

# The imperative of domestic resource mobilization

Brahima S. Coulibaly @BSangafowaCoul

Director and Senior Fellow, Africa Growth Initiative, Global Economy and Development, Brookings Institution

In 2018, the economic outlook across sub-Saharan Africa will continue to improve as the non resource-intensive economies expand at solid rates while the resource-intensive ones consolidate recoveries from the 2014 terms of trade shock. The latest projections have the region's aggregate gross domestic product (GDP) growth rising further this year, albeit at a subdued 3.4 percent rate, from a trough of 1.4 percent in 2016. Thereafter, growth strengthens to almost 4 percent by 2022.

This aggregate contour masks significant differences across countries. Importantly, the recovery will remain tepid in Angola, Nigeria, and South Africa, the continent's largest economies,¹ with growth averaging under 2 percent—which is below the rate of population growth—over the next five years. These large economies are at risk of a lost decade unless policymakers implement significant reforms to shift the growth model away from excessive reliance on oil in Angola and Nigeria and, in the case of South Africa, to overcome structural problems—many inherited from the apartheid era.

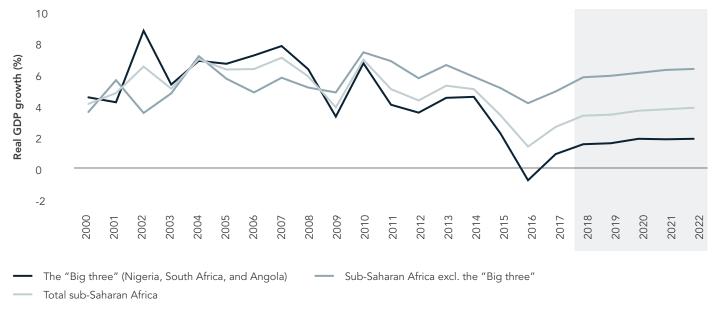
Half of the economies in sub-Saharan Africa will expand over the next five years at an average rate similar to or higher than the rate that prevailed in the heyday of the "Africa rising" narrative.

Excluding these large economies or focusing on the country-level growth rates reveals a significantly brighter outlook. Aggregate growth for the region rises to 5 percent in 2018 and reaches 6.4 percent by 2022 (Figure 2.1). About half of the world's fastest-growing economies will still be located on the continent, with over 20 economies expanding at an average rate of 5 percent or higher over the next five years, faster than the 3.7 percent rate for the global economy. **Ghana, Ethiopia, Côte d'Ivoire, Senegal, Rwanda, Tanzania, Burkina Faso, Sierra Leone, Benin**, and **Guinea** will continue to be the top-10 performers this year, respectively. Importantly, as shown in Figure 2.2, half of the economies in sub-Saharan Africa will expand over the next five years at an average rate similar to or higher than the rate that prevailed in the heyday of the "Africa rising" narrative between 2000 and 2014, suggesting that it might be premature to call for end of the region's economic promise.

<sup>1.</sup> Angola, Nigeria, and South Africa make up 56 percent of the region's aggregate GDP estimated at market exchange rates.

### FIGURE 2.1. THE EFFECT OF NIGERIA, ANGOLA, AND SOUTH AFRICA ON AGGREGATE REAL GDP GROWTH IN SUB-SAHARAN AFRICA

Economic growth in sub-Saharan Africa is rebounding with support from strong growth in the region's smaller economies.



Source: International Monetary Fund, World Economic Outlook database, October 2017.

#### TABLE 2.1. TOP AFRICAN ECONOMIC GROWTH PERFORMERS OF 2017-2018

The same 10 countries in 2017 will also be the top 10 economic growth performers in 2018, though some movement occurs within this group. For example, Ghana is predicted to grow at 8.9 percent in 2018 compared to 5.9 in 2017. In addition, overall, these estimates are higher than in 2017.

Top performers based on 2017 growth estimates	
Country	GDP growth (%) in 2017
Ethiopia*	8.5
Côte d'Ivoire	7.6
Senegal	6.8
Guinea	6.7
Tanzania	6.5
Burkina Faso	6.4
Rwanda	6.2
Sierra Leone	6.0
Ghana	5.9
Benin	5.4

Top performers based on 2018 growth estimates	
Country	GDP growth (%) in 2018
Ghana	8.9
Ethiopia*	8.5
Côte d'Ivoire	7.3
Senegal	7.0
Rwanda	6.8
Tanzania	6.8
Burkina Faso	6.5
Sierra Leone	6.1
Benin	6.0
Guinea	5.8

\*Fiscal year data.

Source: IMF Regional Economic Outlook, October 2017.

# Sub-Saharan Africa can multiply its success stories. Donors can help.

Ngozi Okonjo-Iweala @NOIweala Board Chair, Gavi, the Vaccine Alliance Distinguished Visiting Fellow, Center for Global Development Former Finance Minister of Nigeria

#### **Brian Pinto**

Adviser, African Development Fund Policy Innovation Lab

Nancy Birdsall @nancymbirdsall President Emeritus and Senior Fellow, Center for Global Development

In 2014, the IMF hosted its "Africa Rising" conference in Mozambique. Three years later, Mozambique defaulted on its debt. Steven Radelet's upbeat 2010 book on Emerging Africa<sup>2</sup> opened with a glowing summary of Ghana's achievements. By 2015, Ghana was back in an IMF program due to worsening macroeconomic fundamentals.

Yet many of the world's poorest countries in sub-Saharan Africa have shown they can reform and improve governance. The Heavily Indebted Poor Countries Initiative and Multilateral Debt Relief Initiative supported by the world's major donors in the early 2000s took \$75 billion in debt off the benefiting countries' balance sheets—see the March 2016 World Bank-IMF update<sup>3</sup> and motivated wide-ranging macroeconomic and structural reforms that reduced poverty. Along with rapid growth in China and the commodity price boom, the result was a decade of high growth across the region.

But the momentum is fizzling out. In a new round of tough reforms, African leaders will need to do the heavy lifting. Africa is still poor, and not yet able to finance the investments critical to a new round of growth and poverty reduction. Here's what donors could do:

1. Help jump-start a big push on regional infrastructure to knit together many small economies and create economies of scale for local producers. requires attracting FDI since even the best-managed countries in sub-Saharan Africa (consider Rwanda, Côte d'Ivoire, or Senegal) cannot rely on market financing because maturities are too short and interest rates too high.

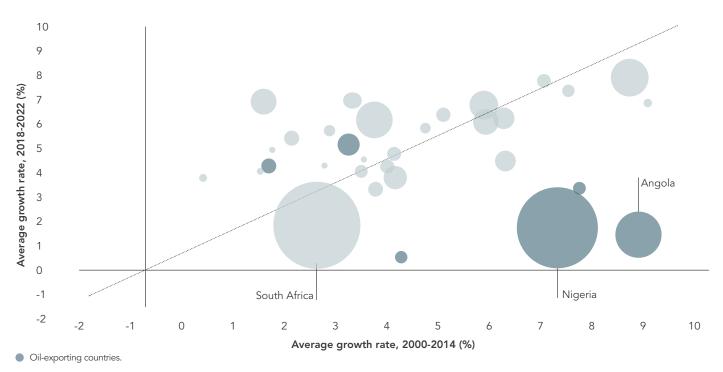
- To find the money, securitize a small portion of the over \$40 billion in annual aid flows that sub-Saharan Africa now receives, as outlined in a recent Project Syndicate article,<sup>4</sup> to finance the public portion of public-private "blended" investments in major cross-border power and transport (the Lagos-to-Dakar highway is a good example)—with benefiting countries servicing these loans, which will be superior to market alternatives on cost and maturity.
- 3. Tie this new front-loaded money (which will get the attention of the private sector worldwide) to a higher bar for reforms as set out in a recent article by Luisa Teixeira Felino and Brian Pinto,<sup>5</sup> thus creating a bridge to African self-reliance.

Africa needs a new round of success stories. Success requires a big push not just on infrastructure but also on sustained policy and institutional reform. African leaders must take the lead. Donors can help.

- 2. Radelet, S. (2010). Emerging Africa: How 17 Countries Are Leading the Way. Brookings Institution Press.
- International Monetary Fund (2016). Heavily Indebted Poor Countries (HIPC) Initiative
   And Multilateral Debt Relief Initiative (MDRI)— Statistical Update. Available at http://www.imf.org/external/np/pp/eng/2016/031516.pdf.
  For more details on this plan, see our proposal, "A Big Bond for Africa," in *Project Syndicate* at https://www.project-syndicate.org/commentary/africa-regional-infrastructure-investment-bond-by-nancy-birdsall-and-ngozi-okonjo-iweala-2017-04?barrier=accessreg.
- at https://www.brookings.edu/blog/future-development/2017/10/17/a-bridge-to-african-self-reliance-the-big-bond/

#### FIGURE 2.2. REAL GDP GROWTH ACROSS SUB-SAHARAN AFRICAN COUNTRIES

The region's three largest economies, South Africa, Nigeria, and Angola, are expected to grow at a slower pace during 2018-2022 than between 2000-2014.



Note: Bubble sizes represent the relative size of each country's economy in terms of its 2017 GDP in current USD. Source: International Monetary Fund, World Economic Outlook database, October 2017.

Sustaining the economic momentum or, in the case of oil exporters, regaining it will require more efforts from their governments to mobilize domestic resources as external financing conditions will prove more difficult.

Even with relatively bright economic prospects in several countries, the challenges facing the region's economies are daunting, particularly in the financing environment. Sustaining the economic momentum or, in the case of oil exporters, regaining it will require more efforts from their governments to mobilize domestic resources as external financing conditions will prove more difficult.

# Revenues from commodity exports will still be lower in 2018

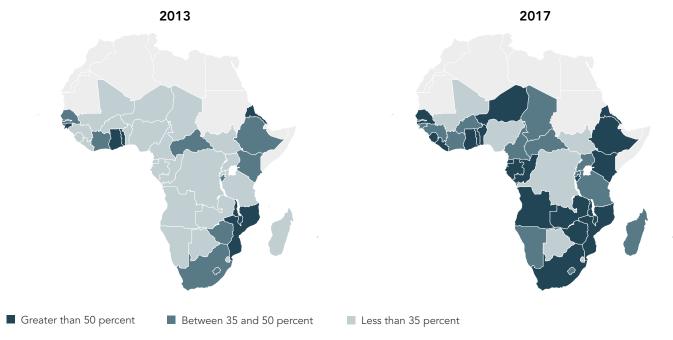
First, the relatively subdued outlook for several commodity prices will deprive many countries of vital export earnings to help finance their economic agendas. Although commodity, notably oil, prices have stabilized and generally been on the rise since 2016, they are projected to remain below pre-2014 levels, and the adjustment of oil-dependent economies to lower oil prices is still incomplete. These economies will continue to experience balance-of-payment pressures and loss of fiscal revenues. The necessary fiscal consolidation to preserve macroeconomic stability will entail further cuts in spending and require larger financing from alternative sources to sustain growth.

# Rising public debt limits continued reliance on debt financing

Second, the scope to issue public debt to finance economic development will be more limited. Government debt, which has been an important source of financing,

### FIGURE 2.3. TOTAL PUBLIC DEBT AS A PERCENTAGE OF GDP IN SUB-SAHARAN AFRICAN COUNTRIES

Public debt levels rose rapidly between 2013 and 2017 across the continent.



Source: International Monetary Fund, World Economic Outlook database, October 2017.

Government debt, which has been an important source of financing, has risen rapidly and is now approaching critical levels in some countries. has risen rapidly and is now approaching critical levels in some countries. The average public debt as a percent of GDP rose from 40 percent in 2013 to an estimated 56 percent in 2017, and debt levels now exceed 50 percent in 25 of the 45 sub-Saharan African countries, compared to just 11 in 2013 (Figure 2.3). Debt service ratios have also risen rapidly. The median debt service-to-revenues ratio in the region increased from 5 percent in 2013 to an estimated 10 percent last year; it is particularly high in oil-dependent countries where it likely exceeded 25 percent in 2017. Amid concerns about debt sustainability and other risks, several countries across the continent with sovereign ratings were downgraded over the past year, which puts upward pressures on external financing costs.

# African economies remain vulnerable to tighter monetary policies in advanced economies

Third, the outlook for monetary policy in advanced economies points to continued reduction of policy stimulus. In 2017, the Bank of Canada and the Bank of England joined the Federal Reserve in reducing monetary policy accommodation. This year, the European Central Bank is expected to join its peers. A synchronized reduction of monetary policy accommodation in the advanced economies could push up global interest rates, resulting in a rapid increase in the cost of external financing for African economies. Moreover, an important and worrisome feature of the debt accumulation is the dominance of external debt, particularly that denominated in foreign currency. As monetary policy accommodation is reduced in the advanced economies, it could also contribute to depreciations of local currencies across sub-Saharan Africa against hard currencies and further raise debt ratios and debt servicing costs. A policy priority in 2018 should be to ensure that the debts are sufficiently hedged against both currency and interest rates risks.

A policy priority in 2018 should be to ensure that the debts are sufficiently hedged against both currency and interest rates risks.

# The future of overseas development assistance is becoming more uncertain

Finally, the outlook for overseas development assistance, which has been an important source of financing for some countries, is increasingly uncertain. Discontent with globalization and changing political environments are causing governments in some advanced economies to revisit their commitments to development assistance. In some cases, large portions of funds earmarked for development assistance are being reallocated to more immediate humanitarian needs.

## It is imperative that Africa mobilizes more domestic resources

The challenging external financing environment due to these various factors underscores the imperative for African countries to step up domestic resource mobilization efforts to help finance economic agendas more sustainably.

Most sub-Saharan African countries suffer from perennially low domestic saving rates, which average just 15 percent of GDP-among the lowest in the world. These low saving rates fall significantly short of financing needs. Based on projections in the International Monetary Fund's World Economic Outlook, the saving rates on the continent will remain around 15 percent over the next five years, while investment rates will average 21 percent of GDP. This trend suggests an external funding gap of 6 percentage points of GDP. In reality, the financing needs gap is even wider because historical experience suggests that countries at this stage of economic development need investment rates close to 30 percent of GDP or higher over a sustained period to achieve economic transformation. At the desired investment rates, the funding gap rises to 15 percent of GDP, which amounts to an annual funding gap of about \$275 billion. Filling this large void with external financing alone will entail substantial current account deficits and make the economies prone to balance of payment crises and macroeconomic instability. This conundrum highlights the importance of boosting domestic saving rates. The good news is that, across Africa, the scope for domestic resource mobilization is great.

#### There is room to boost tax revenues

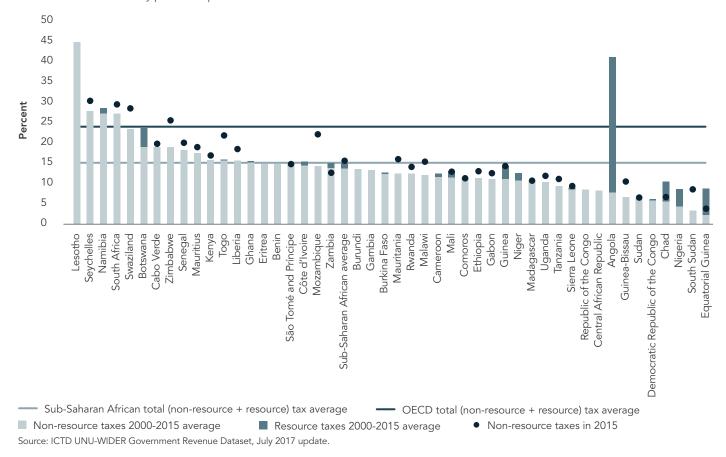
First, tax revenues are low. This state of affairs reflects not only the region's prominent informal economy, but also inefficiencies in revenue collection. Average tax revenues (excluding social contributions) stand at about 15 percent in sub-Saharan Africa, compared with 24 percent in OECD countries (Figure 2.4). For several economies, revenues are below 10 percent of GDP. Non-resource tax revenues are particularly low in some resource-intensive economies, suggesting there is scope to mobilize more revenues from the non-resource sectors. For example, in **Angola, Chad**, and **Nigeria**, revenues from non-resource sectors are only about 5 percent of GDP. The excess reliance on resource revenues exacerbates the effect of declines in commodity prices on these economies. In contrast, **Lesotho, Namibia, Seychelles, South Africa**, and **Swaziland** have been more successful, with revenue collection comparable to or even exceeding the OECD average. The lessons learned from these countries may provide useful guidance to others striving to promote tax revenue mobilization.

Most sub-Saharan African countries suffer from perennially low domestic saving rates, which average just 15 percent of GDP—among the lowest in the world.

The good news is that, across Africa, the scope for domestic resource mobilization is great.

#### FIGURE 2.4. TAX REVENUES AS A PERCENT OF GDP, AVERAGED FROM 2000-2015

Generally, resource-intensive countries underperform in generating non-resource taxes, as seen in Angola, Chad, Equatorial Guinea, and Nigeria. A focus on generating revenues from non-resource sectors, however, could not only boost their overall tax revenues, but also protect their economies from commodity prices slumps.



#### Countries must more efficiently manage natural resources wealth

Second, the continent is endowed with vast amounts of natural resources. Yet, these domestic resources are generally not managed efficiently. The most recent Resource Governance Index indicates that no sub-Saharan African country has a "good" rating in natural resource governance, and only Ghana and Botswana have "satisfactory" ratings (Figure 2.5). All other countries have "weak" or "poor" ratings, and seven of the world's bottom 10 performers with "failing" governance scores are in Africa, including the **Democratic Republic of the Congo, Equatorial Guinea**, and **Zimbabwe**.

#### Leaders must heighten efforts to combat illicit financial flows

An estimated \$50 billion or more per year is lost to illicit capital outflows, roughly equivalent to the net official development assistance flows to the region in 2015.

Third, an estimated \$50 billion or more per year is lost to illicit capital outflows, roughly equivalent to the net official development assistance flows to the region in 2015.<sup>2</sup> These illicit flows deprive economies of important domestic resources and should be halted (see Figure 2.6). Effectively curtailing them will require great determination from governments and civil societies as well as cooperation of other countries outside of Africa where these funds are invested. The savings pool of the African diaspora, including remittances and diaspora bonds (see Michael Famoroti's viewpoint in this chapter), could also be important and reliable sources of financing, and governments should explore ways to facilitate the mobilization of these resources.

<sup>2.</sup> Total net official development assistance flows from the Organization for Economic Cooperation and Development's (OECD) Development Assistance Committee (DAC) countries, multilateral organizations, and non-DAC countries to Africa amounted to \$42.7 billion in 2015.

# **Debt by diaspora: Ties that bond**

Michael Famoroti @Mikey\_Fam Chief Economist, Vetiva Capital Limited

Long seen as the Brain Drain continent, Africa looks to reap greater dividends from its diaspora, beyond the \$40 billion the World Bank estimates it receives in remittances. In 2011, Ethiopia floated a diaspora bond to fund the Grand Ethiopian Renaissance Dam. More recently, Nigeria successfully issued a \$300 million bond to fund infrastructure projects in the country.

Diaspora bonds are simple. A country issues foreign-currency debt targeted at nationals living outside its borders, hoping to benefit from a patriotic dividend that offers lower pricing. If successful, the issuer receives crisis-resilient foreign-currency funding; in return, the diaspora is given a chance to contribute their quota to national development.

Remittances are only a fraction of annual diaspora savings, believed to be more than 3 percent of regional GDP for sub-Saharan Africa alone. In Ghana, diaspora savings may be as high as 85 percent of

gross national savings.

They are also potentially game changing. Remittances are only a fraction of annual diaspora savings, believed to be more than 3 percent of regional GDP for sub-Saharan Africa alone. In Ghana, diaspora savings may be as high as 85 percent of gross national savings.

To tap into this pool of capital, African governments must learn from the mistakes of the past—both theirs and others. For example, Ethiopia's first diaspora bond collapsed over environmental concerns and mistrust of the government. And outside Africa, Nepal's issue was significantly undersubscribed once it decided to offer well-below market rates.

Regulation and culture are even trickier, yet provide avenues for short-term redress. After Ethiopia's state-owned electricity company got into hot water with the United States Securities & Exchange Commission (SEC) over its 2011 diaspora bond issue, Nigeria sidestepped such concerns, registering its bond with both the SEC and the United Kingdom Listing Authority. For diaspora, the tax and legal status of their bond holdings is a crucial variable in assessing the attractiveness of the offering.

But for diaspora bonds to work on the continent, African nations must establish stronger ties with their diaspora. Israel, the most prominent success story of diaspora bonds, has a diaspora legacy that dates back to the 1950s. Other countries have gotten in on the act—Georgia recently established a Ministry of Diaspora Affairs, and Ireland has developed an aggressive strategy for courting its successful diaspora and, crucially, supporting its struggling ones.

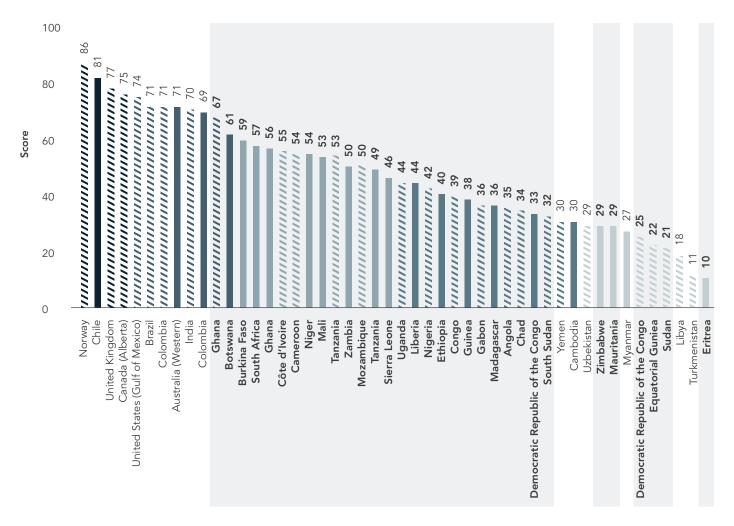
But for diaspora bonds to work on the continent, African nations must establish stronger ties with their diaspora.



African countries may be taking note—Nigeria signed a Diaspora Bill into law in 2017. More can still be done, particularly in terms of marketing long-term development plans to diaspora and permitting them more influence in politics and society. The latter seems so obviously beneficial as it presents an avenue for the Brain Drain continent to benefit from its exceedingly talented diaspora. The message should be simple: Africa needs your money, but it could use your skills too.

#### FIGURE 2.5. RESOURCE GOVERNANCE INDEX SCORES FOR SELECT COUNTRIES

Despite the high endowment of natural resources on the continent, many African countries struggle with efficient resource management according to the Resource Governance Index. The figure below shows all sub-Saharan African countries on the index, as well as the top and bottom 10 performers globally. Not one sub-Saharan African country has a "good" rating, and seven of the bottom 10 are located in the region.



- ➤ Oil and gas Mining Sub-Saharan African countries
- Good, greater than or equal to 75: a country has established laws and practices that are likely to result in extractive resource wealth benefiting citizens, although there may be some costs to society.
- Satisfactory, 60-74: a country has some strong governance procedures and practices, but some areas need improvement. It is reasonably likely that the eventual benefits are weak.
- Weak, 45-59: a country has a mix of strong problematic areas of governance. Results indicate that resource extraction can help society, but it is likely that the eventual benefits are weak.
- Poor, 30-44: a country has established some minimal procedures and practices to govern resources, but most elements necessary to ensure society benefits are missing.
- Failing, less than 30: a country has almost no governance framework to ensure resource extraction benefits society. It is highly likely that benefits flow only to some companies and elites.

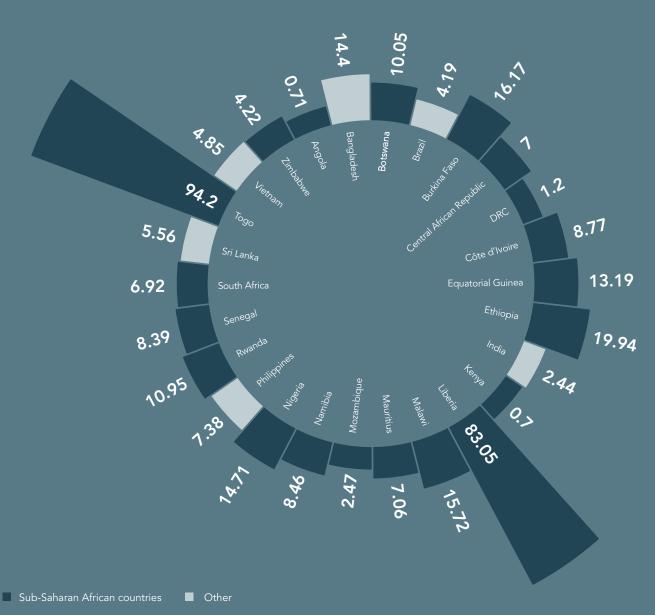
Note: The countries selected include all sub-Saharan African countries, as well as the top 10 and bottom 10 performing countries in the index. Source: 2017 Resource Governance Index, Natural Resource Governance Institute.

# Illicit financial flows in sub-Saharan Africa

Around \$50 billion or more per year is thought to be lost from sub-Saharan Africa in terms of illicit financial outflows. Sub-Saharan Africa ranks the highest in the world when it comes to illicit financial outflows, which measured between 5.3 to 9.9 percent of its total trade in 2014. Notably, the

amount of these flows differs greatly from country to country. Global Financial Integrity tracks illicit inflows and outflows for countries around the world. The figure below shows the midpoint estimate of illicit financial outflows over 2005-2014 as a percent of total trade.

#### (Total illicit outflows as a % of total trade)



Source: Global Financial Integrity, 2017. *Illicit Financial Flows to and from Developing Countries: 2005-2014.* 

#### Leverage technology to enhance domestic revenue mobilization

Domestic resource mobilization can also be greatly enhanced through continued development of financial sectors to offer more instruments to incentivize private savings and through financial inclusion to reduce informality. Advancement in technology presents opportunities for governments to do so. For example, earlier in the year, Kenya offered the world's first mobile-only retail bond with a subscription level as low as \$30 and a coupon rate of 10 percent (see Chapter 5 for a more in-depth discussion on this new tool). The bond, which was taken up mainly by small savers, allowed the government to tap into a new pool of funds and low-income Kenyans to earn interest on their savings. Technology also provides an opportunity to enhance revenue, modernize and streamline tax collection processes, seal leakages, and boost revenues. In Ethiopia, for example, the adoption of electronic sales register machines since 2008 has led to significant increases in reported sales and tax payments.<sup>3</sup>

In sum, a more difficult external financing environment lies ahead for African countries, precisely at a time when financing needs for economic development—especially to gain traction on the Sustainable Development Goals—are growing. Efforts along all fronts to boost domestic saving rates will go a long way to narrow the funding gap sufficiently for external financing to fill the remaining void without compromising macroeconomic stability. In addition, governments should resort more to innovative financing mechanisms, such as blended finance or public-private partnerships and other risk mitigation mechanisms, to crowd in more private sector investment and help preserve the solvency of public sector balance sheets.

#### **REFERENCES**

Ali, M., A. B. Shifa, A. Shimeles, F. Woldeyes. 2017. "Building Fiscal Capacity: The Role of ICT", Working Paper Series N° 290, African Development Bank, Abidjan, Côte d'Ivoire.

International Monetary Fund (IMF). 2017. Sub-Saharan Africa Regional Economic Outlook: Fiscal Adjustment and Economic Diversification. Washington, DC: IMF.

Natural Resource Governance Institute (NRGI). 2017. Resource Governance Index. New York, NY: NRGI.

United Nations Economic Commission for Africa (UNECA). 2015. Report of the High Level Panel on Illicit Financial Flows from Africa Commissioned by the AU/ECA Conference of Ministers of Finance, Planning and Economic Development. Addis Ababa, Ethiopia: UNECA.

3. See Ali et al. (2017) for more discussion.

# **Urban Africa: Avoiding the perfect storm**

#### Jeff Gutman

Senior Fellow, Global Economy and Development, Brookings Institution

#### **Nirav Patel**

Research Analyst, Global Economy and Development, Brookings Institution

About 40 percent, or nearly 1 billion people, of sub-Saharan Africa live in an urban area today. Over the next 25 years, that number is expected to double, raising unprecedented challenges for the region. The confluence of this rising urban population, relatively low income per capita, and a lack of infrastructure are serious causes for concern. As the region already confronts critical deficits in infrastructure and related funding, the looming crisis in the provision of urban infrastructure, especially transport, requires particular attention.

As the region already confronts critical deficits in infrastructure and related funding, the looming crisis in the provision of urban infrastructure, especially transport, requires particular attention.

Projecting the level of infrastructure funding required for urban Africa is fraught with complexities. The continent requires an annual \$93 billion to fund infrastructure needs, a large share of which is for urban areas. In fact, a 2016 African Development Bank study states that "two-thirds of the investments in urban infrastructure to 2050 have yet to be made."

The infrastructure gap is notably reflected in the inadequacy of transport infrastructure in African cities. Compared with access to electricity, water and sanitation, and telecommunications, defining a target for urban

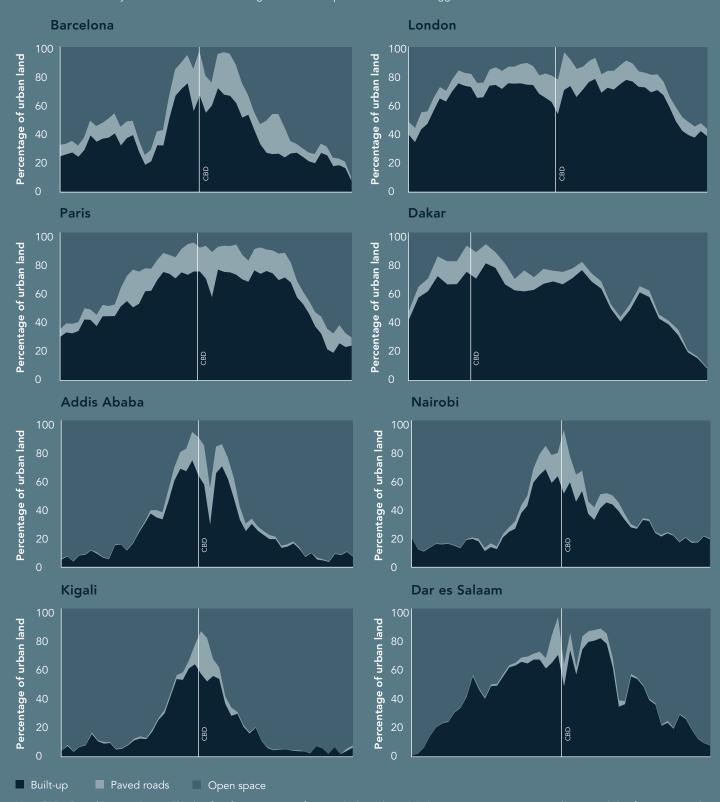
transport access is not clear-cut. Yet, it is evident that African cities are physically fragmented and dispersed with a lack of connective infrastructure. Compared with Paris, for instance, much of the area surrounding the central business districts of many of Africa's largest cities are without paved roads (Figure 2.7). This poor infrastructure leaves people and firms disconnected, constraining their accessibility to economic opportunity. Such inefficiencies in the design of the city can make urban living costs burdensome and jeopardize the potential benefits of agglomeration.

Africa's scope for public capital investment is well under what it ought to be if we compare it to other developing regions. Urban income levels in Africa are well below the levels witnessed in other regions when those regions reached an urbanization rate of 40 percent (Figure 2.8). When combined with the relatively high cost of living in African cities (Figure 2.9), there are very limited resources for public investment. This dearth is part of the reason that capital investment in Africa over the past 40 years has only averaged about 20 percent of GDP. In contrast, between 1980 and 2011, rapidly urbanizing countries in East Asia averaged capital investment above 40 percent of GDP, bringing many economic boons to the region and its cities.

Without a substantive revenue source and ability to pay, there are limited options to fund and finance urban transport. Concessional resources from the donor community have traditionally shied away from urban capital investments nor are they of sufficient scale. More recent efforts to attract private capital are more difficult in urban transport because of the lack of

### FIGURE 2.7. RELATIVELY FEWER PAVED ROADS IN AND AROUND AFRICAN CITIES CONSTRAIN ECONOMIC OPPORTUNITIES

Compared to developed country cities, paved roads occupy a smaller share of urban land in Africa and usually drop off abruptly beyond the city center. This inefficiency often increases cost of living and obstructs potential benefits of agglomeration.



Note: CBD= Central Business District. The data for African cities come from very high-resolution (<1m) imagery using a semiautomated supervised classification approach (leveraging both textural and spectral data). The images are circa 2012 for Nairobi and Kigali, circa 2013 for Dar es Salaam, circa 2014 for Dakar and circa 2011 for Addis Ababa. The European data come from the Urban Atlas, published by the European Environment Agency (EEA) (http://www.eea.europa.eu/data-and-maps/data/urban-atlas). The layers in this atlas were created in 2010, based on 2005-07 imagery. The central business district was identified using the location of the oldest building as a proxy (or a government building if necessary).

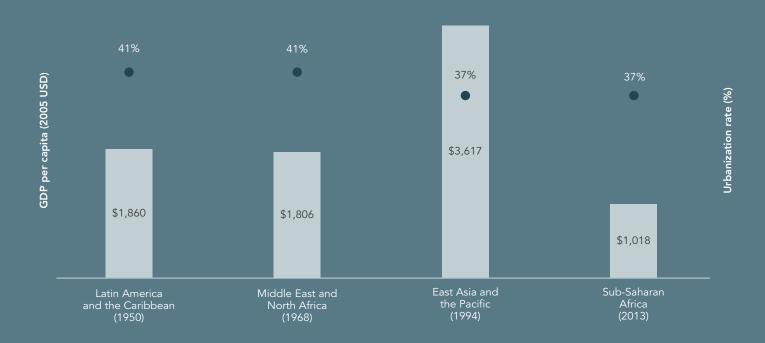
Source: Data from Antos, Lall, and Lozano-Gracia 2016 and Felkner, Lall, and Lee 2016.

a revenue stream. Private participation in infrastructure in Africa has been more directed at information and communications technology and, to a more limited degree, to energy and transport in terms of sectoral and country coverage.

If Africa is to avoid the perfect storm that these trends imply, it will need "out-of-the-box" thinking particular to its unique context. While there are various opportunities and initiatives to finance equitable and sustainable urban growth in Africa, at the center of any effective effort is the issue of land in terms of the efficiency of transport provision as well as a source for funding. Getting land policy right and resolving the range of issues unique to African land will be key to supporting private sector growth, ensuring ample and affordable housing, and securing resources for infrastructure and other urban development needs.

#### FIGURE 2.8. GLOBAL URBANIZATION RATES AND GDP PER CAPITA

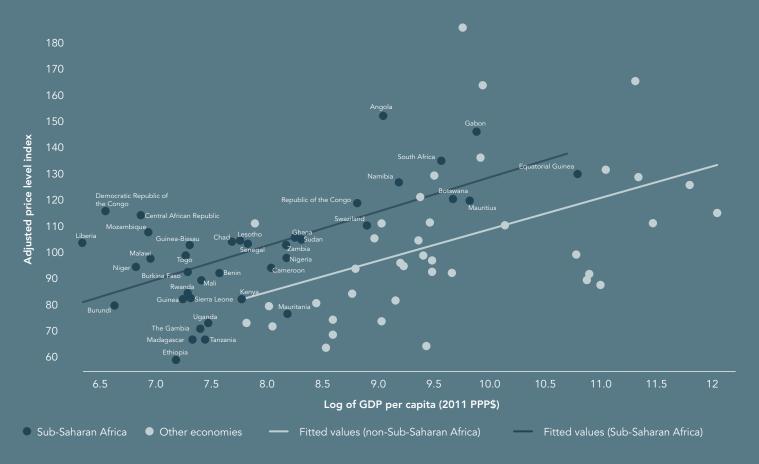
Though Africa is urbanizing at rates close to other developing regions, its significantly lower GDP per capita constrains financing from public capital investment. African countries, thus, may need to rely on other sources of funding.



Source: Lall, Somik Vinay; Henderson, J. Vernon; Venables, Anthony J. 2017. Africa's Cities: Opening Doors to the World. Washington, DC: World Bank.

#### FIGURE 2.9. AFRICAN CITIES FACE HIGH PRICES FOR THEIR CURRENT INCOME LEVELS

Urban living costs in sub-Saharan African countries in 2011 exceeded costs elsewhere, relative to Africans' lower per capita GDP.



Note: The adjusted price level index (PLI) for household consumption excluding housing rent is standardized so that the average PLI equals to 100. PLIs for 15 Asian countries are inflated by 10 percent.

Source: Nakamura et al. 2016, based on data from the 2011 International Comparison Program (ICP) and the World Development Indicators.

#### **REFERENCES**

African Development Bank, Organization for Economic Co-operation and Development, United Nations Development Program. 2016. African Economic Outlook 2016: Sustainable Cities and Structural Transformation.

Foster, Vivien and Cecilia Briceno-Garmendia. 2009. *Africa's Infrastructure: A Time for Transformation*. Africa Development Forum Series. Washington, DC: World Bank. http://documents.worldbank.org/curated/ en/2009/01/11487313/africas-infrastructure-time-transformation.

Gutman, Jeffrey; Sy, Amadou; Chattopadhyay, Soumya. 2015. Financing African Infrastructure: Can the World Deliver? Washington, DC: The Brookings Institution. https://www.brookings.edu/wp-content/uploads/2016/07/AGIFinancingAfricanInfrastructure\_FinalWebv2.pdf.

Lall, Somik Vinay; Henderson, J. Vernon; Venables, Anthony J.. 2017. Africa's Cities: Opening Doors to the World. Washington, DC: World Bank. https://openknowledge.worldbank.org/handle/10986/25896.

Private Participation in Infrastructure Database, World Bank, 2017.

The Guardian (2016) Africa's urbanisation 'megatrend' needs to deliver growth, says report. https://www.theguardian.com/global-development/2016/jun/07/africa-urbanisation-megatrend-needs-to-deliver-growth-says-report.

# The G-20 Compact with Africa: African-driven programs

#### **Paul Collier**

Professor of Economics and Public Policy, Blavatnik School of Government, Oxford University

Structural features are driving Africa forward. Its demographics will dominate the global supply of young workers; its rural-urban transition will be at its peak, raising productivity; Chinese infrastructure is improving connectivity; and the fall in commodity prices forces diversification beyond natural resources. These changes open opportunities for investment. But Africa has been too complicated to attract much attention. Investing in Africa needs to get easier.

The G-20 accepts that Africa, like Asia, will be led out of poverty by those governments that pioneer change.

The G-20 Compact with Africa can bring change. Governments and agencies have recognized that Africa will develop through private investment. The G-20 has recognized that African governments themselves hold the key to breaking investor wariness of the continent. Preaching, cajoling, and paying African governments to say things they did not mean has changed to a menu of commitments that governments are free to make or ignore. The G-20 accepts that Africa, like Asia, will be led out of poverty by those governments that pioneer change. The compacts will help the most ambitious governments lead the way.

I have helped design this approach. Initially, a common reaction was that without money on the table, no African government would show interest. Now 10 governments are actively developing their own compacts. These plans combine practical detail and high-level commitment. For each, an integrated team of officials from the government and international agencies works on policy specifics clustered into three investor concerns: building a stable macroeconomic environment; providing a transparent and straightforward business environment; and deepening sources of investment finance. Governments choose their focus, and for each there is a further choice of suggested commitments. Once government commitments are determined, the complementary commitments that agencies and G-20 governments can make are negotiated. Again, there is no prior commitment for specific support, but there is a presumption of coherence.

These coherent packages of commitments will lower the costs and risks of investment. Since each process is driven by the government, no two compacts will look the same. But to be acceptable for the G-20, each must be credible, marking a quantum change to its chosen objective. Highlevel commitment from the G-20 has turned the new approach from a short-lived initiative into an enduring process: A standing committee will maintain momentum and provide continuity.

Over time, the new actions of the Compact with Africa governments, matched by complementary actions of supporting G-20 governments and the new investments that are attracted, will help change the realities on the ground. They will be tracked on the website www.CompactwithAfrica.org, administered by the IMF. As the compacts deliver, other governments will join. This is the lesson from Asia: Change happens not by reluctant governments being coerced, but as successful pioneers get emulated.