Business Environment and Investment in Africa:
an Overview
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Despite more than a decade of reforms in many African countries, investment and growth rates are still far below the levels required for sustainable development. This article provides an overview of the papers published in the present issue, which analyse the business environment as well as the determinants of investment. The overview focuses on: (i) an analysis of macroeconomic factors explaining private investment experiences across developing countries, with particular implications for Africa; (ii) macroeconomic evidence on manufacturing investment based on surveys from several Sub-Saharan African (SSA) countries; (iii) a macro- and micro-assessment of investment productivity using cross-country production–function estimation based on a sample of SSA countries and a case study of the Tanzanian manufacturing sector; and (iv) an analysis of the business environment, featuring ‘networking’ markets as a primary resource allocation mechanism in Africa.

1. Introduction

The rather dismal economic growth performance of many countries of Sub-Saharan Africa (SSA) has engendered increased attention towards explaining such a record. Meanwhile, the economic growth literature has been emphasising the role of the business environment in the growth process, as evidenced by the recent substantial interest in studying the determinants of total factor productivity. Accompanying the shift away from the simple Harrod–Domar prescription for growth has been a waning interest in determining the level of investment per se. More recent evidence indicates, however, that investment robustly explains cross-country growth experiences (Levine and Renelt, 1992).
This finding seems to now provide greater impetus for re-focusing attention on the rate of investment.

This special issue analyses business environment and investment in the African context. The first paper (Mlambo and Oshikoya, 2001) concentrates on the role of macroeconomic determinants of investment. After more than a decade of implementing market-oriented reforms aimed at improving both the macro- and microeconomic environment, Africa continues to experience low investment rates, which averaged about 20% of GDP in 1998, with low-income African countries registering a mean rate of 16%. What are the relevant macroeconomic factors explaining such low investment rates in Africa, especially compared with other regions of the world? This paper attempts to answer this question.

The second paper (Gunning and Mengistae, 2001) focuses on the macroeconomic evidence in the context of manufacturing investment. Recent evidence suggests that it is the success in manufacturing, rather than primary, exports that has generated the beneficial effects of exports on long-term economic growth (e.g., Fosu, 1990; Ghatak et al., 1997). This paper uses recent country surveys to provide a timely assessment of the determinants of investment in manufacturing.

The third paper (Devarajan et al., 2001) emphasises investment productivity. It explores the question of the effectiveness of investment in economic growth in SSA. Does the Levine and Renelt (1992) evidence of the robustness of investment in the growth equation hold within the African context as well?

Finally, the fourth paper in the issue (Fafchamps, 2001) focuses on the business environment by analysing the role of networks and communities in market exchange. The findings have important implications for firm growth and investment.

2. Macroeconomic Factors and Investment

The paper by Kupukile Mlambo and Temitope Oshikoya presents an empirical analysis of the macroeconomic determinants of private investment in developing countries. It first documents the evidence of a declining rate of investment in Africa since the 1970s. Over the past two-and-a-half decades, African countries have recorded declining investment rates. Gross domestic investment fell steadily from about 26% of GDP in 1980 to 22% in 1990, and to 20% in 1998. This decline has been fuelled primarily by private investment, which has fallen during
most of the period since the late 1970s in SSA. The most severe declines occurred between 1983 and 1987, and between 1993 and 1995, reaching an all-time low of about 8% in 1985. In the second half of the 1990s, however, private investment began to show signs of improvement, though the levels are still below the peaks reached in the 1970s.

The paper contrasts the African record with performances in other regions of the world, which have exhibited stable or increasing investment rates. It also documents the private–public composition of investment. For example, although public investment levels have generally been comparable between SSA and East Asia, the private rates, which were almost equal in 1970, diverged sharply between these two regions, falling in SSA but increasing substantially in East Asia. On average, the private investment rate in East Asia has been 82% higher than that in SSA since the early 1970s.

The paper then employs 1970–96 quadrennial panel data, based on a sample of forty developing countries from Africa, East Asia, Latin America and South Asia, to estimate a private investment equation. The following variables are observed to positively affect private investment: GDP growth, fiscal balance, the share of real domestic credit going to the private sector, public investment, per capita GDP, the relative size of the external sector and the availability of telephones. In contrast, the paper finds that several variables adversely influence private investment: external debt, real exchange rate (RER) instability, inflation and the lack of political rights in interaction with civil liberties.

From a policy perspective, the above findings suggest that improving the policy environment of African economies will help to augment private investment. Such measures would include: decreasing fiscal deficits, the share of credit going to the government, inflation and economic or political instabilities that might lead to higher RER instability,1 as well as increasing public investment, openness, con-

1 RER instability may, in part, be external to a given country, but it could also be generated by uncertainties created by unstable economic or political situations. For example, the incidence of rampant coups d'état characteristic of many postcolonial African countries may render the investment environment relatively uncertain (Fosu, 1992, 2001a,b). This could increase RER instability via volatilities in the nominal exchange rate as well as in tradeable and non-tradeable goods prices, thus reducing private investment (Rodrik, 1991). An example of a study that finds political instability to be deleterious to investment is Gyimah-Brempong and Traynor (1999). See also Fosu (2001c) and Guillaumont et al. (1999) for discussions of the implications of various instabilities for growth.
munications infrastructure and political-cum-civil liberties. Furthermore, improving conditions for economic growth appears to augment investment.²

There is also the external constraint. Relieving the external debt burden, according to the findings of Mlambo and Oshikoya, appears to be a promising measure to increase the rate of investment. So is mitigating external factors that contribute to RER instability, such as the fluctuations in the terms of trade.

The paper also uncovers a negative ‘Africa’ residual after accounting for the effects of the above and other variables. Thus, there are apparently other idiosyncratic factors specific to Africa that have not been accounted for in the investment equation. Uncovering these factors would help to improve our understanding of the additional measures required to elevate investment spending in SSA.

3. The Microeconomic Evidence on Manufacturing Investment

The paper by Jan Gunning and Taye Mengistae provides microeconomic evidence in the form of the determinants of African manufacturing investment. It employs surveys of Ethiopian firms to estimate employment–growth and productive–efficiency equations over 1989–93; and survey data of firms over the early 1990s to estimate investment-rate models for Cameroon, Ethiopia and Ghana. It then reviews the evidence for firm-level investment based on pooled data from Cameroon, Ghana, Kenya and Zimbabwe.

The paper reports results consistent with market selection. First, as in developed countries, smaller firms grow faster given age, and younger firms grow faster given size. Thus resources are, apparently, being reallocated from less to more efficient firms through firm turnover and differential growth rates emanating from inter-firm disparities in productive efficiency. Secondly, the study reports evidence showing that investment rates are larger for firms with a history of higher productivity.

A critical puzzle that the authors tackle at length is why the potentially large returns to investment have not induced higher investment rates in Africa. For example, the paper reports evidence from Bigsten et al. (1999) based on firm data covering four countries —

Cameroon, Ghana, Kenya and Zimbabwe — which shows the median investment rate to be close to zero, despite the very high median profit rate of 38%. In addition, although the investment rate is observed to be positively related to the profit rate within a regression framework, the size of the effect is rather small, ranging between 0.06 and 0.10.

Thus, the relatively large potential returns to investment have not generated high investment rates in Africa. Reviewing existing evidence, the authors conclude that Africa’s low investment levels are apparently not explained by the financial constraints faced by firms. Instead, they argue, the most probable explanation points to the relatively large risks experienced by firms, so that the risk-adjusted returns to investment are likely to be low. That is, firms require larger rates of return to compensate for higher risks.

According to the paper, risk matters due in large part to the irreversibility of investment, such that even in the face of high potential returns, investors prefer to remain liquid until the risk is resolved. Existing measures of risk, which rely on the standard deviation, are unsatisfactory, however. The paper argues, instead, that the heterogeneity of expectations as revealed in survey data helps to explain inter-firm differences in investment behaviour. Unfortunately, existing data are not sufficiently rich to shed light on the determinants of risks via expectations; the present evidence based on the standard deviation is at best indirect. Surveys that reveal firms’ behaviour regarding expectations and adjustment costs would be particularly useful.

The policy implications are important especially for ongoing economic reforms. Although reforms may generate positive externalities by reducing perceived risk, they are also likely to increase the risk of policy reversal, which can create a serious impediment to investment.

4. The Macro- and Micro-evidence on the Productivity of Investment

The paper by Shantayanan Devarajan, William Easterly and Howard Pack argues, rather controversially, that the low investment rates generally observed in Africa are not the problem; the problem is the low productivity of investment. The paper cites both macro- and micro-evidence in support of this thesis. First, it observes that the finding of a significantly positive coefficient for private investment in a per capita–GDP growth equation crucially depends on including Botswana in the sample of twenty-nine SSA countries over 1970–97. While the full sample shows a positive and highly significant effect for
private investment in the regression, eliminating Botswana from the sample results in a smaller positive and statistically insignificant private-investment coefficient. According to the paper, the only country in the sample where private investment and growth rates are both high is Botswana.

Secondly, the paper finds that public investment has no discernible impact on economic growth, irrespective of whether the full sample or subsample excluding Botswana is used. Apparently, Lesotho is the only country in the sample that has both a high level of public investment and strong growth.

The authors next consider a microeconomic account based on a case study of Tanzanian manufacturing. They find a large decline in the value added per worker of 38% between 1975 and 1990. Despite this decrease, however, the capital–labour ratio is observed to have increased through most of the period for the entire sector. The authors argue that none of the usual suspects — shift from high to low productivity sectors, the presence of state-owned enterprises or poor policies — played a significant role in the productivity decline. Instead, they point to low-capacity utilisation and absorptive capacity constraints in skill acquisition as the probable culprits for the decline.

It is unclear, though, as to what gave rise to the above culprits in the first place. The authors conjecture that poor policies might help explain this phenomenon. Nevertheless, understanding the full complement of reasons behind this seeming paradox remains a requisite challenge. Several studies have shown, for instance, that the marginal product of capital in SSA depends on such factors as political instability (Fosu, 1992, 2001a,b) and external debt (Fosu, 1996). In trying to disentangle the weak investment productivity, therefore, we need to pay greater attention to these and other factors affecting the productivity of investment.

5. Networks, Communities and Markets

The paper by Marcel Fafchamps explores how relationships and networks influence market exchange in SSA and, by implication, investment, market entry and the growth of firms. The paper considers three resource allocation mechanisms: command and control (hierarchical), gift exchange and markets. Gift exchange is the most pervasive allocation mechanism in Africa, followed by markets. Interestingly, the paper argues that market exchange plays a larger
role in Africa than in developed economies. The large hierarchical organisations such as firms and government agencies prevalent in developed countries are apparently missing in SSA. Meanwhile, the existing African command organisations, particularly in the form of government agencies, tend to be ineffectual. Furthermore, based on the number of transactions, for example, exchange tends to be much more market intensive in Africa than in developed economies.

The type of market operational in the African setting, however, appears to be quite different from that generally portrayed in the economic literature. In the presence of large transactions (e.g., search and screening) costs, the African type of market mechanism takes the form of long-term trading relationships through networks. Unfortunately, the stability of the networks usually requires certain ‘anchoring’ attributes, such as ethnicity. Hence, the networking is likely to result in market segmentation, which can lead to large efficiency and equity costs.

Network market allocations may result in inferior equilibria for certain groups, which continue to invest in low-income activities, as they are unable to individually afford the cost of establishing the requisite contacts for penetrating more profitable sectors. Meanwhile, other groups benefit from network externalities, facilitating the investment efforts of group members. Thus inter-group inequities, within a country or internationally, are likely to persist. Market segmentation based on network externalities further leads to inefficient allocation of resources through, in particular, the inability to equate marginal products across sectors.

The above theory helps to explain why certain families and ethnic groups tend to dominate business and investment, at least in some sectors, in a given country. It also has important implications for investment and firm growth. For example, large transactions costs limit the number of firms in a given market. Network externalities may reduce these costs, thus making it possible for entry of firms from a particular network. A larger number of firms need not, however, imply greater competition in the presence of large (non-convex) transactions costs. Meanwhile, the cost of minimising potential moral hazard problems, such as shirking, especially where workers do not belong to the network, tends to limit the size and growth of firms.

Network segmentation can also help to explain the pattern of international trade, according to the Fafchamps paper. African countries continue to invest in primary commodities, at least in part, because
they are what African entrepreneurs are relatively familiar with. Moving up to producing and exporting manufacturing products entails overcoming large network costs. A group identity might, however, help to lower these costs, such as the case of the Chinese community in Mauritius, or the Indian community in East Africa.

6. Conclusion

The present issue provides a comprehensive account of both the investment rate picture and the business environment in Africa. The Mlambo and Oshikaya paper, for example, documents evidence showing the low and declining rate of investment on the continent. This has been especially the case with private investment. Compared with other developing economies, particularly East Asia, which has exhibited a level about twice as high as that in SSA in recent years, private investment has been extremely low in SSA. Hence, it would appear that if growth comparable to that observed in East Africa, for example, is to be obtained for SSA, efforts should be redoubled to substantially raise the level of investment. Relevant policies would include: more prudent government financing that attenuates deficits, more financial credit channelled away from government to the private sector, taming inflation, improving infrastructure, decreasing RER instability, reducing the external debt burden, and improving political and civil liberties. Obviously, many of these policies must be home-grown, but there are external responsibilities as well. For instance, alleviating the debt burden and reducing instabilities would require a cooperative effort from the external community as well.

The above macro-level finding of the inadequacy of investment is supported by the manufacturing investment evidence provided in the Gunning and Mengistae paper. That paper also finds that investment is too low in manufacturing firms, and there is a high level of profitability that should attract greater investment. Minimising the risk associated with investment would be an important strategy to increase investment levels.

Despite the above finding of the too-low level of investment in Africa, both at the macro- and micro-levels, the Devarajan et al. paper suggests that investment has failed to be effective in SSA after all. Hence, investment levels have actually been too high. What is needed, the paper argues, is improving the productivity of investment.
Otherwise, increasing investment levels would fail to deliver the desired results of significant economic growth. Reconciling the above apparently contradictory findings, we observe that it is possible for both the level and productivity of investment to be too low. As the micro-level evidence of Gunning and Mengistae, for example, suggests, even in the presence of relatively high productivity, investment may be low due apparently to large risks. The implied effective risk-adjusted productivity then is likely to be small. Meanwhile, the macroeconomic evidence points to low and declining factor productivity (Ndulu and O’Connell, 1999) and low investment levels, as reported herein by Mlambo and Oshikoya. The good news, however, is that many of the variables influencing the rate of investment similarly affect productivity. Thus the scenario of both low rates and productivity of investment can be simultaneously addressed by pursuing the appropriate policy measures.

Rounding up the issue, the paper by Fafchamps provides a comprehensive analysis of the African business environment. By influencing the nature and patterns of investment, the existence of network externalities helps to explain firm entry and growth. In particular, the theory implies the proliferation of small firms which cannot, unfortunately, exploit potential economies of scale. This phenomenon is likely to limit the competitiveness of exports. In addition, the theory helps to explain the pattern of trade, with African countries persisting in primary goods production.

What the findings presented in this issue suggest, in addition to the specific policies prescribed above, is the requirement of an institutional framework that nurtures depersonalised markets. Appropriate measures include better definition and protection of property rights, and the attenuation of information imperfections, as well as the legal enforcement of rules that minimise shirking and other information costs. Such an improved institutional environment would obviate the need for networking and should help to enhance both investment levels and the business environment.

References


