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Editor

Investment and Competitiveness in Africa

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Introduction

Africa's recent economic history has been marked by a paradox. Sub-Saharan Africa (SSA) recorded an average growth rate of 6.8 % between 2004 and 2008 and 5.05 % between 2009 and 2014.[1] However, this high growth episode that compared favorably with all other regions except East Asia and South Asia was accompanied by a modest rate of investment and poor global ranking and limited progress in its Global Competitiveness Index. With respect to investment, in 2000, SSA had a ratio of Gross Capital Formation as a percentage of its Gross Domestic Product (GDP) that was equal to 16 %; in 2014, it was 22 %. These figures appear to be low because for the two main emerging countries of the period, the ratios were 24 % in 2000 and 32 % in 2014, for India, and 35 % in 2000 and 46 % in 2014, for China. Overall, the group of low-income countries scored 17 % and 28 %, respectively, while the middle-income countries had 25 and 31 %. The importance of the modest investment record of SSA cannot be overstated and needs to be understood in the context of the region's high growth episode.

Growth during the 10-year period, 2004–2014, could partly be explained by the high global demand for Africa's commodity exports before the onset of the Global Economic and Financial Crisis—2007 to 2009—coupled with favorable export prices, both of which declined but moderately after 2010. Growth-inducing macroeconomic reforms and enhanced political stability are also seen as contributing factors. In other words, these developments helped sustain SSA's economic growth, at least as long as their impact lasted, despite moderate levels of investment.

For the IMF, the empirical evidence shows that " ... competitiveness has a strong and significant impact on the duration of growth spells at the global level."[2] Competitiveness can also be considered useful in weathering adverse shocks. Therefore, policies that aim to improve or sustain competitiveness are crucial in

[1]See IMF, Regional Economic Outlook, Sub-Saharan Africa; Dealing with the Gathering Clouds, October 2015, Table SA1, page 81.

[2]See reference above, page 45.

achieving medium- to long-term growth. According to the World Economic Forum's Africa Competitiveness Report, 2015, of the 144 countries that are ranked according to their Global Competitiveness Index 2014–2015, only Mauritius, South Africa, Rwanda, and Morocco rank in the top half. All other 34 African countries rank below the median. More specifically, of all 38 African countries in the ranking only four score above the global median on the competitiveness pillar of Infrastructure, seven on the pillar of Business Sophistication, and seven on the pillar of Goods Market Efficiency.[3]

Using its own measures of competitiveness, the IMF reports that, for a sample of 11 African countries, apart from South Africa and two oil exporting countries, Nigeria and Angola, the change from 1995 to 2014 of Domestic Exports as a share of Total Global Exports is not significantly different from zero and is even negative for some countries. Furthermore, out of a sample of 41 African countries only two, Mauritius and Senegal, have Manufacturing's share of Total Gross Exports that exceed the world average.

As is seen above, growth is related to investment and competitiveness in the medium to long term. But what is the relationship between investment and competitiveness that can justify their joint analysis? While the definition and measurement of investment are arguably relatively unambiguous, the concept of competitiveness is approached differently by different institutions. The IMF proposes four different indicators of competitiveness.[4] These indicators include Price Index-Based Indicators: (1) the Standard Real Effective Exchange Rate (REER) and (2) the Global Value Chain REER (GVC); Price Level-Based Indicators: (3) Balassa–Samuelson Adjusted Relative Price Level and (4) Import and Export Basket. They are mainly focused on the external sector and relate to trade.

The World Economic Forum proposes the Global Competitiveness Index that is based on 12 pillars: Institutions, Infrastructure, Macro environment, Health and primary education, Higher education and training, Goods-market efficiency, Labor-market efficiency, Financial development, Technological readiness, Market size, Business sophistication, and Innovation. The Global Competitiveness Index encompasses a wide array of dimensions including markets, institutions, infrastructure, and technology and therefore proposes dimensions that complement the indicators suggested by the IMF.

Are investment and competitiveness mutually reinforcing and what is the direction of causality between the two, if any? First, it should be noted that the impact of both on growth is best felt in the medium- to long-term unlike short-term growth spurts caused by sudden variations in the price or volume of export commodities. The relationship between the pillars proposed by the World Economic Forum and Investment is multifaceted. Investment can contribute to improvement in the pillars Infrastructure, Technological readiness, and Innovation which would help increase

[3]See World Economic Forum, Africa Competitiveness Report, 2015.

[4]See IMF, Regional Economic Outlook, Sub-Saharan Africa; Dealing with the Gathering Clouds, October 2015, Table 2.1, page 33.

a country's Global Competitiveness Index. Conversely, progress recorded in the pillars Macro environment, Higher education and training, Market size, as well as Efficiency in the Goods and Labor markets would make the country more attractive for investment.

A similar analysis can be conducted between Investment and IMF's indicators of competitiveness. The standard REER and GVC-REER give an indication of a country's trade competitiveness relative to its trading partners and therefore an incentive or disincentive for investment. If a country's Balassa–Samuelson indicator improves—its prices relative to the USA are lower than the level predicted by its income level—it increases its international competitiveness and becomes more attractive for investment. Investment can have a positive effect on competitiveness if, through price competition and efficiency, it helps lower the level of prices thus of some IMF-based indicators of competitiveness.

The purpose of this book is to examine various aspects of the relationship between growth and two of its key medium-term determinants, investment and competitiveness. The 11 chapters focus on various aspects of investment (financial, physical, private, public, foreign direct investment, structural and institutional determinants) and of competitiveness (trade, value chains, regional integration, and regional disparities). The findings of the chapters are as follows.

Part I includes six chapters related to financial and physical investment. In chapter "The Performance of African Stock Markets Before and After the Global Financial Crisis", Seck examines the performance of African stock markets before and after the Global Financial Crisis of 2007–2009, in comparison to the performance of Industrialized, Asian, and Latin American countries. The empirical evidence shows that African stock markets recorded the best performance in a mean-variance space before the crisis, January 2000 to December 2007, with the highest average monthly returns and levels of total risk (standard deviation of returns) that equaled the score of industrialized countries and were significantly lower than those for Asian and Latin American stock markets. Their average systematic risk (Beta relative to the S&P 500) was the lowest among world regions. However, during the crisis, January 2008 to February 2015, they recorded the sharpest declines in their average returns and an increase in their total and systematic risk. Their average Sharpe and Treynor ratios and their Jensen's Alpha also suffered significant deterioration of their performance between the pre-crisis and the crisis period and ranked them from the best investment destination to the poorest one for a US-based investor. Weak recovery of African stock markets is documented by the inability of most of them to return to their pre-crisis index levels and the lower average returns that they have recorded since the peak of the global financial crisis.

In chapter "Structural and Institutional Determinants of Investment Activity in Africa", Chuku et al. use several econometric techniques—generalized method of moments, panel data estimation, and kernel regression to test if structural and institutional variables have a causal relationship with investment in Africa. They find that financial openness and institutional quality partly determine investment, the former having its highest impact if it reaches a threshold. However, they report a

negative interaction between financial openness and institutional quality although it is mitigated for countries with high institutional quality. In chapter "Public Investment and Competitiveness in ECOWAS: An Empirical Investigation", Ekpo performs panel data and vector error estimations to measure the effect of various determinants on economic growth in the economies of ECOWAS and finds that public investment, government consumption, and democracy have a positive impact on growth, while openness, private investment, and inflation show a negative relationship under fixed effects of the panel data analysis. The vector error correction estimates indicate various speeds of adjustments from short- to long-run equilibrium condition.

Folawewo et al. investigate the determinants of the income of nine subgroups of African countries and report that, for six of them, physical investment has a significant positive impact on income, but health investment has mixed causal links with income. Furthermore, they report evidence of conditional convergence in income among African economies. In chapter "Do Market Size and Remittances Explain Foreign Direct Investment Flows to Sub-Saharan Africa?", Amponsah and Garcia-Fuentes reveal that for 40 Sub-Saharan African countries per capita GDP and Remittances have a significant positive effect on Foreign Direct Investment (FDI) flows. The two effects are complementary although it is not known at which level of recipient countries' per capita income remittances explain increase in FDI inflows. Their results are consistent with the view that market size can be a strong determinant of FDI which underscores the need to enhance policies of regional integration, increased trade openness, and continued buildup of physical capital and other business assets to further attract FDI. Onyekwena et al. in chapter "Trade and Foreign Direct Investment nexus in West Africa: Does Export Category Matter?" use a commodity-proximity model to uncover that inward FDI that exports to European Union countries stimulates export of different goods depending on the sector. The results of their augmented gravity model show that multinational presence in ECOWAS region is associated with an increase of exports of primary goods, a decrease of exports in intermediate goods, and no effect on final goods. As a result, they suggest more export diversification and investment promotion policies that are more consistent with industrialization.

Part II of the book covers topics on competitiveness and trade. In chapter "Competitiveness and Trade in West Africa", Houeninvo and Gassama consider that domestic markets in Africa and West Africa are too small which justifies efforts toward regional integration that could foster free movement of goods, services, persons, and capital between national markets. They analyze for the period 1995–2011 the impact of the ECOWAS Free Trade Agreement on trade structure, regional specialization, and regional trade performance and its implications for economic growth and income per capita. In chapter "Financial Development, Trade Costs and Bilateral Trade Flows: Connecting the Nexus in ECOWAS", Osabuohien et al. use an augmented-gravity model to report that in ECOWAS countries financial development is a significant determinant of bilateral trade flows for exporting and importing countries. Based on their findings, they recommend that

more credit be made available to the private sector in order to boost bilateral trade flows.

Kouty and Ongono argue in chapter "Upgrading in Value Chain: The Case of Sub-Saharan African Countries" that upgrading in Global Value Chain (GVC) is an efficient way for a country to increase its international competitiveness. They use 2009 firm-level data for three SSA countries, Cameroon, Côte d'Ivoire, and Mauritius, to report that the main determinants of upgrade in GVC are a firm's profit measured by its selling price, firm size, ownership, level of firm integration, justice system, access to finance, and unfair competition from the informal sector. In chapter "Regional Disparities in the WAMZ: Integrating the Role of Market Potential and Structural Change", Omotor and Saka seek to explain the income disparities of member countries of the West African Monetary Zone (WAMZ) for the period 1980–2013 with the use of a New Economy Geography Model of Growth. They find a positive and significant relationship between initial per capita GDP and per capita GDP growth. This implies lack of conditional convergence for both periods of structural change and no structural change which they attribute to an uneven slow-growing pattern of WAMZ member countries. The changing market access variable has a negative impact on per capita GDP and, given that it is on the decline, it can help poorer countries catch up with richer countries.

Finally, in chapter "Is Regional Integration Beneficial for Agricultural Productivity in Sub-Saharan Africa? The Case of CEMAC and WAEMU", Elu and Price use a propensity score matching estimator to show that CFA Zone membership has a positive effect on agricultural value added. Their result supports the view that regional currency union membership can help achieve economic growth and reduce poverty.

The chapters summarized above examine a wide variety of causal relationships between determinants of investment and competitiveness on the one hand and Africa's economic growth on the other hand. While they shed considerable light on the complex nexus between African growth and its causes, they also leave unanswered a wide array of questions and issues that, alone, would justify several more studies. They also help draw lessons that should be kept in mind not only in the interpretation of the large volume of results produced in this book but in the design of future studies. The following are some of the most salient lessons. First, the book has given evidence of the multifaceted nature of economic growth in Africa which implies that progress is possible even incrementally on several fronts through activation of economic and noneconomic pillars. Second, short-term growth has characterized African economies but not durable growth spells. The underlying causes of short-term growth may be totally alien to those of longer growth episodes and one can argue that medium- or long-term growth in Africa is not a succession of short-term growth periods and achieving it requires commitment to structural transformation and non-reversal of enabling reforms.

Third, in many African countries Structural Adjustment Programs (SAPs) and Highly Indebted Poor Countries (HIPC) programs of the 1980s and 1990s have emphasized economic reforms but did not yield long-term growth, even for countries that tried their best to implement them. The question is whether reluctance on

their part to undertake institutional reforms or to reach a threshold in those reforms, assuming one was needed to reap the growth benefits, may condemn them to either short-term growth without development or growth without employment creation. Finally, SSA countries' persistent presence at the bottom of global rankings on income per capita, Human Development Index (HDI), or Index of Corruption Perception may bear a considerable lesson regarding the relation between these indicators and the current poor state of investment and competitiveness in Africa. In other words, the whole book may be construed as a healthy exercise in the assessment of the cost for African countries of not doing the right thing.

Dakar, Senegal Diery Seck
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