth elements. These elements are a necessity for the manufacturing of products like electric vehicles, wind turbines, numerous defence industry applications and all kinds of consumer electronics. The term 'rare' refers to the fact that these ores are scarcely found in high concentrations, which makes cost of mining very high. With a share of more than 80% in global mine output, China is the commodity monopolist in rare earths. Also, most of the refining and processing facilities of rare earths are located in China, which provides a strategic advantage.



BRICS – Commodity Snapshot



Energy

BRICS responsible for most energy demand growth

Emerging economies, mainly in China and India, are responsible for most of the global growth of oil demand. Especially China and India will see energy demand continue to rise at an impressive pace. As a result, oil prices are extra vulnerable to developments which could affect the growth of oil demand in these countries. Russia, and in some less extent also Brazil, are watched as being important energy producers besides taking their (rising) share of global energy demand. Russia is a crucial player when it comes to gas supply. In many countries, gas will play an important role in the decarbonisation of their energy mix. Furthermore, Russia is the oil producer which lead the cooperation with OPEC in order to balance the oil markets. This OPEC+ coalition tries to bring stability to oil markets which are faced by the unprecedented growth of US shale oil.



Precious Metals

Investment demand plays a crucial role

BRICS are important for precious metals markets, especially South Africa and Russia as producers and China and India as consumers. Gold is bought as reserve diversification by central banks but also as portfolio diversification by funds and investors. Gold and silver have the most currency characteristics, meaning they trade like a currency. Their price performance depends for a large part on developments in currency markets and interest rate markets and to a lesser extent on the outlook on industrial demand (silver more than gold). Next to this gold, silver and platinum are used in jewellery. If prices rise too substantially, demand for jewellery will slow down and more scrap supply will enter the market. Moreover platinum and palladium are used in industrial processes and car converters. The outlook for global car demand as well as more stringent emission standards and supply dynamics are more crucial for platinum and palladium price outlook.



Base Metals

China continues to dominate base metals markets

For almost a decade, China dictates the base metals complex. Although it lacks sufficient base metals ores for the production of refined material, its global share in refining output and demand is very high. This significant stamp of China in these markets will continue in the next decade. The further electrification, urbanisation, growing middle class and the shift to low carbon will remain key catalysts for China's role. Brazil and South Africa have only a minor stake in total supply and demand of base metals. India is expanding its role in base metals markets, mainly driven by increasing demand from construction, infrastructure and power sectors. The pace will remain, however, relatively low. The potential growth of the mining sector in Russia is high. The country has a high share in aluminium and nickel output and holds a significant amount of mineral reserves. Russia will expand its role in the global mining industry in years to come.



Ferrous Metals

Steel overcapacity creates challenging conditions

Brazil is the second largest exporter of iron ore, after Australia. For these exports, Brazil depends for a large extend on the need of China for ores and minerals. For steelmaking, China is expected to remain dependent on the imports of high quality iron ore for some time. Foreign direct investments (FDI) by China in the mining sectors of South Africa and Australia is intended to decrease the dependency of foreign deliveries. On the longer term, however. China will invest more in the installation of Electric Arc Furnaces for steelmaking, which uses steel scrap instead of iron ore. For the time being, steel overcapacity remains a problem. China, the EU and the US produce too much steel. This depresses the global steel industry. The gamechanger remains China in this, because the country has a share of over 50% in global steel output. India is the second largest steel producer in the world and Russia is the sixth steel producing country in the world. BRICS combined have 66% of global steel output.



Agriculturals

Brazil is agricultural superpower amongst BRICS

With large stakes in the production of coffee, soybean and sugar (and to a lesser extent of cocoa), Brazil has become an important global supplier of agricultural products. Most of the exports of these commodities go directly to China. The country is by far the biggest consumer of many agricultural commodities. China is for a large part self-sufficient in the production of wheat and corn. The country has especially a high need for soybean and sugar. India is the largest producer of sugar, mainly because Brazilian mills shifted to the production of sugar cane-based ethanol, which slashed sugar output. In wheat, Russia is a big wheat producer and exporter in the global market. Although Russia's share in global wheat output is lower than the share of China and India, the country is very active on the export market. South Africa only plays a very minor role in agricultural commodities.





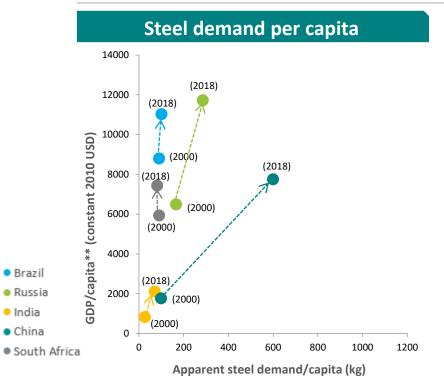
Brazil

Russia

India

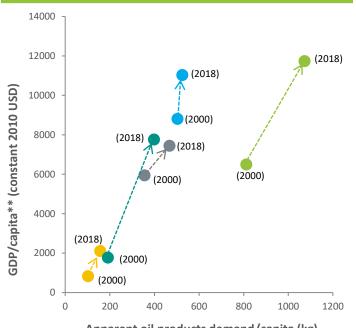
China

Commodity and GDP per Capita Trends in the BRICS Economies



Although India is the second biggest steel producing country – after China – in the world, the Indian demand per capita is still relatively low. The pace of growth is high and this fast growth trajectory will remain solid for the coming years. It seems highly unlikely, however, that India will adopt the same growth path in steel output per capita like China over the past years. Russia also witnessed strong growth in steel demand per capita since 2000. High investments and a fast growing export market contributed to this. Both Brazil and South Africa have seen very limited growth over the past 17 years. We foresee little change in the years ahead in this growth.

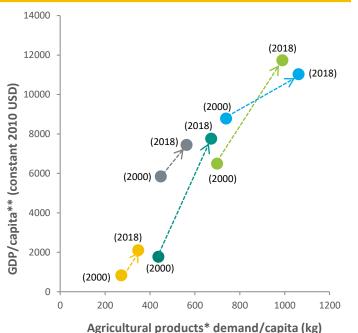
Oil products demand per capita



Apparent oil products demand/capita (kg)

In all BRICS countries the oil products' demand per capita rose. The biggest gains were seen in China and Russia. Energy usage in India is roughly one third of the global average. Russia is the biggest oil products' consumer per capita amongst the BRICS. Over the past 17 years it has maintained this role, which is mainly due to the country's rich energy resources. Since this will not likely be depleted for the next couple of years. Higher welfare coincides with a larger consumption of oil products.

Agri demand per capita



Fast growing economies are in need of agricultural products for feed, food and industrial purposes. In that sense it is not surprising that demand per capita for agricultural products increased strongly in all the BRICS countries since 2000. Demand increased strongest in China, by 54% in 17 years. Especially dairy products demand rose robustly, followed by soybean and protein meals for the feed industry. Soybean and protein meals were also popular in Brazil and Russia. Demand of agricultural products in both these countries increased significantly from 2000-2017. Demand growth in India and South Africa since 2000 was relatively lower, but still increased by 25%.



^{*} Agricultural products = total of demand for wheat, corn, other coarse grains, rice, soybean, other oilseeds, protein meals, vegetable oils, molasses, sugar, beef & veal, pig meat, poultry meat, sheep meat, fresh dairy products, butter, cheese, skim milk, whole milk and cotton; **GDP/capita based on World Bank data



Commodity Price Risk & BRICS



Commodity intensive economies are sensitive to price shocks

According to UNCTAD, the number of countries with a relative high commodity exposure increased from 92 in 1998–2002 to 102 in 2013–2017. The economies of these countries are sensitive to commodity price pressure and vulnerable to severe trade shocks. This will eventually negatively affect their economic growth in the short and/or medium term.

Since 2011, prices of most commodities have shown high volatility, but also softened over time. This has turned out mostly positive for big commodity consumers (China), but was more negative for major exporters (Russia, Brazil, South Africa). Demand for commodities is expected to remain high. Further electrification, industrialisation, urbanisation, growing population and middle classes are sources of further growth.

Amongst the BRICS, China is the most exposed to commodity markets. Not only through the exports of ores, minerals and metal materials, but also via the imports of various types of minerals, agricultural

and energy commodities. Due to its large dependency on coal for power generation, its consumption strategy is an important driver for global coal, and thus electricity prices. Precious metals are not an important industry for Brazil and it is not a considerable gold consumer. Therefore price volatility in precious metals will not affect Brazil a lot.

Brazil is becoming an important oil producer. Since production is growing at a modest pace, it hardly triggers oil price volatility. For Russia price volatility in the oil and gas industry as well as palladium, aluminium and nickel industry price is less desirable. This is also one of the reasons Russia joined OPEC by trying to stabilize the oil markets. The Russian negotiation regarding the gas transit pipeline through Ukraine is – besides cold weather – seen as one of the main upside risks for gas prices in Europe during the coming winter. India is like China an importer of commodities (mainly oil, gold and silver) and therefore lower prices are in its interest.

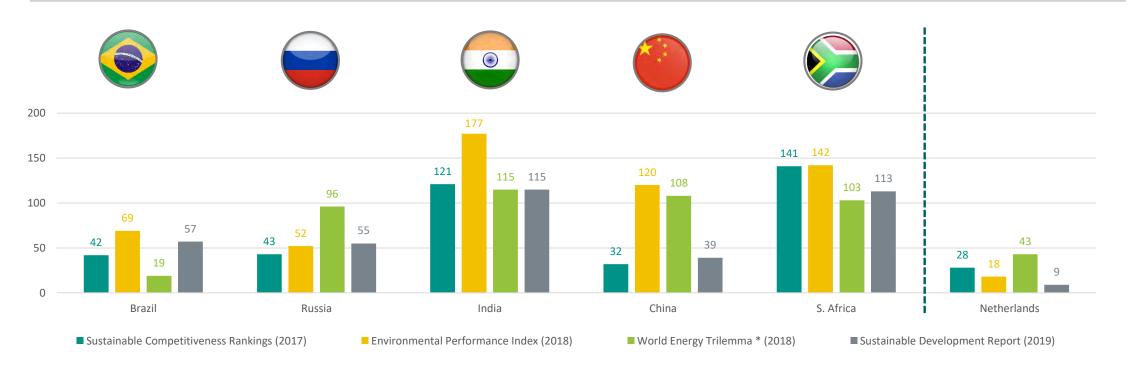








BRICS – International Rankings on Sustainability



Strong BRICS differences in sustainability rankings

What is the environmental health of each country and how sustainable is each country? There are many country rankings available, which address these questions. In short, the rankings measure sustainable competitiveness and/or performance on environmental issues. They provide a broad perspective on the state of countries in the area of sustainable initiatives and achievements. The various rankings have goals of their own, which explains the differences between the outcomes.

All-in-all, the BRICS countries are no front runners when it comes to sustainable challenges. No BRICS country is within the top 30 on any environmental measurement. This means that in the years ahead, more stringent measures and policies are needed in order to comply

with domestic policies, goals and also international agreements.

In many BRICS countries, there is a struggle with the trade off between economic growth and a rise in welfare on the one hand, versus more energy usage/carbon emissions on the other hand. The marginal costs of renewable energy are low, but when there are ample reserves of cheap fossil fuels available for generating electricity, that makes it difficult to make a choice. Especially in India and South Africa, the percentage of coal used for power generation is high. In China, the fight against air pollution triggered large investments in renewable energy to lower the dependency on coal in its mix.

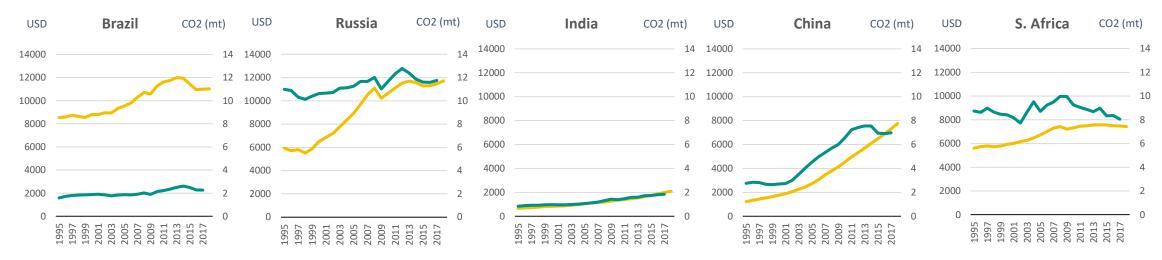
^{*} Ranking of World Energy Trilemma based on the pillar 'environmental sustainability'
For more information on the 5 mentioned sustainability rankings, please click on icon for direct access to appendix 1





BRICS – CO₂ emissions versus GDP (per capita)

GDP/capita (USD, lhs)
CO2 emissions/capita (Mt, rhs)



The level of CO_2 emissions in Brazil is on a very low level, compared to the other BRICS countries. Nevertheless, in the period 1995-2017, the emissions per capita grew by 1.9% on a annual basis, while GDP per capita increased by 1.3%. In this sense, Brazil is the only country within the BRICS countries to have this negative trade off.

Deepwater pre-salt fields create good economic opportunities for the Brazilian economy, but comes with higher carbon emissions. Traditionally, Brazil has the best GDP/CO₂ ratio of all BRICS due to low energy usage and its high share of carbon neutral energy sources (mainly hydro) for power generation. Further growth should come from renewable energy sources like solar and wind, or fossil fuels.

In Russia, the CO_2 emissions per capita only increased by 7% in the period 1995-2017. This is on average 0.3% per year, which is very low. The level of CO_2 emissions by capita is, however, highest of all the BRICS-countries.

Before the US/European sanctions, energy efficiency kept Russian carbon emission growth within limits. Depletion of older oil fields does require investments in more remote area's. These are more complex, more expensive and comes with the risk of even more methane/CO₂ emissions. The recent US/European sanctions leaves, however, no room for access to technological development which could help to increase energy efficiency (both with production and consumption). As a result, Russia tends to use carbon unfriendly methods for longer than technically needed.

The rapid growth of the population, and thus energy demand, calls for a strong policy regarding the build of renewable energy sources. CO_2 emissions per capita increased by 119% in the period 1995-2017, which relates to 5% on average per year.

The level of $\mathrm{CO_2}$ emissions per capita is lowest compared to the other BRICS countries. Many local policies were set to increase the percentage of wind and solar energy used. In 2015, India set a 175GW of renewable energy target by 2022. However, there are several challenges: delays in signing power offtake agreements, new policy barriers, land acquisition hurdles and transmission constraints.

A high pace of economic growth goes hand-in-hand with higher CO₂ emissions. That is especially the case for China. From all the BRICS countries the CO₂ emissions per capita increased by 153% in the period 1995-2017. This is 7% per year.

The decision to fight air pollution clearly resulted in a decoupling of economic growth versus carbon emissions. The focus on cleaner energy and mobility clearly pays off. Nevertheless, beside being the largest investor in renewable energy, China is also the largest investor in fossil fuels in order to meet its continuous rise in energy demand.

From all the BRICS countries, South Africa is the only country which managed to lower its CO_2 emissions per capita over time. This translates to an average annual decline in CO_2 emissions of 0.4%. In the meantime, GDP per capita increased by 1.5% on average in the period 1995-2017.

Since the financial crisis, the CO₂ emissions per capita dropped on a yearly basis. This process will continue going forward. The government of South Africa committed to a 34% carbon reduction target by 2020 and 42% in 2025 (base year is 2010). Renewable energy, CCS, energy efficiency and cleaner transport are seen as the main solutions.





BRICS – Environmental issues by commodity & country

		BRAZIL	RUSSIA	INDIA	CHINA	S. AFRICA
	Energy	 Deep-water pre-salt offshore drilling adds environmental risks Only limited extra hydro-capacity available to scale up Higher focus on expansion share renewable energy (solar/ wind) 	 Due to sanctions, restricted access to technological developments while oil production depletion results in more remote production and technological challenges More EU gas imports from Russia result in higher emissions (opposite to local production) 	 Largely dependent on fossil fuels for power generation, mobility and industry Economic and population growth outpace the efforts to meet the rise in energy demand by renewable energy only 	 Climate change opens 'northern transport route' via the Arctic towards Europe and N. America Focus on less air pollution resulted in phase out of coal-fired power plants, but economic risks could postpone further acceleration. Rise aviation will lead to more CO₂ 	Largely depending on coal for domestic use and exports
60A	Precious Metals		 In gold mining cyanide and mercury are used and this is highly polluting Mining precious metals is energy intensive 		 In gold mining cyanide and mercury are used and this is highly polluting Mining precious metals is energy intensive 	 In gold mining cyanide and mercury are used and this is highly polluting Drought and floods are major threats for mining operations
	Base Metals	 Mining activity in rain forest areas forms a high environmental risk Mining Code implementation with stricter environmental rules and the enforcement of mine closures planning 	 Water & air pollution High amounts of wastes, with mining waste dumps Low-grade mineral resources have more valuable components. This leads to unavoidable losses Stringent environmental controls 	 Environmental degradation due to ore mining zinc, lead, bauxite Weak legislation, resource overuse Waste from mining and polluted local water sources 	 More than 50% of global base metal output is located in China by which emissions are very high Environmental restrictions stricter, which decreases smelter output 	 Primary aluminium is the largest sector, which is also most polluting Mine dumps and waste pollute soil air and water Some mines are operating without water usage licences
	Ferrous Metals	 Mining activity in rain forest areas forms a high environmental risk 78% of total steelmaking capacity is via high polluting BOF¹ route Commitment is raised to recognise the standards of responsible mining within the industry 	 Russia produces 3% of its steel output via the highly polluting OHF¹ process and more than 66% via the BOF¹ route Emission controls exist and are stringent, but often do not comply with international standards 	 BOF¹ steelmaking (47%) in India is relatively poor in terms of environmental performance Illegal iron ore mining Environmental legislation is not very stringent in India 	 More than 88% of steel output is produced via the BOF¹ route Severe problems with urban pollution, relative high emissions Environmental policies to fight pollution are stringent Illegal mining issues 	 Mining and metallurgical wastes are a big challenge Environmental laws installed in order to mitigate the threats of mining and metallurgical wastes Drought and floods are major threats for mining operations
	Agriculturals	 Illegally cutting rain forest or setting fires for agricultural areas Fast increase in output has led to negative impact on natural ecosystems, biodiversity and soil and water resources 	Severe drought is more common and causes drop in output (mainly wheat) and lower yields	 Intensive farming has a share of 18% in total greenhouse emissions Sometimes high, toxic levels of chemicals in soil due to use of fertilisers and pesticides Organic and new farming methods 	 China is the world's largest consumer of fertilisers and pesticides Farmers' fields are a big source of water contamination Reduced environmental pollution 	 Pollution by chemical fertilizers affect the acidity of the soil and may adversely affect the crop production Water scarcity is receiving more attention

¹ BOF = Blast Oxygen Furnace (uses iron ore and coal as main feed in the production process), EAF = Electric Arc Furnace (uses scrap and electricity as main feed in production process, OHF = Open Hearth Furnace (is highly polluting way of making steel, until now only operated in CIS-countries). OHF is most environmental stressful, followed by the BOF-process and than the EAF-process.

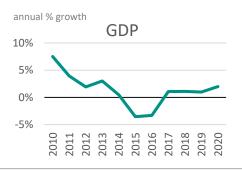


[6] Brazil – Economy & Commodity

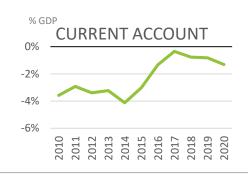


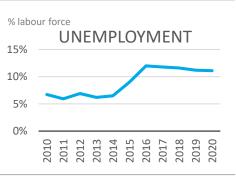


Brazil – Economy Spotlight









Economic development

Brazil has often been plagued by episodes of boom and bust. Over the last thirty years, average growth in Brazil has been just over 2%. This is almost equal to growth in the OECD, but lower than the global annual growth figure (2.8%) and Latin America (2.5%) and certainly below the average level for emerging markets (5%). As a consequence, even though Brazil is among the top ten largest economies in the world, its share in global output has fallen over the last thirty years and now hovers around 3% of global GDP.

There are several reasons for this weak performance. One is that savings and investments are significantly lower than in other emerging countries. Savings are for example hampered by persistent fiscal deficits. While investments, despite low interest rates, remain low due political uncertainty and due to what has become known as "Custo Brasil", or "Brazil cost". This refers to the extra costs of doing business in Brazil compared to other (emerging) countries. Examples of these costs are high taxes, a complex tax system, poor infrastructure, bureaucracy and corruption.

"Custo Brazil and low savings continue to hamper growth prospects"

Economic outlook

After a severe contraction of an accumulated 7% in 2015/16, the country has barely recovered. Economic growth stayed at an anaemic 1% a year in the last three years. Investors, in particular, remain extremely cautious despite the historically low interest rates. An improved external position, a favourable inflation picture and lower global rates have given room for a further extension of interest rate cuts. The policy rate has recently been cut to the historically low level of 5.5%. Still the fiscal situation continues to put a break on government spending and hence on growth, while high unemployment levels result in subdued consumer demand.

Recent economic data points to a continuation of a bleak economic picture. The pension reform is a positive, but continuing uncertainty about global developments, such as the deepening trade conflict and the associated increase in risk aversion, keeps business and consumer confidence in Brazil at low levels. All in all we expect only a very modest recovery in the coming years. Risks to our growth forecasts hence remain tilted to the downside.





Brazil – Trade Spotlight

Export trading partners

Main:

- export products

- import products

soybean: 12%

2%

iron ore: 9%

car parts: 4%



crude petroleum: 8%

packaged medicaments: 2%



raw sugar: 5%

integrated circuits: 2%



cars: 3%

cars: 2%



poultry meat: 3%

crude petroleum: 2%

(% share in respectively total export and import value)

refined petroleum: 8%

Main trade trends



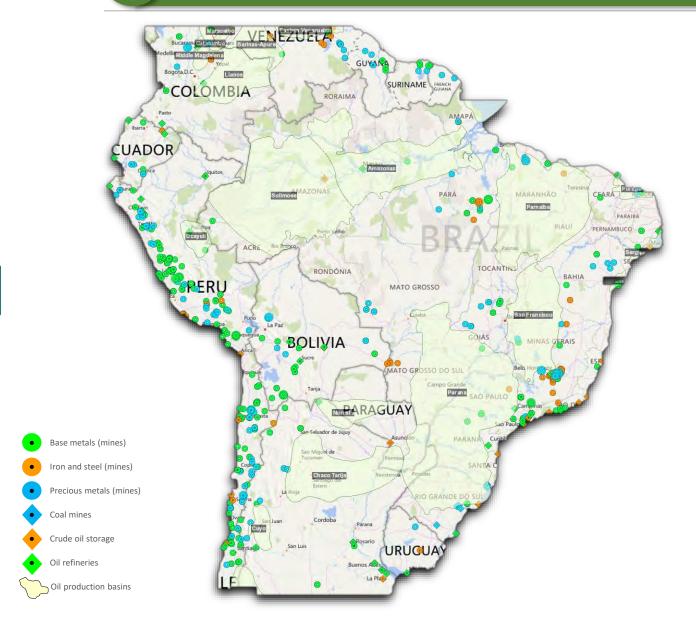
Brazil's strong external position is important asset

Brazil is a relatively closed economy, with foreign trade representing around 30% of GDP. Still the export sector is important as it is an important source of dollar inflows and the export sector also attracts foreign direct investments. Looking both at products and markets Brazil's exports are still well diversified. Commodities exports make up around half of total exports, while manufacturing (like the car industry) accounts roughly for the other half. Exports to China has risen strongly over the last ten years, from less than 10% to more than 25%. Still the US, Europe and other Latin American countries remain important trading partners as well.

A positive feature of the current economic malaise is the rising surplus of the trade balance and a quickly falling current account deficit. Despite all the political turbulence, foreign direct investments continue to pour into the country as well. FDI flows cover around 5 times the current account deficit. This has led to strong foreign reserve position, with FX reserves covering more than a year of imports and around 70% of the total foreign debt. This makes Brazil less vulnerable to a negative shift in global investors sentiment.



Brazil – Commodity Spotlight

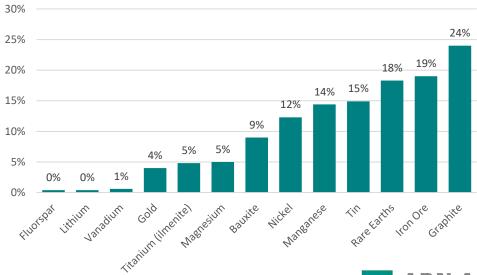


Iron ore, sugar, soybeans and coffee are key drivers

Brazil is a top commodities exporter. The main mineral resources of Brazil are: graphite, iron ore, rare earths, tin, manganese, nickel and bauxite. Brazil has almost 35% share in world iron ore sea born trade, one of the most important traded commodities, with China as the single most important buyer.

Besides ores and minerals, Brazil also has a wide variety of agricultural commodities. Coffee, soybean and sugar are the most traded commodities, but Brazil also exports high volumes of corn and cocoa. Brazil is the biggest soybean producer and accounts for 35% of global production of soybeans. Soybeans from Brazil are for some countries preferable due to the higher protein levels. Brazil is also the second highest sugar producer and top sugar exporter to several countries. About one third of all coffee is produced in Brazil, especially Arabica coffee.

Brazil
(mineral reserves as % global reserves)

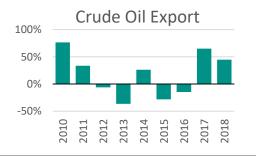


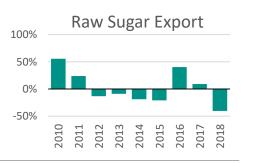












Commodity development

Brazil is rich in a high variety of resources and a large commodity exporter. Trends in export of commodities such as iron ore, soybean, corn, sugar, coffee and crude oil are important drivers for economic growth. The export of Brazilian soybeans rose strongly during 2018, but lost pace in 2019. This was mainly due to the decrease in feed demand from China. The African Swine Fever has cut the pig population significantly. The export or iron ore also decreased strongly, because of a dam rapture at a large mine.

Brazil has lost its leading role in global sugar output. India is now the largest sugar producer. Brazil is more focussed on manufacturing sugarcane based ethanol, which is more lucrative than sugar.

In recent years, Brazilian oil production steadily increased. Especially offshore deep-water oil production gained pace. As a result, with a recent record production of almost 3 mb/d, Brazil has become one of the top-10 oil producers. Although the percentage of – mainly associated – natural gas production is rising, Brazil is still a netimporter of natural gas. Its electricity mix is well diversified. Especially due to the large share of hydro energy, its dependency on fossil fuels for power generation is below 20%. Based on the total share of renewable energy capacity, Brazil is ranked 12th in the world.

"Trend in export of commodities is an important driver for Brazil's economic growth"

Commodity outlook

Brazilian iron ore exports are starting to rebound from significant falls early 2019. This means that supply concern will ease going forward and that the iron ore price will soften again.

The African Swine Fever has hung over the soybeans market for some time, slashing Chinese demand for soybeans. This means that Brazil's agricultural earnings will ease. On coffee, supply is expected to remain abundant next season, keeping a lid on prices. Demand remains sound. Brazil will continue to focus on ethanol production from sugar. But with supply deficits expected in sugar next season, a rising sugar price could trigger renewed sugar production from Brazil. The export of corn is increasing on a weaker Brazilian real. This trend is likely to continue, making Brazil more competitive globally.

With the outlook of new deep-water projects, Brazilian oil exports are expected to increase in the coming years. Brazil successfully invested in renewable energy, mainly wind (>50% of the projects). A side-effect is higher power prices as the share of hydro energy in the mix is declining. Investment in alternative energy sources for diversification is needed as energy demand is rising, while droughts could threaten the huge reliability on the hydro energy.





Strengths – Weaknesses – Opportunities - Threats

STRENGTHS

ECONOMY

- Presence of some global industry leaders
- Large domestic market and substantial middle class population
- Qualified top end labour pool (concentrated in SP areas)
- Sound external liquidity situation and well anchored inflation expectations

COMMODITY

- Abundant mineral resources and high quality
- Highly consolidated sector
- Solid build of its (offshore) oil production capacity

WEAKNESSES

ECONOMY

- Difficult business climate due to government intervention (high tax and administrative burden)
- Weak institutions and corruption
- Weak, infrastructure, education, health
- Low savings and investment levels
- Weak fiscal position

COMMODITY

- Far away from high growth markets (Asia)
- Supply of power
- Lack of diversification of the electricity mix due to large reliance on hydro energy

OPPORTUNITIES

ECONOMY

- Moving up the value added chain
- Improve institutional framework
- Infrastructure development
- Renewable energy investments
- Structural reforms (pension, labour, tax)
- Improve the quality of human capital
- Diminish income inequality

COMMODITY

- Investments in new technology and sustainable processes
- Large potential in offshore oil and gas
- Strong investments in renewable energy

THREATS

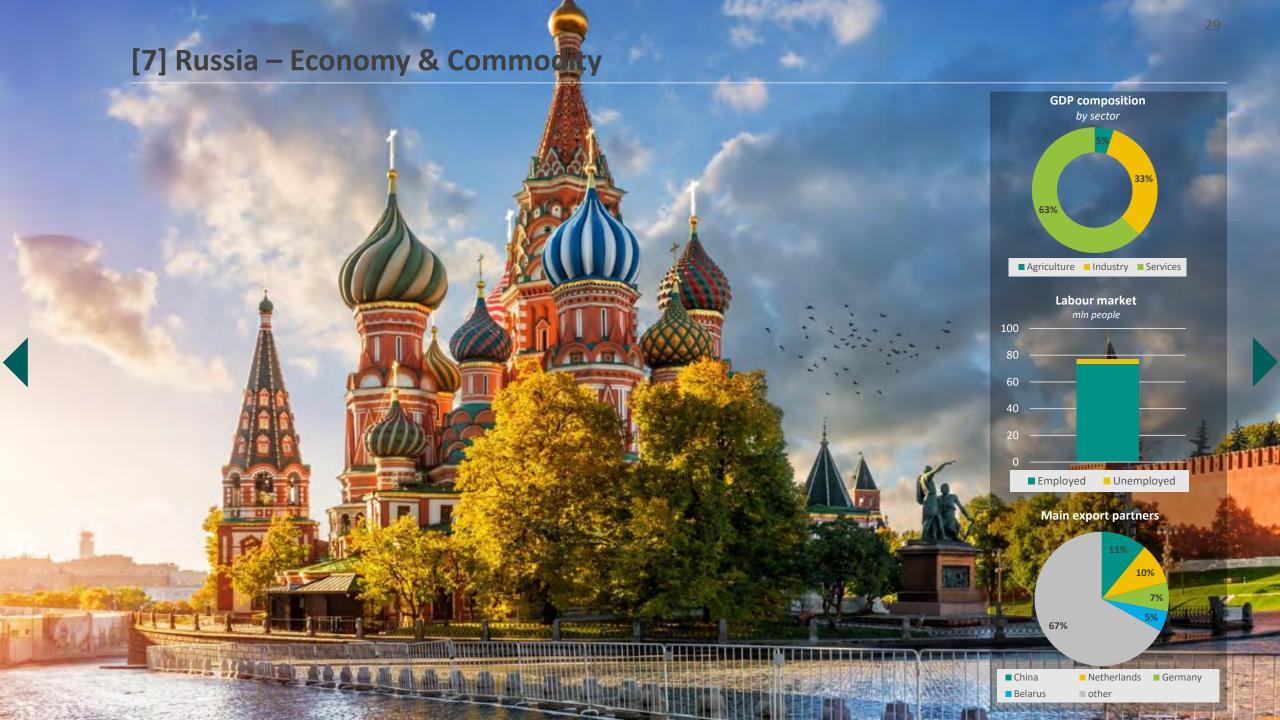
ECONOMY

- Weak government investment due to fiscal adjustments
- Loss of competitiveness due to overall business climate
- Rising social discontent and surge in populism
- Environmental threats like deforestation
- Changing attitude of current government towards indigenous organisations and NGO's

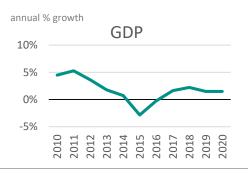
COMMODITY

- Delays in planned mineral project expansions
- Increasing freight costs
- Problems with sustainability issues
- Low oil prices could hurt the offshore production potential



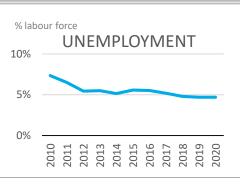


Russia – Economy Spotlight









Economic development

In 2014, when a drop in oil prices coincided with the imposition of US sanctions, Russia fell into a recession. The subsequent recovery has been sluggish. With growth running at 1.7% in 2017 and slightly above 2% in 2018, Russia's growth trend is still below its long-term average of around 3.5% over the last 20 years. While higher oil prices have mitigated the adverse impact of new sanctions over the last year, weak domestic factors such as a poor investment climate and longstanding structural inefficiencies are curbing economic growth.

Despite the uptick in salaries, real disposable income growth has remained sluggish in 2018, reflecting growing wealth inequality and an increase in indebtedness and servicing costs. That said, while growth was unimpressive in 2018, stability largely returned. Inflation has been addressed head-on by the Russian central bank, which increased rates unexpectedly twice last year. Moreover, the ruble has been less volatile and high oil prices have add to a further strengthening of the fiscal buffer.

"Russia to face below trend growth rates for the foreseeable future"

Economic outlook

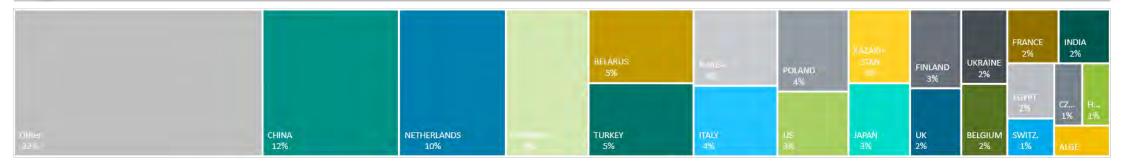
Growth is likely to remain moderate in 2019 and 2020, with growth levels of around 1-1.5%. We expect no sharp rise in consumption, as higher inflation, partly due to a VAT rise, will leave households with less purchasing power. Despite slightly less favourable global economic conditions, we still expect a modest recovery in oil prices to USD 70/bbl in 2020 for Brent from a current level of around USD 60/bbl, which will be positive for investment and consumption. On balance, we expect Russia to remain on course for expansion, but at a slow pace. While Russia may be more sanction-resilient than it was before 2014, it is still dealing with a low growth environment. The frail investment climate in Russia, resulting from weak property rights, a large state footprint in the economy and low competition, is not expected to improve soon. Some sectors with obsolete industry standards such as manufacturing are in desperate need of new investments in technology. Russia spends less than half of the OECD average on research and development. Therefore, the medium-term outlook remains bleak and we expect Russia to face below trend growth rates for the foreseeable future.





Russia – Trade Spotlight

Export trading partners



Main:

- export products

- import products

crude petroleum: 28%

packaged medicaments: 4%

(% share in respectively total export and import value)

3%

refined petroleum: 17%



petroleum gas: 6%



car parts: 3%



coal briquettes: 5%



wheat: 3%



aluminium: 2%



computers: 2%

Main

trade

trends



cars: 4%

Russia has a strong external sector

Main trading partner of Russia is China, with a share of 12% in total exports. The Netherlands and Germany are also big trading partners, which is mainly because of exports of gas to these countries. Energy commodities is by far the most important export product.

Oil is the most important export product of Russia, comprising around 60% of total export. The external sector contributes positively to GDP growth. In the first quarter of this year, goods exports were nearly stagnant in US dollar terms, as lower oil prices were offset by increased export volumes. That said, the increase in oil production is constrained by Russia's commitments under the OPEC+ agreement. From January 2018 a new fiscal rule allocated additional oil revenues (arising out of oil prices above USD40/bbl) to a newly created Sovereign Wealth Fund (SWF). This SWF is a merger between the old Reserve Fund and National Wellbeing Fund and its assets under management are estimated to be around USD100bn. After having fallen sharply in 2014-15, FX reserves are increasing again and stood at around USD400bn mid-2019 (covering over 10 months of imports).



Group Economics | Emerging Markets & Commodity Research

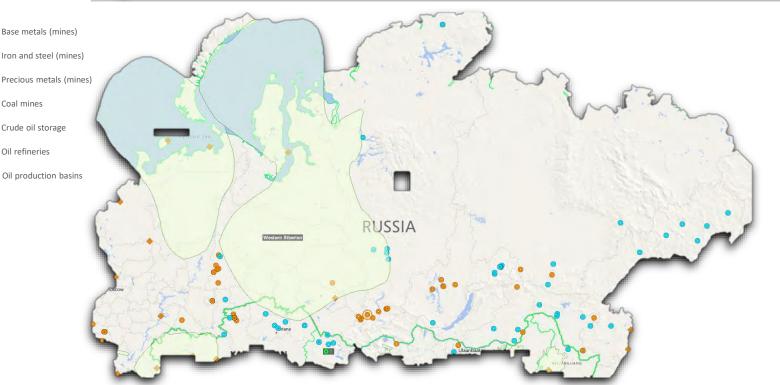


Base metals (mines)

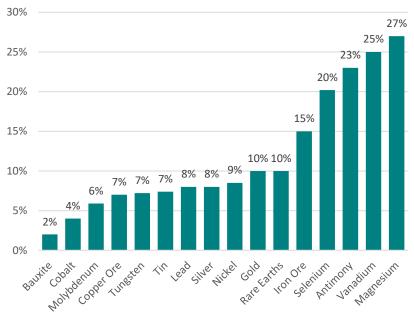
Coal mines

Crude oil storage Oil refineries

Russia – Commodity Spotlight







Major commodity producer in energy, metals and wheat

Russia is a commodity rich country, with especially high shares in production of energy commodities (oil and gas). Russia is heavily reliant on commodity exports and that makes it vulnerable to weak global economic growth and commodity price weakness.

Russia is the second largest oil producer in the world. Since 2000, Russian oil production grew from 6 mb/d to 11.5 mb/d at the end of 2018. Besides that, Russia is the largest supplier of natural gas towards Europe. Nevertheless, its share in the global gas production dropped to 18% in 2018 from nearly 30% in 1990. New export infrastructure projects to both the east and the west should safeguard their position as a reliable energy supplier during the coming decades.

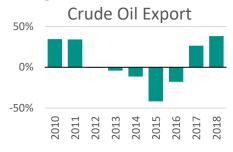
According to the USGS, Russia has high reserves in all kinds of industrial commodities. The country has rich pockets of minor metals, such as magnesium, vanadium, antimony and selenium. The reserves of iron ore are both high in quantity and quality. Russia also has high resources in other industrial minerals and ores, such as nickel, lead, tin, copper and bauxite. The Russian company Rusal is after China the biggest aluminium producer. Although Russia is not world's biggest wheat producer, the country is very dominant in the export market. It is world's biggest exporter of wheat, with a share of 21% in global exports.

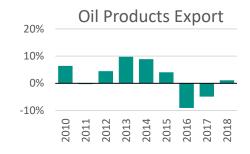
All-in-all, Russia is well positioned to further increase its global share in many commodity classes going forward, especially industrial minerals and energy commodities. Key factor for success is the level of investments in the mining sector going forward.

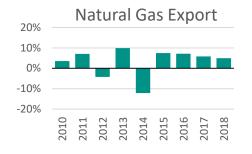
Markets & Commodity Research

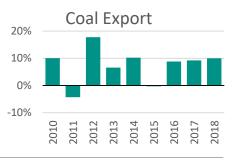
Russia – Commodity Spotlight











Commodity development

Russia joined a coalition which works together with OPEC oil producers in order to balance global oil supply and demand.

Nevertheless, Russia faces difficulty to comply with these agreements as domestic oil companies prefer to keep production intact and question Moscow's strategy to partner up with OPEC. The renegotiation with Ukraine regarding the gas transit pipeline contract — which transports gas from Russia to eastern Europe — will be tough. There is a significant risk that these negotiations fail, which could threaten the European gas supply and could trigger (European) gas price spikes. This reliance on the Ukraine transit pipelines is from a security-of-supply argument seen as one of the reasons to build Nordstream 2.

The export of many industrial metals (steel, copper, nickel) has decreased until July 2019 yoy. The exemption is the export of aluminium, which rose by 21% in the same period. Exports to the US recovered strongly in Q2 2019, after sanctions by the US on aluminium deliveries.

In wheat, Russia remains an important exporter. Tighter wheat supplies from Russia destined for international markets and aboveaverage wheat quality, underpinned prices. "With gas demand expected to increase in both Europe and Asia, Russia is seen as a crucial supplier of natural gas"

Commodity outlook

New export infrastructure projects to both the east and the west should safeguard Russia's position as a reliable energy supplier during the coming decades. On top of that, more LNG exports are expected. Primarily for gas exports towards Asia. But if the prices are low, Russian LNG could also towards Europe as seen in 2019. With gas demand expected more to increase in both Europe and Asia, Russia is seen as a crucial supplier of natural gas. Its oil production may face some harsh times during the coming years. It will become harder and harder to compensate natural depletion of new oil production new fields are more remote and technically complex to exploit.

Although Russia's new season export sales of wheat have started relatively slowly, mainly due to drought, the country will remain the largest exporter globally. Global consumption of wheat will probably climb further by 2% on a yearly basis.

In base metals, the US-China trade war uncertainty will continue to dictate market trends going forward. In the aluminium market, overcapacity will remain a tough hurdle to take, while the optimism over electric vehicle sector is positive for base metals demand. Industrial metals in general will remain challenged by government regulations (from economic policies to new environmental restrictions).



Strengths – Weaknesses – Opportunities - Threats

STRENGTHS

ECONOMY

- Rich resource base
- Large domestic market
- Sound economic and monetary policy
- Low sovereign debt levels
- Sound external liquidity situation

COMMODITY

- Abundant mineral resources
- Good quality minerals
- Low-cost production (energy)
- A producer of 39% of global palladium mining supply
- The government supports local mining industry

WEAKNESSES

ECONOMY

- Fragile political situation
- Sanction regime
- State interventionism
- Weak institutions and corruption
- Negative demographics (ageing population)
- Low degree of diversification

COMMODITY

- Poor transportation system
- High intern freight rates
- Inefficient mining technology
- Reliability/image
- Relative loose sustainability policies

OPPORTUNITIES

ECONOMY

- Deepening of financial markets
- Diversification of the economic base
- Development of SME sector
- Improve transparency and corporate governance
- Sanction relief

COMMODITY

- Investments in mining technology
- Upgrade of production facilities to increase efficiency and more sustainable processes
- European gas demand will rise in the coming years.

THREATS

ECONOMY

- Losing competitiveness
- Lower oil prices
- Shrinking population
- Political infighting
- Further deteriorating relationship with the US leading to further sanctions

COMMODITY

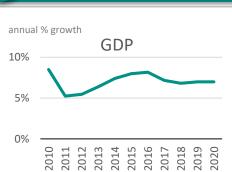
- International sanctions
- Dependent on few markets
- Strong reliance on gas exports to EU
- Renegotiation of Ukraine gas transit contract
- Problems with build of Nordstream2 pipeline towards Germany
- Limited access to technological development due to sanctions



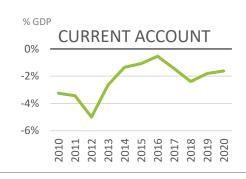
[8] India – Economy & Commodity

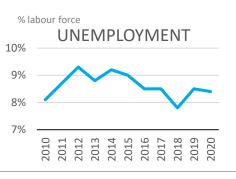


Group Economics | Emerging Markets & Commodity Research









Economic development

After having stuck by policy paralysis for years, Modi's strong mandate gained in 2014 (bolstered further in recent elections) opened the door for reforms. These are highly needed given challenges in the physical and institutional infrastructure. Modi started with low hanging fruit such as improving the business climate, but also succeeded in pushing through controversial reforms including a new bankruptcy code, a countrywide tax for goods and services and a currency clean-up. These moves led to better rankings on Doing Business (77/190) and Global Competitiveness.

After losing some of its popularity during his first term, Prime Minister Modi and his government coalition did well in the April/May elections, profiting from a flaring-up of tensions with Pakistan. Modi's Hindu-nationalist BJP secured a single majority in parliament and the broader National Democratic Alliance now holds 352 of the 543 seats (largest majority since 1984). The coalition also controls government in most states, although it lacks a majority in the Senate. Modi 2.0 has the potential to deepen reforms (including upgrading infrastructure), which would help India to reap its growth potential and regain the status of fastest growing giant.

"Modi 2.0 has the potential to deepen reforms, which would help India to regain the status of fastest growing giant"

Economic outlook

Over the past few years, economic growth has fallen quite significantly, from 8% yoy in early 2018 to a six-year low of 5% yoy in Q2-2019. This slowdown was primarily driven by lower domestic demand, with both private consumption and investment growth being subdued. Consumption is hit by rising unemployment and slowing wage growth. The cooling of investment is partly related to the deteriorating external backdrop, as escalating US-China tensions are feeding policy uncertainty and have driven manufacturing PMIs and investment down globally. That said, we still believe India is relatively shielded to these tensions compared to China and other east Asian countries, given that India is less exposed to the global business cycle. All-in-all, we have cut our economic growth forecasts for the current fiscal year to 6.5% and for the next fiscal year to 7.0%. We expect economic growth to recover from the current levels, assuming some further monetary stimulus (we expect another 50bp rate cuts in the coming quarters). On the fiscal front, the FY2019-20 budget contains some growth-supporting elements as well (e.g. a corporate tax cut for SMEs, plans to boost infrastructure financing and opening up certain sectors to FDI). Moreover, ongoing structural reforms and India's demographic dividend should be growth supportive as well.



India – Trade Spotlight

Export trading partners



Main:

- export products

- import products

refined petroleum: 10%

diamonds: 9%



packaged medicaments: 5%



iewellery: 3%



rice: 2%



crude petroleum: 18%

(% share in respectively total export and import value)

gold: 9%





coal briquettes: 5%



petroleum gas: 3%



telephones: 3%

Group Economics | Emerging Markets & Commodity Research

Main export trends



India's fast growth also reflected in stronger role in global trade

According to IMF data, India is currently the fifth largest economy worldwide (in nominal GDP terms). While its traction for the global economy and global trade is still much smaller than that of China and its dependence on trade is relatively limited in GDP terms, India has climbed up to the top 20 of largest exporters and the top 12 of largest importers. India imports structurally more goods than it exports, which is reflected in structural deficits on the trade balance of the current account. This is mitigated somewhat by structural surpluses on the services balance, partly reflecting India's position as an IT (outsourcing) hub.

India's key single export destinations are the US (16% in 2018 according to EIU data), followed by the UAE (9%). China (5%) and Hong Kong (4%). Cumulatively, the eurozone (around 8%) is also an important export destination. China is the single most important origin of Indian imports (14%), followed by the US (6%), Saudi Arabia (5%) and the UAE (also 5%). Product wise, according to EIU data (2018), engineering goods are the single most important export category, followed by petroleum products, gems and jewellery and agricultural products. Regarding imports, petroleum products are the single most important category, followed by electronic goods, gold and silver and machinery.

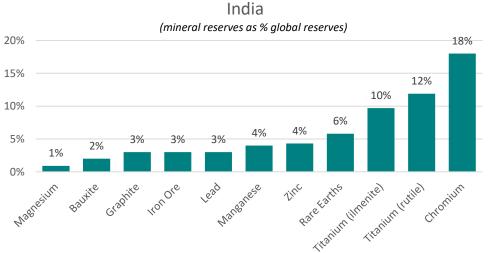
India – Commodity Spotlight



High gold, silver, energy demand, self sufficient in wheat & sugar

India is world's biggest sugar producer. Most of the sugar production is for domestic use, but increasing volumes of sugar find their way to export markets. Sugar exports by India, with a share of 10% in total exports, are expected to rise further. However, Brazil will remain the biggest sugar exporter in the years ahead with a share of 31% in total exports currently. Besides sugar, India also has significant stakes in the production and consumption of wheat. On international wheat markets, India is only a minor player. A vast proportion of its production is for domestic use. That is also the case in iron ore. It has a high resource base, which is mostly used to feed the domestic steel industry. India is also a large consumer of gold and silver.

Despite strong domestic reforms almost 20% of the Indian population has no access to electricity. Further modernisation will drive the growing need for energy. Threequarters of the electricity is generated by coal fired power plants. This is the direct result of large local coal resources which prevents energy import dependency.

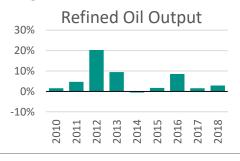




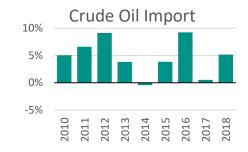
Markets & Commodity Research

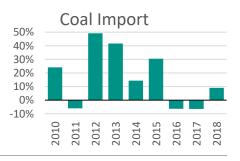
India – Commodity Spotlight











Commodity development

Growth in demand for resources in India has remained high over the past years. This is mainly due to the fast growing population and the increasing activity in construction, infrastructure and power sectors.

The Indian government has increased its role in commodity markets. In metal scrap, new policy curtails import of metal scrap and must lead to more self sufficiency. Also in sugar markets, the Indian government has approved a sugar export policy for the clearance of surplus stocks. Next to that, India has become the largest sugar producing country in the world during 2019.

India is self sufficient in wheat. The wheat market in India is currently oversupplied because of elevated production levels last season. This has caused inventories to build to new highs.

After China, India is the second biggest steel producing country in the world with a share of almost 6% in global output. This year, steel output increased by almost 5% until August yoy. Demand for steelmaking raw materials (iron ore and coking coal) has been high. India is for a large part self sufficient in iron ore. Growth in iron ore output is rising, mainly because of an approaching re-auctioning of mine leases under India's new mining policy.

"Energy demand per capita is still 40% below world average. This indicates a huge potential rise during the coming decades"

Commodity outlook

As a major consumer of energy, India aims for higher energy efficiency, which must be facilitated by government policies. Still market expectations show a rise in all types of energy in India during the coming years. India will be responsible for more than 50% of the growth of global coal demand. The government is opening new coal mines and expanding capacity. This comes despite an even larger expansion of the renewable energy capacity. Also, Indian gas imports will double towards 80 billion cubic metre in 2040.

According to the IEA, energy demand in India is almost as big as that of the US. However, energy demand per capita is still 40% below the world average. This indicates the huge potential rise in energy demand during the coming decades.

Output of wheat is expected to rise by 3% in the season 2019/20. This means that the Indian wheat market remains oversupplied and that provides export possibilities. In the sugar market, an export subsidy must relieve India from a huge stock overhang coming season. This will have a high impact on market conditions.

Iron ore capacity will expand in coming years. The new mining auction may contain eased environmental approvals, which means continued higher output levels next year.



Strengths – Weaknesses – Opportunities - Threats

STRENGTHS

ECONOMY

- Quite prudent macroeconomic policies
- Improving business climate under Modi, reflected in better rankings
- Government open to FDI, although some strategic sectors are protected
- Large population, well-educated, English-speaking, demographic dividend
- Strong FX reserves buffer

COMMODITY

- Large quantity of high quality resources (iron ore)
- Emerging global competitiveness
- Low labour costs
- Low usage of energy usage per capita

WEAKNESSES

ECONOMY

- Complex political system delays progress with sensitive reforms
- Bureaucracy and corruption
- Slow pace of privatisation in some sectors due to political situation
- Still many challenges in physical and institutional infrastructure
- Rigid labour laws
- RBI independence challenged (in terms of monetary policy and bank supervision)

COMMODITY

- Relative poor internal transportation system
- Outdated mining technology, less sustainable
- High environmental concerns
- Low R&D investments
- Largely depending on coal for power generation, leading to a further rise in carbon emissions

OPPORTUNITIES

ECONOMY

- Strong mandate of Modi means that prospects for further reforms are good
- Ongoing privatisation, also in financial sector
- New budget includes measures to restore health of the banking sector, including USD 700bn to support struggling public-sector banks

COMMODITY

- Considerable opportunities for future discoveries of sub-surface mineral deposits
- Stronger focus on exports
- Consolidation possibilities
- Large investments needed, especially in renewable energy and energy efficiency

THREATS

ECONOMY

•

- Infrastructure problems limit economic growth
- Indian banking sector faces
 challenges in the areas of shadow
 banking (illustrated by failures of
 several nonbank lenders) and weak
 asset quality at public banks (bad
 loans concentrated in power sector)
- Tensions with arch enemy Pakistan flare up from time to time (as illustrated by recent developments in Kashmir)

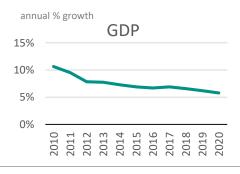
COMMODITY

- Governmental interference (e.g. export taxes) could discourage further investments
- Slow growth in infrastructural development
- Extra vulnerable to the impact of climate change (e.g. water) and often monsoon rains



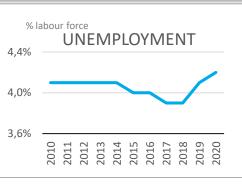
China – Ec

China – Economy Spotlight









Economic development

China's GDP per capita has risen by tenfold between 2000 and 2018. This illustrates China's impressive transformation over the past decades, particularly since WTO entry in 2001. Still, as the 'old' growth model based on public investment and exports has reached its limits, since a couple of years Beijing aims at shifting from investment/industry to consumption/services while moving up the value chain. While this transition will take years, services already surpassed industry in value-added terms and fast growing new technology sectors have taken over the baton from heavy industry. Still, it remains to be seen whether a country without political freedom will succeed in avoiding the middle income trap.

China's ambition to be world leader in high tech has made the US nervous. The escalation of the trade/tech conflict is currently the dominant risk for China, with tariffs being stepped up and decoupling visible in a collapse in bilateral trade and investment. Another key risk stems from high domestic debt, although Beijing's financial deleveraging campaign targeting the riskiest parts of the financial system (incl. shadow banking) has helped stabilisation. Moreover, with external debt levels manageable and FX reserves high, debt issues are mainly domestic, so the chance that a crisis will be triggered externally is low and Beijing has time to engineer an orderly deleveraging.

"China adds
piecemeal support
to offset the drags
from the trade/
tech conflict with
the US"

Economic outlook

China's gradual slowdown has continued in recent years. The escalation of the conflict with the US has added further drags to the economy. As a result, the macroeconomic policy stance has since mid 2018 changed from targeted tightening/ financial deleveraging to piecemeal monetary and fiscal easing. We still expect the authorities to refrain from aggressive, big bazooka stimulus, as that would run counter to their longer-term goal of stabilising overall leverage. Earlier this year, assuming US-China tensions to linger on, we cut our growth forecasts to 6.2% (from 6.3%) for 2019 and to 5.8% (from 6.0%) for 2020. We are below consensus for 2020, but consensus is moving gradually our way.

External risks are rising as well due to the US-China conflict. The current account surplus is almost gone now, as surpluses in goods trade are offset by rising deficits on the services and income accounts. FX reserves dropped by 25% in 2015-16 as capital outflows rose, but thanks to tighter capital restrictions and measures to stabilise the yuan the authorities gained control. FX reserves have recovered a bit and are still at high levels. Like in summer 2018, the Public Bank of China (PBoC) recently tolerated CNY weakness to offset the impact of more US tariffs, with CNY breaking 7 versus USD for the first time since 2008. We still do not expect the PBoC to tolerate a free fall though.

Group Economics | Emerging Markets & Commodity Research

Group Economics | Emerging Markets & Commodity Research



China - Trade Spotlight

Export trading partners

Main:

- export products
- import products



broadcasting equipment: 10%

integrated circuits: 13%

computers: 6%

crude petroleum: 9%



office machines: 4%





cars: 3%

telephones: 3% gold: 3%

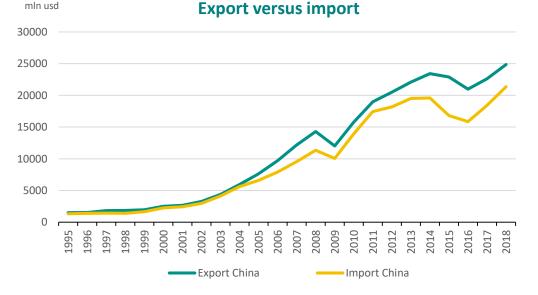


soybean: 2%

(% share in respectively total export and import value)



Main trade trends



China key player in international trade, commodity markets

China's impressive rise over the past decades is also reflected in a growing dominance in international trade and in commodity markets. China has surpassed the US and is the world's largest exporter, while it is the world's second largest importer following the US. China is also the biggest importer for a whole range of commodities. One of the main goals of China's cross-border infrastructure plan, the Belt & Road Initiative launched by president Xi in 2013, is to secure commodity inflows as well as improve transport routes for China's exports.

While the US is still China's key single export destination (19% in 2018), the share of Chinese exports destined for the US have fallen rapidly due to the trade/tech conflict. Hong Kong (12%) is also a very important export destination, given the territory's role as regional trade hub. Other important export destinations are Japan (6%) and South Korea (4%), but the eurozone (cumulatively around 10%) is clearly also important. China's most important origins of imports are South Korea, Japan and Taiwan - highlighting the importance of regional supply chains – followed (still) by the US. Single most important export item is electrical machinery, followed by telecommunication equipment (including iPhones), office machines and clothing and apparel. Most important import items are electrical machinery, oil (products), metalliferous ores and scrap and professional instruments.

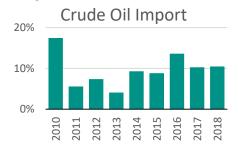
China – Commodity Spotlight



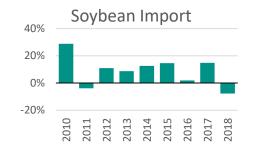
Markets & Commodity Research

China – Commodity Spotlight











Commodity development

Business climate in the Chinese mining sector has recovered during 2019. Next to that, mining output and fixed asset investments in the mining sector increased strongly until August this year.

China largely dominates the demand for iron ore, in order to feed the steel industry. Iron ore port stock in China and the import of iron ore decreased, while domestic iron ore output rose. All-in-all, China continues to produce too much steel. Overcapacity still remains a problem. Curbs in steel output is therefore a necessity, but the pace remains low. Base metals demand in China is relatively soft during 2019, mainly due to lower manufacturing activity.

China is ranking number 1 in the world when it comes to the capacity of and investments in installed renewable energy. Economic growth lead to an increase of energy demand per capita. The shift from an industry to services-based economy increases the need for more (clean) energy (mainly electricity) even more. Still, China is also the worlds largest importer of oil and gas. Especially the share of natural gas in its energy mix is growing fast.

Since the trade war with the US, China sources its soybeans mainly from Brazil. In order to become more self sufficient, the harvested area in soybean also increased strongly in China.

"China aims for self-sufficiency in commodities, such as metals, agriculturals"

Commodity outlook

For the long term, the Belt & Road initiative by China – which focuses on connectivity and cooperation between Eurasian countries – will provide a solid base for commodities demand. Other key drivers for growth in domestic metals demand are further electrification, urbanisation trend and growing population. This means that China will continue to invest in many commodity markets globally and aims to become more self sufficient in strategic commodities.

In agricultural commodities, the biggest growth in China sector is coffee. Consumption of coffee is growing at a very rapid pace.

China's share of coal in the energy mix is declining and is expected to half towards 2040. With more pipeline capacity to be installed, gas flows from Russia to China will continue to increase. This, and more LNG imports, will continue to boost the coal-to-gas switch. Investments in renewable energy are expected to remain strong. With a crude production of 3.8 mb/d, China is one of the top oil producers. However, due to a continuation of its energy needs, China will remain a net crude importer.

Chinese authorities will continue their efforts to reign in pollution.

This means that demand for high quality – and thus less polluting – commodities will remain high going forward.

ABN•



Strengths – Weaknesses – Opportunities - Threats

STRENGTHS

ECONOMY

- High, though declining growth potential
- Pro-active government, strong macroeconomic policy coordination
- Government strongly committed to maintaining macro-financial stability
- Very high FX reserves; FX debt levels still manageable
- 'Smartphone nation', leading in ecommerce with tech-hungry, early adapting consumers

COMMODITY

- High market share, important stamp on global commodity market trends
- Relative low labour & energy costs
- Availability of high mineral reserves
- Global competitiveness sectors
- Largest gold producer
- Largest investor in renewable energy
- Important stakeholder in the global climate debate

WEAKNESSES

ECONOMY

- High and rising debt levels, mainly outstanding to corporate sector
- High contingent liabilities from lower governments, SOEs and state banks
- Despite measures to reduce it, overcapacity still exists in some sectors
- Many heavily indebted SOEs lack a profitable business model
- High systemic risks in banking sector and underregulated shadow banking

COMMODITY

- Highly polluting industries
- Environmental issues
- Industries highly dependent on foreign supply minerals
- Highly dependent on commodity imports
- Energy demand is rising fast which leads to more dependency of imports

OPPORTUNITIES

ECONOMY

- Deepening financial markets, gradual opening up capital account
- Active policies to keep moving up value chain, specialising in high-tech new industries
- Its size and digitally connected people could make China next innovation powerhouse
- China is largest investor in clean energy and big issuer of green bonds

COMMODITY

- Belt & Road-initiative
- Fragmented mining sectors: mergers & acquisitions
- Urbanisation trends going forward
- Infrastructure demand & spending
- Modernisation outdated facilities
- Investments in mining projects
- Light industrial and residential sector requires more electricity and natural gas instead of coal

THREATS

ECONOMY

- Multifaceted strategic US conflict
- Policy failures and external shocks could trigger hard landing
- The West (not only US) will ask more level playing field from China
- Heavy environmental issues, particularly in large industrial areas
- Still challenging business climate (legal, operational) for foreign firms
- (Geo)political risks: Hong Kong, Taiwan, South China Sea

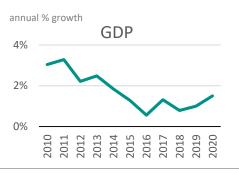
COMMODITY

- Government policies & control
- Environmental issues
- Structural overcapacity in sectors
- Marginal producers
- Trade barriers China vs. US/EU
- Increased demand for transportation fuels makes China the worlds largest oil consumer

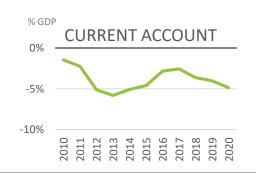


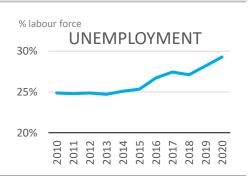


South Africa – Economy Spotlight









Economic development

South Africa is the most diversified and advanced economy in Africa, with a relatively high GDP per capita by regional standards. Still, compared to the other BRICS it is a small country. With a GDP of USD 370 bn, it represents around 0.5% of world GDP and 1.5% of the total BRICS size.

The economic structure has several weak spots, which reflects the legacy of apartheid. Crime, bureaucracy, corruption, restrictive labour regulations, structurally high unemployment levels combined with a lack of qualified labour and inadequate infrastructure are factors constraining overall competitiveness. Its rankings on structural indicators such as Doing Business indicator, Global Competitiveness and Corruption Perceptions have steadily deteriorated. As a result GDP growth slowed from an annual average of 3.6% between the end of apartheid in 1994 and 2008, to 1.6% between 2009 and 2018 during the presidency of Jacob Zuma.

Lower commodity prices, a severe drought, labour strikes, electricity disruptions and political uncertainty ahead of the 2019 elections contained growth in 2018 to 0.8%.

"The economic structure has several weak spots, which reflects the legacy of apartheid"

Economic outlook

The current president Cyril Ramaphosa tries to restore economic growth by tackling corruption and mismanagement of state-owned enterprises, by attracting foreign investment and by implementing market friendly reforms such as trimming public spending and privatization. However business confidence remains weak. Uncertainty about property rights prevails given that the constitutional decision on allowing expropriation without compensation is still pending. GDP growth is expected to increase from 1% in 2019 to 1.5% in 2020.

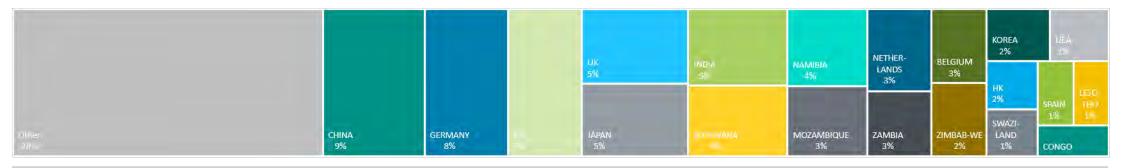
Structural weaknesses, increased debt to income ratios of households, the negative impact of recent rating downgrades and international uncertainty will prevent a stronger recovery. The room for monetary stimulus is limited. After a temporary slowdown inflation inched up again to 4.5% due to high food prices following rainfall shortages, elevated electricity tariffs and the rise of the VAT rate. In addition the depreciation of the rand makes imports more expensive. To keep inflation within the target range of 3-6%, the central bank raised its policy rate to 6.75% end 2018, but has lowered it again to 6.5% in July.





South Africa – Trade Spotlight

Main trading partners



Main:

- export products

- import products

√ gold: 16%

crude petroleum: 8%

diamonds: 9%

refined petroleum: 6%

platinum: 8%

cars: 6%



broadcasting equip.: 3%



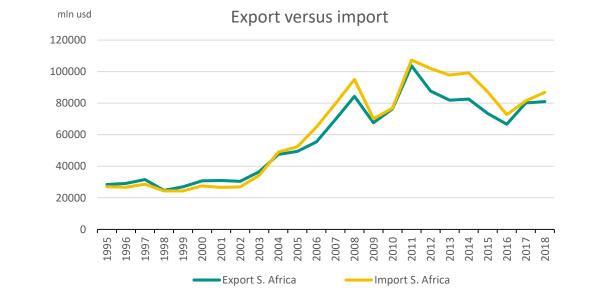
iron ore: 4%

car parts: 2%

Markets & Commodity Research

(% share in respectively total export and import value)

Main trade trends



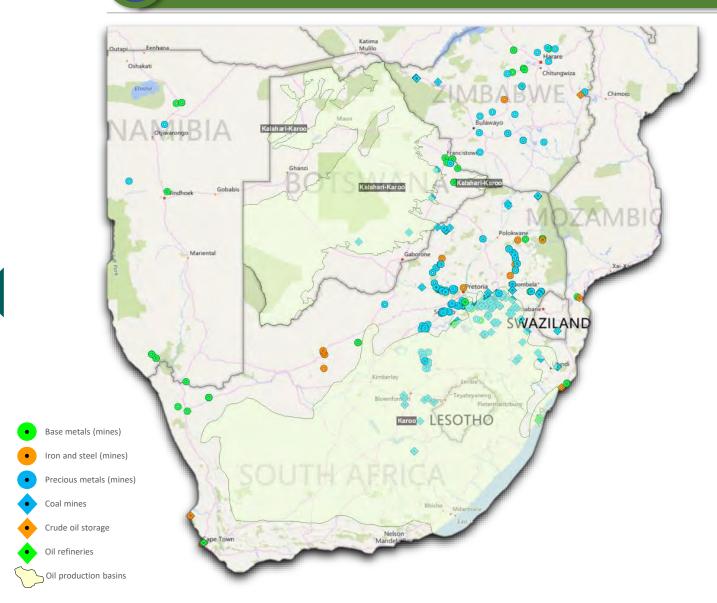
South Africa's export revenues disappoint

South Africa's is a relatively open economy, with a share of foreign trade to GDP of 70%. Road, rail and port infrastructure is relatively well developed. However, the mining and manufacturing sectors, which are important contributors to export earnings, suffer labour unrest and the rise in wage costs. Export revenues disappoint due to the end of the commodity boom, weakened export demand and the unfavourable development of resource prices.

Meanwhile the propensity to import intermediate and investment related goods is high. Consequentially the already substantial current account deficits will continue to rise, from 2.5% in 2017 to 4.5% of GDP in 2020. The current account is primarily financed by highly liquid short term portfolio flows and international borrowing. In combination with the relatively high inflation rate this places the country among the most vulnerable for a negative turn in investors appetite. The free-floating rand has weakened considerably since March 2018 as a consequence. We think the rand could weaken further in the short term. In the course of 2020 the rand could recover if the central bank succeeds in containing inflation and political uncertainty disappears to the background.



South Africa – Commodity Spotlight



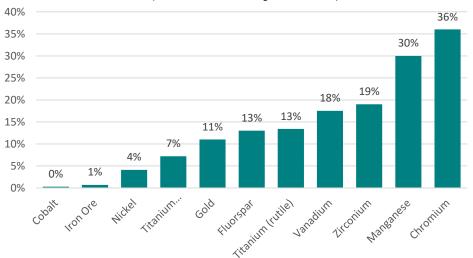
High stakes in precious metals, rich in iron ore

South Africa is rich in industrial minerals and ores. The country has high volumes of reserves in minor metals, such as chromium, manganese, zirconium, vanadium, titanium and fluorspar. The export markets for these commodities is, however, relatively small. The iron ore market is a high growth market, especially connected to the economic developments in China. China has invested significantly in South Africa iron ore mining in order to decrease dependency of foreign markets.

South Africa is a major producer of palladium (38% of global palladium supply) and platinum (72% of global platinum supply).

South Africa is a net energy importer (oil and gas). The country is a large producer of coal: for domestic use (approximately 75%) and exports (approximately 25%), mainly to Asia (China, India and Japan).

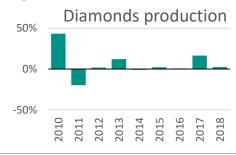
S. Africa (mineral reserves as % global reserves)

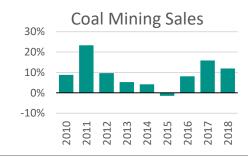


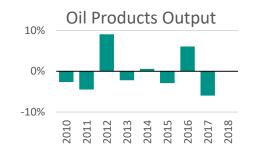


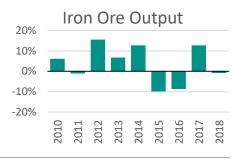
South Africa – Commodity Spotlight











Commodity development

A softer rand and stronger commodity prices since 2016, resulted in higher mine earnings. But over the past few years, the mining share in the economy has drifted lower.

Around 15% of the population does not have access to electricity. The rise in electricity access is mainly met by the rise of renewable energy. Around 75% of its power generation is done by locally mined coal. 25% of the coal production is exported to Asia. South Africa is a net importer of oil and gas.

Wage negotiations and strikes happen regularly in the mining industry. This impacts operations in platinum, palladium, coal and iron ore mining. Big mining companies are restructuring their operations meaning closing unprofitable shafts and cut jobs. The all-in-cash costs to mine platinum is far above the current market price. These challenging conditions (wage negotiations and unprofitable operation) are being felt.

In the first seven months of 2019, iron ore mining sales have increased by 64% on a yearly basis, while mining output decreased by 7% in the same period. The sector benefitted of the strong increase in the iron ore price during 2019.

"South African rand volatility and softening international trade flows will hinder mining sector"

Commodity outlook

Not only volatility in the South African rand will remain a challenge for the miners, also the softening global trade flows will hinder activity.

Since Asian demand for coal imports is likely to decline in the coming decades due to a rise in local renewable energy and a fight against air pollution, South Africa will feel the economic and social impact of these lower exports. Although the electricity generated by renewable energy is often cheaper than the electricity generated in coal-fired power plants, many citizens simply cannot afford to buy solar panels and, especially in rural areas, they are therefore dependent on the large electricity grid. In rural areas, renewable energy is seen as the better option, but the usage of wood for coking and heating is still a cheaper alternative. Because of the fast resources of platinum and palladium in South Africa, higher prices for these precious metals support the economy. In the past, challenges at the platinum miners would be translated into the prospect of possibly lower platinum supply. But the diesel-gate and lower demand for diesel cars have suppressed prices. In addition, stricter emission regulation will result in a higher content of platinum in car converters. This will support platinum prices. Over the past years, palladium prices have increased strongly because of supply-shortages. But since market conditions have normalised somewhat and price weakness is on the cards.





Strengths – Weaknesses – Opportunities - Threats

STRENGTHS

ECONOMY

- Relatively wealthy with high GDP per capita
- Well diversified and advanced economy
- Important (financial) hub for investments to Sub Sahara Africa
- Relatively well developed financial markets and a sound banking sector
- Transport infrastructure (roads, rail and air)

COMMODITY

- Massive reserves of iron ore
- Competitive due to low-cost domestic mining
- Accounts for 72% of world's platinum mining
- World's 4th coal producer

WEAKNESSES

ECONOMY

- Structurally high (youth) unemployment in combination with an inflexible labour market.
- Lack of qualified labour and inadequate infrastructure
- High inequality and high crime levels
- Corruption and bureaucracy

COMMODITY

- Low scale mineral reserves
- Mineral sector highly dependent on foreign developments
- Vulnerable to platinum price weakness
- Largely depending on usage of domestic coal to generate electricity
- Net importer of oil and gas

OPPORTUNITIES

ECONOMY

- Structural labour market and education reforms to Improve productivity
- Improve the institutions and reduce corruption and red tape
- Facilitate the development of SME
- Boost economic growth without increasing the fiscal and the current account deficit

COMMODITY

- Investments in mineral projects (both greenfield and brownfield)
- Renewable energy is seen as the better alternative, and in large parts of the country there is no burden of existing energy infrastructure

THREATS

ECONOMY

- Rising twin (fiscal and current account) deficits
- Rising social unrest and prevalence of frequent strikes
- Rise in risk aversion in global markets
- Further rating downgrades
- Call for expropriation of land without compensation by more radical sectors of the ruling ANC

COMMODITY

- Government interference
- Environmental issues
- Largely depending on coal exports, which will decline if Asian demand will drop due to more renewable energy and the fight against air pollution







BRICS - Outlook

	BRAZIL	RUSSIA		CHINA	S. AFRICA
Credit rating*	42	53	56	80	50
Ease Doing Business**	124	28	63	31	84
Economic outlook	moderate growth	moderate growth	above trend growth	favourable growth	moderate growth
- main economic risk	Weak fiscal position, weak institutions, low savings	Negative oil price shock	Weak banking sector	Conflict with US	High unemployment and high crime levels
- main economic opportunity	High level of investments in renewable energy, infrastructure	Diversifying the economy	High growth potential	High, though declining, growth potential	Enhance productivity by improving human capital
Resource dependency	high	high	medium	high	low
- main resources vulnerability	commodity price volatility and Brazilian real fluctuations	strong focus on oil/gas; vulnerable to price volatility	resources industry is highly underdeveloped	external dependency on many commodities	lack of investments, poor infrastructure development
- main resources opportunity	abundancy commodities offering investment opportunities	wide natural resource base, with many strategic minerals	industry liberalisations attracts external investors	foreign direct investments in resources development	intensifying exploration and resource development

BRICS Outlook

From a macro-economic perspective, the concept of the BRICS has lost some, but not all of its relevance. Almost 20 years after Jim O'Neill presented the BRIC acronym, we can conclude that only China and India have succeeded in structurally outperforming the advanced economies. China has transformed into a key engine of global growth, has moved up the value chain and is the most creditworthy amongst the BRICs. We believe China will keep relatively high, but slowing growth rates in the foreseeable future, although the escalation of tensions with the US adds to downside risks. India is in a strong position to regain the status of fastest growing giant and could reach the top 3 of largest economies by 2025, provided that the 2nd Modigovernment will continue with structural reforms. Meanwhile, economic performance of the commodity producers Brazil, Russia and South Africa have not succeeded in structurally outperforming the advanced economies. We expect a pick-up in growth for these countries, but not to levels similar to China/India. All in all, the BRICS will remain relevant, as they are not only the largest emerging economies but also key commodity producers and consumers.

The resource dependency of Brazil, Russia and China is high. Brazil is a large agricultural commodities producer, while Russia is a big energy commodity producer. Both countries have abundant resources. The economies of these countries also benefit strongly from the export of industrial materials and minerals resources. Brazil and Russia are, however, highly exposed to commodity price volatility. China, on the other hand, is the biggest consumer of a wide variety of commodities. Its dependency on external deliveries of these commodities is high and that is a supply risk. We believe that China will stay the biggest commodity consumer in the next decade. It will continuously invest in commodity resources abroad in order to be become more self sufficient. India has a good chance of becoming a commodity powerhouse in the next decade. The country already has vast industrial and agricultural resources. Given the fast economic growth and expansion, we believe that the pace in commodity demand growth will accelerate in the coming decade, alongside the growth of its economy. The dependency of South Africa on commodities is low and will remain low. That is mainly due to the lack of investments in the sector and the absence of mining knowledge and skills. In this sense, an increase in Chinese investments in South Africa can help further development.

^{*} Average score of combined long term sovereign debt credit ratings by major credit rating agencies (via Trading Economics); maximum score is 100, which is the prime grade; the lower the score, the higher the risks; ** Ease of doing business 2019 ranking according to World Bank; from 1 = best (New Zealand) to 190 = worst (Somalia)





BRICS - Final thoughts

BRICS: in the next decade still a macroeconomic...

The remarkable economic rise of China, particularly since its access to the World Trade Organization in 2001, has been the most important factor in the rising share of emerging economies in global production and trade. Also amongst the BRICS, China is the dominant player. Meanwhile, China's rise, its technology ambitions and its alternative model of state capitalism has led to resistance in the western world, particularly the US. The escalation of trade, technology and wider tensions between the US and China – including the stepping up of import tariffs and the implementation of restrictions on strategic investment and foreign investment – is a remarkable break from the previous episode of increasing globalisation. There are signs that decoupling between the US and China has already started and it is uncertain as too how far that process could go. That said, China will continue to leave its mark on the global economy and on commodity markets. China will also remain an important stakeholder in the global climate debate, given that the country is not only a big polluter but also a big investor in clean energy and a big issuer of green bonds. As China will continue to slow as its economy matures, investor focus will turn more and more on India. If the 2nd Modi government succeeds in deepening reforms, India's catch-up potential and democratic dividend will help the country regaining the status of fastest growing emerging giant. India, the world's largest democracy, is a strategic partner of the US in Asia. Its economic traction is still much smaller than that of China but that will change, as its economy becomes larger and larger and average wealth levels get higher. Brazil, Russia and South Africa will not follow a similar path as China or India, but will remain key regional players, relative large emerging markets and key producers and consumers of all sorts of commodities. The five BRICS are all participating in the G20 and in 2011 created the BRIC Forum to encourage commercial, political and cultural cooperation. All in all, we still think that the BRICS are certainly relevant from a macro economic and commodity perspective, but one should look beyond BRICs as well to look for dynamic, fast growing emerging markets.

...and commodity heavyweight

Many BRICS-countries have abundant resources for many years to come to supply global markets and/or to feed the domestic industries. This means that the BRICS will continue to dominate commodity markets. In most cases, the quality of the ores, minerals and agriculturals from BRICS is good. Together with the low cost base, this means that the position of the BRICS will remain strong going forward. Labour and energy costs are relatively low, but also supportive government policies in relation to commodity markets help to underpin competitiveness. This does not always create a level playing field in international markets and will continue to be a challenge in global trade relations in years to come. The opportunities for the BRICS are numerous. For the long term, the Belt & Road-initiative by China – which focuses on connectivity and cooperation between Eurasian countries – will provide a solid base for commodities demand. Next to that, further global electrification, urbanisation, higher infrastructural & construction spending and also the growth of the middle class will provide a solid base for commodities demand in the next decade. The commodity complex is subject to structural change, via modernisation of commodity industries (refining, mining) and an increase of mergers & acquisitions in the years ahead. And commodity challenges for BRICS remain. The most important challenge is addressing sustainability in relation to commodity markets. Outdated technology, low R&D investments and relative loose sustainable policies will keep the environmental concerns elevated in the years ahead. More stringent policies are a necessity. Besides this, the infrastructural bottlenecks will continue to hamper commodity markets and are a key challenge in the years ahead. Finally, governmental interference in commodity markets is mostly discouraging for future (foreign) investments. This poses a major obstacle in further development of commodity markets.

All economic and commodity issues considered, we believe that the BRICS will remain an emerging commodity coalition for many years to come.



[12] Contact details, sources & disclaimer

Name	Role	Area of expertise	E-mail	Phone
Marijke Zewuster	Head Emerging Markets & Commodity Research	Latin America, Africa	marijke.zewuster@nl.abnamro.com	+31 20 383 05 18
Nora Neuteboom	Senior economist	Russia, Eastern Europe, Turkey	nora.neuteboom@nl.abnamro.com	+31 20 343 77 31
Arjen van Dijkhuizen	Senior economist	Asia	arjen.van.dijkhuizen@nl.abnamro.com	+31 20 628 80 52
Hans van Cleef	Senior economist	Energy	hans.van.cleef@nl.abnamro.com	+31 20 343 46 79
Farah Abi Morshed	Economist	Energy	farah.abi.morshed@nl.abnamro.com	+31 6 109 528 89
Georgette Boele	Senior economist	Precious Metals	georgette.boele@nl.abnamro.com	+ 31 20 629 77 89
Casper Burgering	Senior economist	Industrial Metals & Agricultural Commodities	casper.burgering@nl.abnamro.com	+31 6 109 760 34

For more information about this publication, please contact **Casper Burgering**

For this publication the following sources were consulted and used:

Refinitiv (former: Thomson Reuters Datastream & Eikon), GFMS, Bloomberg, Argus Metals, CRU, World Coal Association, World Steel Association, Mining Journal, USGS, AME, Eurofer, World Aluminium Association, International Copper Study Group, International Zinc & Lead Study Group, World Nickel Association, International Grains Council, International Sugar Organisation, International Cocoa Organisation, USDA, OECD Statistics, EU Statistics (Eurostat), FAO Statistics, World Bank, IMF, CIA Factbook, Enerdata, Economist Intelligence Unit (EIU), Trading Economics, World Energy Council, EPI, SDSN, GSCI, Our World in Data, UNCTAD, OEC

For more economic and commodity insight, please visit our website: ABN AMRO Insights

Photography: Shutterstock

DISCLAIMER

This document has been prepared by ABN AMRO. It is solely intended to provide financial and general information on economics and commodities. The information in this document is strictly proprietary and is being supplied to you solely for your information. It may not (in whole or in part) be reproduced, distributed or passed to a third party or used for any other purposes than stated above. This document is informative in nature and does not constitute an offer of securities to the public, nor a solicitation to make such an offer. No reliance may be placed for any purposes whatsoever on the information, opinions, forecasts and assumptions contained in the document or on its completeness, accuracy or fairness. No representation or warranty, express or implied, is given by or on behalf of ABN AMRO, or any of its directors, officers, agents, affiliates, group companies, or employees as to the accuracy or completeness of the information contained in this document and no liability is accepted for any loss, arising, directly or indirectly, from any use of such information. The views and opinions expressed herein may be subject to change at any given time and ABN AMRO is under no obligation to update the information contained in this document after the date thereof. Before investing in any product of ABN AMRO Bank N.V., you should obtain information on various financial and other risks and any possible restrictions that you and your investments activities may encounter under applicable laws and regulations. If, after reading this document, you consider investing in a product, you are advised to discuss such an investment with your relationship manager or personal advisor and check whether the relevant product –considering the risks involved- is appropriate within your investment activities. The value of your investments may fluctuate. Past performance is no guarantee for future returns. ABN AMRO reserves the right to make amendments to this material.

© Copyright 2019 ABN AMRO Bank N.V. and affiliated companies ("ABN AMRO)



[13] Appendix 1

Sustainability Rankings Initiatives (see sheet 20)

Sustainable Competitiveness Rankings (2017)

http://solability.com/the-global-sustainable-competitiveness-index/the-index

The Global Sustainable Competitiveness Index (GSCI) measures competitiveness of countries in an integrated way. It is calculated based on 111 measurable, quantitative indicators derived from reliable sources, such as the World Bank, the IMF, and different UN agencies. The 111 indicators are grouped into 5 sub-indexes - Natural Capital, Resource Efficiency & Intensity, Intellectual Capital, Governance Efficiency, and Social Cohesion.

Environmental Performance Index (2018)

https://epi.envirocenter.yale.edu/epi-topline

The 2018 Environmental Performance Index (EPI) ranks 180 countries on 24 performance indicators across ten issue categories covering environmental health and ecosystem vitality. These metrics provide a gauge at a national scale of how close countries are to established environmental policy goals. The EPI thus offers a scorecard that highlights leaders and laggards in environmental performance, gives insight on best practices, and provides guidance for countries that aspire to be leaders in sustainability. The EPI is produced jointly by Yale University and Columbia University in collaboration with the World Economic Forum.

World Energy Trilemma (2018)

https://trilemma.worldenergy.org/

The World Energy Council's Energy Trilemma Index tool, produced in partnership with Oliver Wyman, ranks countries on their ability to provide sustainable energy through 3 dimensions: Energy security, Energy equity (accessibility and affordability), Environmental sustainability. The ranking measures overall performance in achieving a sustainable mix of policies and the balance score highlights how well a country manages the trade-offs of the Trilemma with "A" being the best. Use this interactive Index to assess the sustainability of national energy policies.

Sustainable Development Report (2019)

https://www.sdgindex.org/

The Sustainable Development Report 2019 presents the SDG Index and Dashboards for all UN member states and frames the implementation of the Sustainable Development Goals (SDGs) in terms of six broad transformations. It was prepared by teams of independent experts at the Sustainable Development Solutions Network (SDSN) and the Bertelsmann Stiftung. The Index and ranking were designed based on the 17 Sustainable Development Goals which were unanimously adopted in 2015 by the 193 member states of the United Nations. These goals aim to reconcile economic prosperity with reduced inequalities and to address issues related to biodiversity loss and the climate crisis.

