Explaining African Economic Growth:
The Role of Anti-Growth Syndromes

by

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1. The AERC Growth Project

The "Explaining African Economic Growth" project (henceforth simply the "Growth project") was conceived in 1997 as a collaborative effort of Harvard University, Oxford University, and the African Economic Research Consortium (AERC). It was formally launched with the presentation of framework papers at a Harvard University workshop in March 1999. The project was designed to produce the first major, comprehensive assessment by African research economists of the continent's growth experience in the post-independence period.

Until the mid-1970s, many African economies grew rapidly. However, growth decelerated substantially thereafter, both in absolute terms and relative to the experience of other regions. Although reforms produced a rebound in some countries as early as the mid-1980s, sustained growth has yet to sweep the continent or to make decisive inroads in reversing a cumulative legacy of stagnation. The Growth project seeks to explain this growth record by combining global evidence on the determinants of growth with country-based work on the microeconomic behavior of firms and households, the organization of markets, and the political economy of policy. In a two-stage approach, research teams first used cross-country regression models to place each country's growth experience in comparative perspective. Based on this exercise, each team divided the full 1960-2000 period into a set of country-specific episodes – periods of a few years' duration to a decade or longer during which the incentive environment for growth had an identifiable and reasonably consistent character. The bulk of the research then occurred at the country level, where the task was to marshal evidence on why the proximate determinants of growth evolved as they did. Growth episodes that were poorly captured by the first stage motivated a search for country-specific mechanisms omitted from the cross-country model. The two stages of analysis disciplined and informed each other, producing unified and comparable accounts of individual-country experience and generating new insights at both the country and cross-country levels.

Guided by this methodology, a committee of African and outside scholars has interacted with 27 country-based research teams since December 1999, in a cumulative process of technical training, country research, and peer review. Countries were chosen with a view to achieving a structurally diverse and regionally balanced sample, with some emphasis given to economic size (see Table 1). While the sample covers the bulk of sub-Saharan African population and income, some bias likely remains due to the under-representation of countries where armed conflict and/or state collapse have left major gaps in the historical record.

***Table 1 here.

The Growth project has established a network of African growth scholars and generated a rich store of analytically comparable country material. The challenge in synthesizing this material is to identify lessons of broad and fundamental relevance while doing justice to the diversity of country experience. To this end the editorial committee has developed a two-way taxonomy of opportunities by choices. For the region as a whole, and country-by-country: What were the key growth opportunities between 1960 and 2000? What decisions led to their being so often missed? Why were these decisions taken, rather than more growth-enhancing ones? Where do the main growth opportunities and constraints now lie?

In the present paper we focus on choices, and in particular on ways in which African governments have actively shaped the inventive environment for private economic activity. Our message is neither novel nor easy; but it is grounded both in the cross-country literature and in the case-study evidence. It is that the quality of government policy – or more broadly, governance – mattered a great deal for African economic growth over the post-independence period. We find that avoiding a well-defined set of anti-growth syndromes – control regimes, adverse redistribution, unsustainable spending booms, and state failure – was worth between 1 and 2.5 percentage points of predicted growth in African countries. Maintaining what we call "syndrome-free" status was virtually a necessary condition for rapid growth, and virtually sufficient for avoiding the growth collapses that so often undermined sustained progress in Africa.

Syndrome-free status was not sufficient, however, for rapid growth. Indeed, governments managed to choose largely pro-growth policies in roughly a third of the episodes identified in our country studies, in contrast to the pejorative characterization of African governance that is so common in the literature. While this choice tended to secure moderate growth, sustained rapid growth was rare. The challenge, in these cases, is to explain the relative importance of structural constraints, external shocks, and country-specific features in generating the disappointing frequency of rapid growth.

Where growth opportunities were favorable but countries nonetheless slipped into anti-growth syndromes, the evidence often suggests a role for imperfect information with respect to policy choice, in conjunction with poor quality of domestic political institutions. State failure is of course not a policy choice, but even here the choices of political incumbents exerted a powerful effect, in many cases, on the degree to which patterns of ethno-regional polarization inherited from the colonial period were defused or emerged in open conflict.

The case studies provide support for the view that the market-based reforms and improvements in public sector management that got underway in many countries in the mid-1980s established a strong basis for renewed growth among politically stable African countries during the turbulent 1990s. Where reforms or political stability failed, however, so did growth. Looking ahead, the key to achieving sustained economic growth and poverty reduction is to develop a political economy capable of preserving political stability while maintaining a credible commitment to market-based economic reforms.

In Section 2 below, we begin by underscoring the episodal nature of African growth. We then introduce the four anti-growth syndromes, track their evolution over time, and assess their impact on predicted growth within the African sample. In Sections 3 and 4, we draw directly on the case study evidence, first to illustrate the syndromes and then to study the forces behind their adoption and abandonment. We conclude the paper with some observations on complementary elements of pro-growth strategy in Africa.

2. Anti-Growth Syndromes[1]

The Growth project focuses on Sub-Saharan Africa (SSA), and we follow suit here, using "Africa" to refer to the SSA region.[2] The stylized facts of African growth are well known (e.g., Collier and Gunning (1999)). Within a context of considerable cross-country diversity, Ndulu and O'Connell (2005) emphasize:

- Slow long-run growth in per capita income by global standards, with roughly equal contributions from relatively low investment rates and slow growth in total factor productivity.
- Extremely high fertility rates and population growth rates, resulting in high age-dependency ratios.
- A deterioration in relative growth performance in the mid-1970s, with some rebound relative to the global sample after the mid-1990s.
- Slightly better performance of human development indicators as compared with real incomes over the full period, but with insufficient progress in these categories to prevent divergence relative to other low-income regions like South Asia.
- Limited structural transformation, with the bulk of the labor force remaining in agriculture and exports tending to remain concentrated in a few primary commodities, the latter tendency heightened by the emergence of new mineral exporters starting in the early 1970s and continuing through the late 1990s.
- A persistence of the medium-term volatility characteristic of low-income countries worldwide.

Periods of rapid growth were not uncommon in SSA, and rapid growth was sustained over long periods in both Botswana and Mauritius. Sustained moderate growth was observed in a number of cases, including Ghana and Uganda since the mid-1980s. But the central puzzle of the 1960-2000 growth record is the failure of the vast majority of African economies to achieve sustained increases in per capita incomes.[3] This failure must ultimately be traced to some combination of adverse growth *opportunities* and unsuccessful policy *choices*, construing the latter broadly to include the full set of economic roles undertaken by the state, as producer, consumer, and regulator of economic activity. These categories form the basis of the two-way taxonomy developed by the project editors after an intensive review of the country evidence.

On the opportunities dimension, we emphasize aspects of geographical location and resource endowment that have powerfully differentiated the growth experience of

[1] This section draws freely on Collier and O'Connell (2005) and O'Connell (2004). The first comprehensive presentation of the synthesis taxonomy was written by Paul Collier as a background note for the Growth project conference in November 2003.

[2] North Africa is often treated separately from Sub-Saharan Africa in the development literature. With respect to economic growth, Fosu (2001) emphasizes sharp differences between the two regions. The precipitous decline in African growth as of the mid-1970s, for example, appears to be a phenomenon of SSA rather than of Africa as a whole. Between 1960-74 and post-1974, average annual GDP growth of SSA fell by more than half, from 5.4 percent to 2.0 percent, while growth in North Africa declined only slightly, from 5.1 percent to 4.4 percent.

[3] See the appendix for an indication of non-sustainability of GDP growth for many African countries based on half-decadal data.

developing countries on a global basis. As explained in detail in Collier and O'Connell (2005), *resource-rich* economies are those in which the rents from natural resource exports are sufficiently large that success or failure in managing these rents plays a decisive role in overall growth performance. This is a time-varying category; economies like Zambia came to independence as resource-rich economies, but a striking feature of the African experience has been the entry of countries like Cameroon, Nigeria and Equatorial Guinea into this category well after independence. This group will soon include Sudan and Chad. Among the remaining economies, we emphasize the importance of transport costs, political borders, and distance to markets on growth opportunities. The key distinction here is between *coastal, resource-poor* economies like Senegal, Tanzania, or Madagascar, and *landlocked*, *resource-poor* economies like Burundi and Malawi. Our basic opportunity classification is therefore a tri-fold distinction between resource-rich, landlocked resource-poor, and coastal resource-poor economies.

In placing geography and resource endowments at the core of our taxonomy we are of course making a judgment call. The cross-country growth literature includes a long list of alternative variables that condition growth outcomes on a global basis and may be substantially predetermined with respect to policy choices in the medium term. These include exposure to external shocks (Guillaumont *et al* 1999, Blattman, Hwang, and Williamson 2004; and Easterly and Levine 1998 on neighborhood effects), the quality of inherited public institutions (Acemoglu, Johnson and Robinson 2001), the level of human development (Glaeser *et al* 2004), and the degree of ethno-linguistic fractionalization (Easterly and Levine 1997). Aspects of these variables are captured by our classification; resource-rich economies have greater exposure to terms of trade shocks, landlocked resource-poor economies are more dependent on neighbor effects, and the resource-rich criterion implicitly benchmarks for relative endowment of natural and human resources. But there is no need to force experience through our taxonomy. Other predetermined influences on growth operate as cross-cutting variables that may or may not be correlated with our opportunity categories. Our country evidence places a sharp emphasis, in particular, on patterns of ethno-regional polarization inherited from the colonial period; we will argue below that these appear to have been an important force behind observed policy choices. Ultimately it may be a political geography rather than solely an economic one that will most effectively capture the opportunity structure confronting Africa countries (Azam 2005, Bates 2005a,b).

On the choices dimension, the narratives contained in our country studies organize experience by growth episodes. Country authors were asked to characterize the nature of that environment within each episode, to assess its impacts on investment and growth, and of critical importance, to study the internal political economy of its evolution over time. While no single account can capture the complexity of African experience, this episodal structure lends itself to the identification of recurring patterns in the country evidence. In this section we review the four broad anti-growth syndromes that emerged repeatedly in the case studies. These are not exhaustive of the ways in which African governments have actively shaped the growth environment, and in a substantial proportion of episodes, countries avoided all four syndromes. Nor do the patterns we outline here constitute a complete account of growth outcomes, which requires controlling for exogenous shocks and underlying growth opportunities.

Table 2 identifies four broad anti-growth syndromes. Three can usefully be thought of as directly reflecting the choices of incumbent state actors – in turn, control or *regulatory* regimes that distort productive activity and reward rent-seeking, *redistributive* regimes that compromise efficiency for the sake of redistribution, and *intertemporal* regimes that produce macroeconomic instability by systematically undervaluing the future. The fourth, *state breakdown*, refers to situations of civil war or intense political instability in which a government fails to provide security or to project a coherent identity in a substantial portion of the country. The policy patterns characteristic of each syndrome are described in full in Collier and O'Connell (2005), and we draw on that discussion before exploring the linkages of these syndromes to growth. In a subsequent section we turn to the case evidence to illustrate the syndromes and explore the forces behind their adoption and abandonment.

***Table 2 here.

In the cells of Table 2 we report the results of a detailed qualitative exercise undertaken by the editorial committee and refined further in consultation with the country authors. Based on a detailed reading of the country evidence, the episodes within each country's overall narrative were classified as displaying one or more of the syndromes or, in the many cases in which syndromes were absent, as *syndrome-free*. At a subsequent stage the editorial committee extended the classification to the remaining African countries, based on a consultation of the relevant literature.[4] We report the data first by country/years and then by person/years, with each country/year weighted by mid-sample population. Differences reflect the wide distribution of population sizes in the continent and particularly the influence of Nigeria (re-classified from coastal to resource-rich starting in 1971).

It is critical to emphasize that the classification we developed is based on policies and not on growth outcomes. For each syndrome, theoretical considerations and global evidence suggest potentially substantial effects on growth, holding other influences constant. But a country exhibiting an anti-growth syndrome may nonetheless grow rapidly, as Sudan has done in the latter half of the 1990s; and a country that steers clear of syndromes may stagnate, as Malawi did in the 1980s and Cote d'Ivoire in the early 1990s. What the African evidence suggests, however, is that being syndrome-free is virtually a sufficient condition for avoiding the short-run growth collapses that have so often undermined long-run growth performance on the continent. At the same time, while an absence of syndromes does not guarantee rapid growth, it is virtually a necessary condition for sustaining rapid growth in the medium term. Where strong growth emerges in the midst of a syndrome, it tends to do so either temporarily, as a result of unsustainable dynamics, or both temporarily and fortuitously, as a response to favorable shocks.

[4] The first stage of this exercise was undertaken by Jean-Paul Azam, Robert Bates, Paul Collier, Augustin Fosu, Jan Gunning, Benno Ndulu, and Stephen O'Connell in August 2003, based on draft versions of the country studies. The classification was assessed by country authors at a November 2003 conference and refined in response to their comments. In August 2004 the editorial committee (including Dominique Njinkeu) undertook a similar judgmental exercise to extend the sample to most of Africa.

2.1 Regulatory syndromes

African countries came to independence in the wake of World War II and in an economic and intellectual environment transformed by the Great Depression and the emergence of the Soviet Union as an industrial power. Founding governments had highly ambitious views of what governments could and should accomplish in the service of modernization (a theme developed in detail by Ndulu 2004). Yet the governments of Kenya (under Kenyatta) versus Tanzania, Cote d'Ivoire versus Ghana (under Nkrumah), and Botswana versus Zambia all differed qualitatively in the relative status attached to markets and private accumulation as opposed to direct controls and government regulation in the development process. Each pair also differed in the importance attributed to international markets and foreign private capital in the development process. These differences continue to distinguish episodes both within and across countries through the entire period.

We identify regulatory regimes as those in which governments heavily distorted major economic markets (labor, finance, domestic and international trade, and production) in service of state-led and inward-looking development strategies. These regimes often emerged under the banner of socialist or communist ideology. Within this category, *soft controls* are characterized by aggressive import substitution, financial repression, and rapid expansion of the state enterprise sector, as in Zambia under Kenneth Kaunda. *Hard controls* imply deeper and more widespread repudiation of markets and an embrace of Soviet-style planning; these are often, though not always, identified with revolutionary Marxist ideology as in Ethiopia under the Derg regime. The 1967 Arusha Declaration and the 1969 Mulungushi Declaration marked the formal adoption of socialist orientation in Tanzania and Zambia, respectively, and such pronouncements often provide key markers, with the distinction between soft and hard controls a matter of judgment. By the early 1970s, for example, we judge Tanzania to have adopted hard controls, with extremely tight exchange controls, price controls and government marketing monopolies covering major portions of internal and external trade, a monopolistic nationalized banking sector, and the forcible relocation of smallholders into collective *ujamaa* villages. The regulatory regime in Zambia, by contrast, remained soft until the adoption of market-based reforms in the early 1990s.

The hallmark of regulatory regimes is a dirigiste mentality that tolerates substantial market distortions in an attempt to rapidly alter historical patterns of resource allocation. No single indicator captures these regimes, because patterns of intervention are country- and institution-specific. In countries with independent national currencies, for example, where exchange controls were widely used to direct cheap foreign exchange to favored uses, the size of the black market premium provides a measure of how far policymakers were willing to depart from market pricing in one key arena. This instrument was absent in the CFA zone where convertibility and an open capital account were enforced at the community-wide level and supported by a convertibility guarantee from France. Within the CFA zone, indicators like the steepness of effective protection or the ratio of public sector wages to national incomes provide better indicators of how far governments were willing to tilt the incentive environment. By a similar token real deposit interest rates in the banking sector provide useful differentiation in the degrees of financial repression imposed or tolerated among countries with national currencies; for the CFA countries or members of the Rand monetary area (Namibia, Lesotho and Swaziland), real interest rates say less about national policy orientations and other measures of financial repression, including subsidies granted to loss-making development banks, would be more useful. While our classification is a qualitative one, Table 3 conveys some of its content using two leading indicators of market distortions among countries with national currencies. Using median values to avoid distortion from outliers, black market premia are distinctly higher in hard control regimes than in soft control regimes, and virtually absent in the syndrome-free cases. A measure of *ex ante* real interest rates is negative only in the regulatory regimes, and the distortion in hard control regimes is roughly twice that in the soft regimes at the median.

***Table 3 here.

Highly distorting regulatory regimes undermine growth both directly, through the deadweight efficiency losses associated with driving a wedge between prices and social opportunity costs, and indirectly, through the diversion of private activity from socially productive arenas to rent-seeking. The classic treatment in the African context is Bates 1981, who argued that the stagnation of both industry and agriculture was rooted in the use marketing boards, import quotas, and other direct interventions to generate massive resource transfers from agriculture to industry and government. Agriculture stagnated because low producer prices and inadequate public investment undermined private incentives to invest and produce; industry stagnated for lack of foreign and domestic competition and because controls invited the diversion of resources from production to rent-seeking. What supported the resource transfer out of agriculture, in Bates' analysis, was the greater political coherence, and therefore political influence, of the largely urban interest groups who gained from the transfer. While Batesian interest-based accounts help explain the persistence of control regimes in our country studies, what looms larger in their adoption is the ideological background and political origins of leaders. Intellectual fashions go further than urban bias, for example, in explaining the strands of Fabian socialism adopted from Senegal to Tanzania to Mauritius; the agricultural origins of early leaders in Cote d'Ivoire, Malawi and Kenya help explain the more supportive stance towards agriculture in these countries.

2.2 Redistributive syndromes

Redistributive syndromes are those in which efficiency-compromising resource transfers played a dominant role in defining the growth environment. Based on the country material, we distinguish progressive or *vertical* redistribution syndromes, which aggressively seek to equalize the size distribution of household assets or income, from *regional* redistribution syndromes, which often respond to regionally-polarized political conflict. Redistribution from rich to poor households has ambiguous effects on growth – deadweight efficiency losses are unavoidable, but if redistribution dramatically alters the investment constraints facing poor households the net impact may be growth-promoting. More fundamentally, of course, such redistribution may be highly desirable in its own right. But vertical redistribution does not feature prominently in the case material – we find very few cases in which it has become a defining characteristic of the growth environment, as it perhaps did in Namibia in the 1990s and is currently doing, much more damagingly, in Zimbabwe. Regional redistribution, by contrast, is considerably more common in the country material. This syndrome reflects pre-existing economic and political cleavages that were in some cases developed and more often articulated during the colonial period. Nigeria is a leading example; an uneasy federal accommodation of the poorer, larger and more politically coherent Muslim north with the Yoruba and Ibo-dominated coastal regions produced a civil war in 1967 and a succession of northern military governments intent on maintaining control over coastal oil resources.

Since investment is forward-looking, a redistribution that is *anticipated* by asset owners and potential investors can undermine growth well before it actually occurs. The anticipation is typically rooted in the prospect of a political transition that will remove the current elite from power and remove the protections afforded by that elite to favored groups. The leading example in our case material is South Africa, where the apartheid system became increasingly isolated politically beginning in the early 1980s, undermining the investment incentives of the white minority. This situation persisted, in our judgment, at least until the transition to majority rule and the adoption a few years later of a federal structure. In our view it continues, to a substantial degree, under ANC rule.

Redistribution implies the appropriation and transfer of private incomes or assets, thereby drawing the state into market interventions that may compromise growth by distorting the incentive to invest. But as pointed out forcefully by Azam in a series of articles (1995, 2001), redistribution may be growth-enhancing in an environment of deep political polarization. Figure 3 shows the essence of this argument (developed in detail by Azam 2005). We conceive of two regions, whose relative income endowments are as given at point A. Region 1 is in control of the national government. By virtue of its low income, however, region 2 has a low opportunity cost of conflict. In this situation the option of armed rebellion may appear attractive to political leaders in region 2 even if it is inefficient for the country as a whole. Indeed, if the likely result of a (costly) civil war, at point B, is anywhere north of point A, then region 2 is strictly better off under rebellion than under the status quo. The threat of armed rebellion is then credible. If transfers were costless, the contract curve of efficient bilateral bargains between the regions would be the segment CD. Taking the efficiency costs of redistribution into account, the contract curve may be closer to EF, with point E being the minimal inter-regional transfer capable of "buying the peace." To identify regional transfers as an anti-growth syndrome would reflect, in this case, the adoption of an irrelevant counterfactual. Put more simply, the "no redistribution" point (A) is not an equilibrium.

***Figure 3 here.

In the Azam analysis, deeply polarized countries that reach efficient political bargains avoid a counterfactual of state breakdown. Growth is slower than in structurally similar countries where polarization is absent, but faster than in polarized countries where institutional weaknesses, collective action problems, and opportunistic behavior by regional elites prevent the striking of durable and intertemporally efficient bargains. In our classification of episodes, we have sought to restrict the redistributive syndrome to the latter category, recognizing that these are contentious distinctions of degree.

2.3 Intertemporal syndromes

Intertemporal syndromes redistribute resources from the future to the present. The primary form of this syndrome is *unsustainable public spending booms*, often precipitated by the arrival or prospect of large commodity export incomes, with the attendant loosening of financial constraints. Policy errors are of two fundamental types, sometimes occurring in combination. The less subtle is a failure to keep consumption spending in line with a reasonable assessment of permanent income, as in the dramatic expansion of public sector employment in Guinea and Niger during the bauxite and uranium booms, respectively, of the 1970s. More subtle is a rush to expand the public investment budget in the absence of institutional mechanisms to ensure adequate economic returns, as in the proliferation of new state capitals and politically-located infrastructure investments in Nigeria during the oil booms of the 1970s. In identifying such episodes we characterize the full boom/bust period as a syndrome, rather than focusing only on the boom phase. This forces a reinterpretation of the bust phase as in large part a consequence of previous policy choices, rather than a response to intervening policy reforms.

Within the intertemporal syndrome we reserve the term *looting* for the limited set of episodes in which a narrow political elite subordinates any coherent economic program to its own subsistence on what the authors of our Burundi study term the “rents to sovereignty” – mineral resources, foreign borrowing, aid, tax revenues. Such episodes are in virtually all cases associated with individual dictators – Amin (Uganda, 1971-78), Taylor (Liberia, 1997-2000) – though in the Burundi case the cohesion of the Bururi faction survived a number of internal transitions. By some arguments these syndromes belong more properly in the state breakdown category. The hallmarks of intertemporal syndromes are debt accumulation and other indicators of macroeconomic imbalance, as indicated in Table 4.

***Table 4 here.

2.4 State breakdown

Our final syndrome differs qualitatively from the rest in constituting an outcome rather than a program. By *state breakdown* we mean situations in which the domestic security order has broken down, the prime example being large-scale armed rebellions as in Sierra Leone in the 1990s or Chad during its civil war of 1979-80. We also include a few brief episodes of acute political crisis, as in Niger’s failed democratization during the 1990s, during which a sequence of constitutional crises undermined any projection by the government of a coherent incentive environment for private economic activity.

A fundamental intellectual challenge for interpreters of Africa’s growth record is to assess the relative importance of exposure to shocks and actual experience of shocks. Dehn (2000) undertakes this exercise for commodity price collapses and argues that what matters for growth is the actual sample path taken by commodity prices, rather than the *ex ante* volatility of that path. In restricting attention to the actual occurrence of state breakdown we ignore the potentially powerful effect on growth of a high *ex ante* risk of civil war, where war is not currently underway. This underscores the broad nature of our syndrome-free category. It certifies countries as free of dramatic errors of commission but, as we will see, does not in itself constitute a sufficient condition for rapid growth.

2.5 Patterns over time

Figure 4 shows the evolution of our 4 broad syndromes over time, for the full set of 46 African countries that we have classified, from the date of political independence (or 1960, whichever is later) to 2000. The most dramatic change over time is the displacement of syndrome-free cases by control regimes between the late 1960s and the mid-1980s and their subsequent restoration between the mid-1980s and the early 1990s. The period of democratization that occurred between 1988 and 1994 (Bratton and van de Walle 1997) was one of very concerted improvements in the growth environment, reflecting widespread liberalization of controls and the resolution of some redistributive and intertemporal syndromes. This period also saw, however, a substantial increase in state breakdown.

***Figure 4 here.

2.6 Syndromes and growth

The adverse impact of economic policy on growth became a central theme of the African development literature with the 1980 Berg Report and the global onset of the structural adjustment era. Our syndrome classification is consistent with many of the central themes of the subsequent cross-country growth literature, including the well-known finding that while individual policy measures rarely generate highly robust impacts, groups of policy measures are invariably jointly significant (Levine and Renelt 1993). By comparison with that literature, our syndrome classification covers a much wider range of African countries – virtually the entirety of Sub-Saharan Africa. In this section we examine the relationship of policy syndromes to growth.

We begin in Table 5 by aggregating our anti-growth syndromes into a single dichotomous variable indicating whether a country is syndrome-free in a particular year or displays one or more anti-growth syndromes. Both mean and median growth rates (the latter are considerably more robust to outliers) are substantially higher in the absence of syndromes. The second panel of the table gives some sense of the nature of this difference. We identify a growth collapse as a year in which a 3-year centered moving average of growth is negative, and a sustained period of medium-term growth as one in which a 5-year moving average passes a modest positive threshold. An absence of syndromes emerges as a nearly-sufficient condition for avoiding collapse: the frequency of growth collapse is below 20 percent conditional on an absence of syndromes. By the same token, syndromes exert a powerfully negative impact on the prospects for strong growth over the medium term. The probability of observing a 5-year average of growth above 2.5 percent (roughly the developing country median for 1960-2000) is below 25 percent; this shrinks to below 20 percent if a threshold of 3.5 percent growth is used. These differences are all highly statistically significant.

***Table 5 here.

The correlations reported in Table 5 are descriptive rather than structural; causality may run in both directions. Nonetheless, for exploring within-Africa growth differentials, Table 5 has the advantage of mobilizing a significantly larger sample of observations than is available in any cross-country growth regression (samples shrink drastically when individual measures of policy are used, or when other variables are present). Moreover, the coarseness of our syndrome classification protects us from some types of reverse causality – for example, exogenous shocks that simultaneously affect growth and standard measures of policy (like the black market premium, or the fiscal deficit), but without inducing a major shift in policy regime.

In Table 6 we turn to a regression framework in order to assess the impact of syndromes after conditioning exogenous shocks and unobserved country effects. The African growth data have extraordinarily high dispersion, and so in order to limit the leverage of outlying observations we estimate these regressions using a least absolute deviation criterion rather than the standard least-squares criterion. Estimated coefficients refer to the impact of marginal changes on the predicted median, rather than the mean, of the dependent variable.

***Table 6 here.

In columns 1 and 2, we condition on exogenous shocks to export markets (via partner growth rates) and agricultural supply (via normalized rainfall levels). In the rainfall-only case we include a set of fixed year effects to allow for time-specific influences that are invariant across countries. Columns 3 and 4 include location and endowment effects as proxied by our opportunity variables. The omitted geographical category is landlocked, resource-poor economies, so the coefficients on Coastal and Resource-Rich economies estimate the growth impact of these categories relative to the landlocked countries. The economic return to coastal location is decidedly smaller within Africa than in a global sample of developing countries, an issue discussed in detail in Collier and O'Connell (2005). Columns 5 and 6 of Table 6 repeat the specifications of columns 1 and 2, but with country fixed effects incorporated; in these columns any spurious correlation arising from unobserved country-specific factors is swept out, and the results assume only that the differential effect of syndromes is the same across countries.

Table 7 repeats this exercise for the full set of anti-growth syndromes. The omitted category is now "syndrome-free." While the syndromes were classified by reference to policy regimes and not growth outcomes, their individual links to growth are powerful and in each case highly statistically significant. The marginal impacts of individual syndromes are strikingly consistent: the regulatory, redistributive and intertemporal syndromes shift predicted median growth by a full percentage point, while state breakdown reduces predicted median growth by roughly 2 ½ points per year. The impacts of regulatory regimes and state breakdown remain strong in column 6, where we control for unobserved country heterogeneity, confirming the salience of these regimes within the country narratives. The impact of redistributive regimes, in contrast, is less robust to controlling for unobserved heterogeneity. This is consistent with the Azam analysis; ethno-regional polarization may be operating here as a slowly-moving unobserved variable whose presence is proxied by episodes in which aggressive redistribution dominates the growth environment.

These are large effects. While it must be reemphasized that these results are descriptive rather than structural, we have significantly reduced at least one major source of spurious correlation by controlling for exogenous shocks that may simultaneously lower growth and induce the adoption or abandonment of syndromes.

***Table 7 here.

We argued on the basis of Table 5 above that being syndrome-free was (nearly) a necessary condition for sustained growth in the medium term. The final panel from that table suggests that the traction from this measure of policy declined over time. For a syndrome-free country, the probabilities of surpassing the modest hurdles of 2.5 or 3.5 percent growth on an annual basis declined by nearly half between the 1960s and the 1990s. Such a decline would not be implausible. Alternative hypotheses consistent with it might include uncertainties introduced by the wave of democratic reforms in Africa, 'first mover' agglomeration benefits accruing to the dynamic emerging economies in Asia and creating a more competitive international market for African exporters after the early 1980s, and lagged effects of previous syndromes including deterioration of institutions and infrastructure. But the result itself is of questionable robustness. In a version of Table 6 (not shown) we have checked for period effects after controlling for global growth rates and other shocks. Results are mixed, but it is clear that some portion, and perhaps most, of the apparent decline in the payoff from avoiding syndromes is associated with a deteriorating external growth environment. When we control for shocks via the inclusion of partner growth rates or period fixed effects, the growth differentials associated with avoiding syndromes are not significantly smaller in the 1990s than in earlier decades.

The results reported here lead us back to the case study evidence. Why were anti-growth syndromes adopted? What led to their abandonment?

3. Some Case-Study Evidence

We present here brief examples from the 27 SSA country case studies that illustrate the regulatory, adverse redistribution, intertemporally unsustainable spending, and state breakdown syndromes. Our aim in this section and the next is to shed some light on the dynamics involved in the occurrence and resolution of each syndrome. As a complement, we also present examples of syndrome-free regimes, which usually entailed market-friendly policies. Note that with the exception of the syndrome-free status, the syndrome classification is not mutually exclusive; countries can exhibit more than one syndrome in any given episode.

3.1 Regulatory syndromes

Burkina Faso, 1960-82 (Soft controls), 1983-90 (Hard controls): Burkina Faso came to independence in 1960, along with most of francophone Africa. Savadogo *et al* (2003) characterize the period from 1960 to 1990 as one of "state interventionism" in the "absence of a dynamic private sector." The degree of intervention evolved over the initial 1960-82 period; in the cereals (sorghum, millet and maize) markets, for example, intervention was tightened considerably following the drought of the mid-70s. Private trade became restricted and OFNACER (the Cereal Office), originally set up to handle food aid, became a bilateral monopoly on cereal trade. Our rendering of this period as soft rather than hard controls reflects the determination of a relatively political conservative leadership (President Yameogo, 1960-66; General Lamizana, 1966-80; Colonel Zerbo, 1980-82) to leave considerable, if uneven, latitude for private sector activity.

The period from 1960 to 1982 was one of substantial political instability, as reflected in the coups of 1966, 1980 and 1982 (a legacy repeated in 1983 and 1987). The first two coups appear to have arisen, at least in part, from popular dissatisfaction with economic conditions; per capita GDP growth averaged less than 1 percent to the early 1980s.[5] The era of soft controls ended in August 1983, when a group of officers led by the charismatic radical Thomas Sankara took over the government by coup and imposed a severe form of "state capitalism." The resulting hard control episode lasted until 1990. The centerpiece of the control program was a repudiation of the legitimacy of private property. For example, a rental law was levied that required landlords to transfer a whole year of rent to the government; for the year of 1984, rent was declared free. The hard control period was punctuated by a bloody coup in October 1987, when Sankara was killed as part of a power play among the radicals and replaced by Blaise Compaore. As economic stagnation continued, "increasing financial imbalances and economic difficulties" forced the Compaore government to seek salvation from the Bretton Woods institutions (Savadogo *et al*, 2003). We date the abandonment of controls and the initiation of a syndrome-free episode (see below) to 1991, also the year of Compaore's election as a civilian President under a new Constitution.

<u>Cameroon, 1960-77 (Soft controls)</u>: Cameroon's first president, Ahmadou Ahidjo, pursued soft control policies in an industrialization drive based on the import substitution paradigm that was widely adopted both in Africa and elsewhere (Ndulu 2004). His adherence to soft rather than hard controls appears to have reflected his relatively politically conservative background. An element that may have favored state controls over a more market-friendly approach was the high priority accorded by the government to peace building (Kobou and Njinkeu 2004); Cameroon had experienced a serious ethno-regionally based insurrection in the pre-independence period, and neighboring Nigeria, with similar ethno-regional cleavages, experienced a civil war between 1967 and 1970. The end of Cameroon's soft control period was marked by an investment push in the oil sector and the onset of major oil revenues in 1978, which initiated an unsustainable spending boom (see below).

<u>Ghana, 1960-68 and 1972-83 (Hard controls)</u>: At the time of independence in 1957, the clear choice was between Mr. J. B. Danquah, a politically conservative politician from

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[5] The first coup was actually "staged from a popular uprising demanding the departure of the president and not by a conventional coup d'etat carried out by the army" (Savadogo *et al* 2003). Labor unions played a key role in organizing the uprising, and the excesses of the first president, Mr. Yameogo (1960-66), also played a catalytic role.

the majority Akan ethnic group who preferred a go-slow, market-friendly approach, and Mr. Kwame Nkrumah, from a minority-Nzimma ethnic group, who in contrast favored a socialistic modality with a strong role for government. The latter won the election based in part on the appeal of the promises of faster economic progress through the government's active role in the economy, but also because of fear of possible Akan domination. Nkrumah transformed the country to a one-party state by 1960, as the Republic of Ghana, where he assumed a strong role as President from his initial position as Prime Minister from the time of independence. The government embarked on a radical path of industrialization, with the state playing the leading role. The socialistic ideology of collective ownership, later dubbed "Nkrumahism," reigned supreme. Thus, nearly all large-scale operations were owned by the state. In the process, private enterprises, especially those of medium-to-large sizes, were rationed out, through political intimidation or via diminished availability of finance. Huge spending on nationally unproductive projects, given Nkrumah's vision of a total liberation of the African continent from colonialism and imperialism, led the country rapidly toward macroeconomic difficulties. By 1966, net international reserves were negative at –US$391, compared with US$269 at the time of independence. Real GDP per capita fell from $500 1987 US dollars in 1960 to about $470 by 1966, as inflation rose from virtually zero to 22.7 percent. Nkrumah's overthrow by a military coup in February 1966 was greeted with great popular enthusiasm. Policy nonetheless changed little until the brief episode of market-based reforms instituted by Prime Minister Busia in 1969.

The period from 1972 to 1983 was one of "muddling through" (Aryeetey and Fosu, 2003). A series of five governments came to power, mainly military and mainly via coups and counter-coups (the civilian government of President Limann, 1979-81 was a brief exception). Governments in this period responded to economic difficulties by imposing further constraints. Price and import controls, in particular, were the counterpart to an inability to contain macroeconomic imbalances and an unwillingness to devalue the local currency (the latter attributed by Fosu (1992) to fears of precipitating a military coup). Except for the explicitly ideological tinge of the Rawlings regime, which came to power in a coup in December 1981 (following a brief coup by Rawlings himself in 1979), these governments were not particularly radical; they viewed the control policies as the way out. The military government of Ignatius Acheampong (1972-79), for example, engaged in schemes such as "Operation Feed Yourself" and flirted with the concept of a "Uni-government" that would include both the military and civilians. In any case, severe fiscal difficulties were apparent in the early 1980s. By 1983 (a year of very severe drought), central government revenues had shrunk to only 5 percent as a proportion of an already diminished GDP, compared with a rate of 20 percent in 1970. Inflation had accelerated from 18 percent in 1974 to 116 percent in 1981, even though prices were supposed to be controlled; domestic investment had fallen to less than 4 percent, from its value of 14 percent in 1974; and the current account balance was US$175 million in deficit, with no loans or grants to finance any of it, and with the country already experiencing major arrears. The radical-leaning Rawlings appeared to have little choice but to succumb to the IMF/World Bank-sponsored Economic Recovery Program (ERP), which was ushered in during April 1983, to be followed by the Structural Adjustment Program (SAP) in 1986. We characterize the period from 1983 to 2000 as syndrome-free.

Sierra Leone, 1973-89 (Soft controls): After independence in 1961, the electoral ascendancy of the All People's Congress (APC) in 1968 ended an initial period of conservative politics but left in place a largely market-friendly policy regime that we characterize as syndrome-free. Following a period of acute political instability, the oil shocks of the 1970s propelled the implementation of aggressive price and exchange rate controls and financial repression. The 1973-1990 period was one of systematic erosion of pro-growth political and economic institutions. Export crops – palm kernel, cocoa and coffee – were subjected to explicit and, perhaps more significantly, implicit taxation via the monopsonistic Sierra Leone Produce Marketing Board (SLPMB). Meanwhile, import subsidies and price controls became a source of rents and a mechanism for redistribution to favored Northern interests. The government borrowed heavily during this period to finance grandiose public projects; its hosting of the 1980 OAU summit, for example, consumed more than 60 percent of the 1980 government revenues (Davies, 2005). The economic situation deteriorated steadily, reaching crisis proportions by the mid- to late-1980s (by 1987, the poverty rate stood at 80 percent, inflation had reached 180 percent, and tax revenues had fallen by half, to less than 10 percent of GDP). The government sought relief from the IMF in the form of Structural Adjustment Program late in 1989, but the progress of economic reforms was interrupted by civil war. We characterize the 1990-2000 period as one of state breakdown (see below).

3.2 Adverse redistribution

We emphasized above that redistribution that "buys the peace" can be favorable to growth, as can pro-poor redistribution if its net effect is to crowd in investment in physical and human capital. Our focus here is on adverse redistribution, in which growth-reducing instruments are used to redistribute resources to groups favored by the incumbent political elites.

Burundi, 1972-88: The Kingdom of Burundi came to independence in 1962 in crisis, with the chaotic departure of the Belgian colonial regime and the assassination of Prince Louis Rwagasore a month after his pluralist party had won national legislative elections in September 1961. The period from 1962 to 1972 was one of acute political instability, including large-scale political violence in 1965 (we characterize this as a period of state breakdown). A sharply redistributive phase got underway with the accession to power of Captain Michel Micombero, a young Tutsi officer from the Bururi province in southern Burundi (Nkurunziza and Ngaruko 2003). We date the period of adverse redistribution from 1972, when a bloody Hutu rebellion initiated a period of systematic redistribution and repression by the Micombero government and Tutsi-dominated army. During the 1972-87 period the government created a large number of public corporations that distributed rents to the members of the Tutsi political elite, mostly Bururi-Tutsis, who formed the political base for the ruling elite. Meanwhile, the army-led Tutsis perpetrated severe political repression against the majority Hutus, following a massacre of the Tutsi minority by Hutus in 1972. The rationale for this combination of redistribution and political repression emanated from the perceived fear of domination by the majority Hutus, and may well have constituted an optimal political strategy from the narrow and contingent perspective of incumbent Tutsi elites (Nkurunziza and Ngaruko 2003). The pro-Tutsi pattern of ethno-regional redistribution ended with the replacement of Colonel Jean-Baptiste Bagaza by Major Pierre Buyoya via a coup in 1987. A renewed period of civil war and state breakdown ensued in 1988 (see below).

Sierra Leone, 1970-1989: The redistributive behavior of the government during the 1970-89 period was based on inter-ethnic rivalry between the Northern-based Temnes and South-eastern Mende groups, each of which commanded roughly 30 percent of the population. The former group dominated the APC political party, which took over the government in 1968. To consolidate its political base, the new government engaged in regional redistribution in favor of the Temnes. This redistribution disenfranchised the Mendes and increased inter-ethnic polarization, sowing seeds for the armed conflict and state breakdown of the 1990s (see below).

Togo, 1975-2000: Early Togolese governments differed much less over economic policy than over the continuation of political and economic ties with France, with the country's first President, Sylvanus Olympio, seeking to distance the country rapidly from its colonial ties. Sub-Saharan Africa's first military coup, organized by a northern-based military junta, brought the pro-French southerner Nicolas Grunzitzky to power in 1963. The junta replaced Grunzitzky in a bloodless coup in 1967, initiating a 37-year period of military dictatorship under Gnassingbe Eyadema. A distinctly ethno-regional bias of economic policy began to emerge in the early years of the Eyadema government, with commodity export taxes channeled increasingly into development programs favoring the Kara region of the President's Kabye ethnic group (Gogué and Evlo, 2004). This ethno-regional bias became a dominant theme of policy in the mid-1970s, as a major expansion in public sector employment, financed initially by windfall increases in phosphate prices, was directed disproportionately to Kabye group. The regional dimension of redistribution continued through in the 1990s, as abortive democratic reforms produced a hardening of repression and political control by the Eyadema government.

3.3 Intertemporally unsustainable spending

Intertemporally unsustainable spending booms are most often tied to temporary revenue bonanzas from increases in commodity export prices. Additional resources are often required as borrowing becomes cheaper and governments underestimate the resources required to realize over-ambitious public spending targets. When the revenue boom ends, fiscal difficulties force a reduction in public spending; this often means a sharp reduction in public investment spending, as current spending entitlements created during the boom phase – including expansions in public employment – prove politically difficult to reverse. The upshot is that many projects remain uncompleted, and given the lumpiness of investment, the value of the marginal product, which might be low to begin with, is seldom realized. The post-boom period (which we include in defining the full syndrome) is usually one of sharply reduced growth. Several case examples follow:

Cameroon, 1978-1993: Oil revenues rose sharply after the initiation of production and exports in 1978. The revenues were removed from the normal budget process and placed in a special account managed directly by President Paul Biya, who had replaced President

Ahidjo in 1982 upon the latter's voluntary retirement. However, a failed coup attempt in 1984 led Biya to solidify his grip on power. This entailed major spending, thanks in part to the oil revenues directly under his direct control, geared toward the construction of an ethnically-based political alliance. A sharp real exchange rate overvaluation emerged in the mid-1980s as Franc Zone rules prevented a depreciation to match the collapse of world oil prices. The introduction of multiparty politics in 1990 further fueled political rivalry and spending to win electoral authority. The full oil-financed boom/bust episode ended with the 1994 devaluation of the CFA franc.

<u>Togo, 1974-89</u>: Despite the negative oil price shock of 1973, the phosphate boom of 1974-75, coupled with a dramatic increase in coffee prices in 1977, produced a windfall in public revenues. The government consolidated its control over phosphate revenues by nationalizing the sector. As a percentage of GDP, public investment increased from 13.4 percent in 1973 to 47 percent by the late 1970s, matched by more than a doubling of the workforce in the formal industrial sector, mostly public, between 1973 and 1979 (Gogué and Evlo 2004). By the late 1970s, however, Togo had already begun to experience fiscal difficulties, which led to major increases in external borrowing; the external debt rose from 15.1 percent of GDP in 1970 to 116.4 percent by 1978. With crisis looming the government negotiated an IMF-administered Financial Stabilization Program in 1979, and a series of Structural Adjustment programs began in 1982. Government investment shrank from nearly 50 percent of GDP in the late 1970s to 20 percent by 1989; an employment freeze shrank the civil service by 13 percent between 1985 and 1988. By 1990 the unwinding of the unsustainable spending boom was essentially complete; the growth environment was subsequently dominated by the emergence of civil strife in 1990 and a temporary, abortive political reform and restoration of repressive military dictatorship in 1991.

3.4 State Breakdown

<u>Burundi, 1988-00</u>: Following the history of pro-Tutsi redistribution and the harsh political repression of the majority Hutus, civil war broke out in 1988. A second civil war occurred in 1993 following the assassination by the army of Melchior Ndadaye, Burundi's first democratically elected president. Pierre Buyoya, the Bururi Tutsi who had seized power via military coup in 1987 and then lost the 1993 election, regained power via a second military coup in 1996. Nkuruziza and Ngaruko (2003) characterize the entire period from 1988 to 2000 as one of "war and an unprecedented economic crisis" (p. 6).

<u>Chad, 1979-84</u>: Chad came to independence in 1960 as a highly polarized country, with the cotton-producing south successfully leveraging its higher income and superior educational endowment into control of the national government. For the first decade and a half of independence the Tombalbaye government failed to sufficiently share Southern wealth with the North, resulting in the emergence of low-intensity insurrection in the North (Azam and Djimtoingar 2003). Following a 1975 coup, General Malloum, another Southerner, attempted to bridge the political divide by appointing the northern rebel leader Hissène Habré as Prime Minister. Habré's aggressive anti-corruption drive

alienated Southern elites, leading to the 1979-84 civil war that culminated in Northern-based rule.

Following the 1979-84 war, the North severely repressed the South politically, a pattern that was attenuated only after Idriss Déby took over the government in 1990 and re-instated a regionally-based power-sharing approach, appointing General Kamougue, who formerly led the resistance in the South, as president of the national assembly. The devaluation of the CFA in 1994 helped stabilize the economic environment as well, especially for cotton production.

Sierra Leone, 1967-68, 1991-2000: We identify two periods of state breakdown in Sierra Leone. The first was a brief period of acute political instability following the closely-fought election of March 1967. The election was won by the APC opposition party, dominated by the Northern-based Temne group, but the victors were prevented from taking power by a coup. Two further coups occurred within the span of a year, the second of which brought the APC to power and provided the basis for the redistributive episode of 1970-89. State breakdown re-emerged with the outbreak of civil war in 1991. Though multiple reasons are usually cited, the primary cause of the war appears to be the autocratic rule of the APC that prevented any smooth political changeover and thus caused a rebel movement to take up arms against the government. The war was fuelled by discontent, with ethnic rivalry mainly between the Temnes of the APC and the Mendes as a driving force, together with readily available diamonds at the control of the rebels. It was officially declared over in January 2002 after the defeat of rebel forces by external intervention.

3.5 Syndrome-free cases

Syndrome-free status typically denotes a combination of political stability with reasonably market-friendly policies. Around independence, the combination tended to be associated with the ascendancy of politically conservative governments. To some extent, such occurrence could be viewed as a political accident. It could also occur briefly when a military coup replaced an authoritarian government with a disastrous economic record. Furthermore, it might merge from a case of major fiscal difficulties that would force the government to seek fiscal space by submitting to a structural adjustment program administered by the Bretton Woods Institutions. Several case examples follow:

Botswana, 1960-2000: Botswana is the shining example of a syndrome-free country in Africa. This outcome emanates from the democratic multiparty political arrangement based on the Tswana traditional political culture, which also served to protect the interest of minority groups. The state-led development, unlike the case of most other African countries, was based on strategic facilitation of the private sector rather than state suppression. Furthermore, unlike the historically authoritative governments of China and East Asia, the government of Botswana has been democratic. Why did Botswana succeed in establishing such a market-friendly democratic government when so many countries failed or never even attempted? One possible answer is the decision by the time of independence in 1966 to base the government on pre-colonial traditional conservative Tswana culture involving widespread political participation, creating “an indigenous developmental state" (Maundeni 2001, Maipose and Matsheka 2004). This was further made possible by the fact that Botswana has had a relatively small (less than 2 million even today), homogeneous population. Thus, the country did not suffer as much pre-independence polarization as many other African countries with much inter-ethnic rivalry. In addition, the interests of the members of the government, mostly cattle raisers, were consistent with the pursuit of market-friendly policies favoring the rural sector. Thus, rural-unfriendly urban-bias policies, such as overtaxing the rural sector via the use of state marketing boards or overvaluation of the exchange rate, were avoided. There was also the historical endowment advantage with respect to the nature of the diamonds, the main pillar of the Botswana economy. The Botswana diamond deposit required deep-earth mining, unlike the alluvial diamonds of Sierra Leone, for example. Thus the marginal cost of mining without appropriate state sanctioning was relatively high, attenuating the use of diamonds as a financing tool for insurgency. Another geographical benefit is Botswana's proximity to South Africa. Being a member of both the Southern African Customs Union (SACU) and the regional monetary union, RMA, exchange rate and monetary stability was maintained. Moreover, the country was the beneficiary of generous donor support based on its status as a democratic state at the doorsteps of apartheid South Africa.

<u>Burkina Faso, 1991-2000</u>: This period constituted a relatively market-driven economy, with a new constitution in June 1991 that ushered in political liberalization and then a devaluation of the CFA franc in 1994. The genesis of this regime was the set of fiscal difficulties faced by the military regime in the late-1980s. Captain Compaore of the Front Populaire (FP) came to power in October 1987 through a coup. The FP "first attempted to continue with the revolutionary mood" (Savadogo *et al* 2003), but in the face of major fiscal/economic difficulties was compelled to seek assistance through the structural adjustment program of the IMF/World Bank.

<u>Ghana, 1984-2000</u>: The fiscal and balance of payments crises of the late 1970s and early 1980s (see above) forced the radical-leaning Rawlings government to accept the bitter medicine of deregulation and economic liberalization as of 1984 and structural adjustment beginning in 1986. After years of muddling through, with the economy on its knees, and with little revenue to turn the situation around and no hope for external financial support, the radicals had to bow to reason and accept market-based economic reforms. In addition, it was clear that after years of coups and counter coups, and with nothing to show for the record, another coup would not necessarily be the solution.[6]

<u>Togo, 1960-73</u>: Market-friendly policies survived the coups of 1963 and 1967 and the assassination during the former coup of the politically conservative but economically liberal President Sylvanus Olympio. The initial genesis of market-friendly policy reflects Olympio's own background as a former executive of an international trading company, as well as the influence of the business community, which constituted his support base. The syndrome-free period ended with the phosphate booms of the mid-1970s.

[6] Although Fosu (2002) shows that a successful coup may actually raise growth when economic performance is extremely poor and investment is low, there was no guarantee that a coup attempt would necessarily succeed; an abortive coup would likely only exacerbate the growth plight.

Sierra Leone, 1961-66: The politically conservative leadership of the Protectorate-based Sierra Leone People's Party (SLPP), comprising chiefs and those from the hinterland, facilitated a market-friendly set of policies. The SLPP also maintained political stability by forging an alliance with the relatively educated Freetown-based Creoles. The stability ended when the closely fought election of March 1967 resulted in a successful coup that prevented the winner, the All People's Congress (APC), from taking office. The APC was finally able to assume office following a third successful coup since the election. The more socialistic APC began to put in place relatively market-distorting and adverse redistributive measures of state controls.

4. Endogenizing Policy Choices[7]

Nation-building under post-independence realities

The nature of policies adopted in the period immediately following independence appears to be very much determined by the coalition that won out. The more politically conservative the winning coalition was, the more likely that relatively market-friendly policies would be adopted. To a great extent such political leaning was influenced significantly by the experience of the leadership with respect to the competing development paradigms at the time: capitalist versus socialist.[8] Most African leaders found the socialistic direction particularly attractive for several reasons. First, they were strong believers in the need for a relatively equitable growth, and viewed capitalism as a mechanism for few capitalists to become richer at the expense of the masses. Second, the private sector was very much non-existent in many of these countries; thus the state was seen as the primary agent for economic growth and development. Third, the government's role was seen as preserving the state, which normally comprised different and adversarial ethnic groups; that objective was seen as requiring a strong central authority with the power for resource redistribution to be targeted at attenuating centrifugal forces. The need to preserve the non-cohesive embryonic nation following independence was the preoccupation of the vast majority of African leaders. Such preoccupation would dominate most of the policies pursued.[9] These policies included the adoption of controls, including augmenting the power of the state, for redistribution purposes.

Time preference and the role of government

In many cases where the leadership at the time of independence was politically conservative (capitalistic) with market-friendly policies, the governments did not last long.[10] There was much political agitation in favor of the government leading the charge

[7] This section draws significantly from Fosu (2005).

[8] See for example Ndulu (2004) for a discussion of the influence of international paradigms on African leaders' policy choice.

[9] The political bent of the early leadership, in contrast, appears to a large extent to be due to chance. The case-study sample reveals about the same number of syndrome-free cases as syndromes in 1960 (Fosu, 2005).

[10] There were several notable exceptions. For example, Ahidjo of Cameroon voluntarily retired in 1982, and Houphouet-Boigny of Ivory Coast and Hastings Banda of Malawi continued in power till retirement. Most importantly, Botswana was able to continue with its multi-party democracy without military

to improve the lot of the people, especially given the rather slow pace at which the relatively undeveloped private sector was able to deliver the expected development outcomes for the population at large. Sooner or later, such governments were supplanted by more politically radical leaders, which preached the need for governments to quickly improve the lot of the masses through more active intervention. These relatively interventionist, but initially popular, governments also tended to resort to autocratic measures, as well as redistribution (regional or vertical), in order to solidify their political position. Resorting to controls is consistent with such a strategy for two reasons: (1) government control of resources through marketing boards is intended to provide monopoly/monoposonistic rents for redistribution; (2) price and foreign exchange controls that result from the rationing of resource shortages by the state or policies to reward the elite constituency (overvaluation of foreign currency, for example), at the same time providing opportunities for economic rent for the political coalition. Thus, it is unsurprising to observe that the syndrome-free frequency decreased steadily through the 1970s, while the incidence of syndromes, particularly controls and intertemporally unsustainable spending, increased into the 1970s (Fosu, 2005).

The role of the military

In cases where relatively radical governments won out at the time of independence, the economic outcome was usually dismal eventually. Such regimes usually became authoritarian, making the military the only recourse for change. In many cases, however, attempted coups did not succeed, leading to even harsher measures by the targeted government and resulting in further deterioration in economic conditions (Fosu, 2002).[11] The inability to ascend to power through the ballot box led to the tendency to usurp power unconstitutionally, first through the military in the form of coups, and second through armed rebellions where the coup route was foreclosed.[12] Thus political instability and state failure were the likely eventual outcomes.

Importance of supply shocks

The role of supply shocks in the adoption of control regimes or engaging in intertemporal unsustainable spending booms is not to be underestimated. In many cases, droughts and/or negative supply international shocks led to the adoption or strengthening of government controls. And, in the case of positive supply shocks, governments would usually misinterpret such events as permanent rather than transitory and would engage in spending booms that could not be sustained.[13] In either case, however, fiscal difficulties would often result, forcing governments to eventually seek assistance through some form

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intervention. One reason behind this feat might be that there was little ethnic rivalry to be taken advantage of by coalitions of a fractionalized military. Another, perhaps more significant, is that the military was not an important institution in Botswana.

[11] See for example the case of Cameroon where following the failed coup of 1984, President Biya became more authoritarian and engaged in a strong ethnically redistributive process in order to shore up his political support.

[12] The genesis of the Liberian civil war, for example, is traced in large part to the inability of the opponents of Samuel Doe to overthrow him via the regular military (Davies, 2005).

[13] Alternatively, governments may undertake short-term projects especially if they have a relatively short expected political lifespan due to a high risk of government overthrow.

of structural adjustment measures administered by the IMF/World Bank, thus beginning the process of adopting market-friendly policies.

Rational political choice

The heretofore adoption of policies inconsistent with market forces, usually leading to syndromes, would seem to nevertheless be consistent with the political interests of the ruling elite. In the absence of general elections, the most important political coalitions in support of the government would be the elites, most of whom resided in the urban setting. Thus, urban-bias policies in terms of overtaxing of rural production such as cash crops would be politically optimal (Bates 1981). And so would the overvaluation of the domestic currency (Fosu 2003), which would furthermore provide the basis for elite political instability in the form of coups (ibid.).

A notable exception to the African norm of the urban elite constituting the electoral coalition for governments was the case of Botswana. There, the ruling party drew its support from the rural sector and therefore reflected rural interests. Hence, it avoided urban-bias policies such as overtaxing rural production through state marketing boards and overvaluation of the exchange rates, for example. By not going the way of one-party states, Botswana also succeeded in allowing the voices of other interest groups to be heard. This direction probably helped to provide room for addressing grievances and to avoid the need for coups or armed conflicts.

Achieving the syndrome-free state

The important question then is how Botswana was able to maintain its multi-party democracy. Apparently, the relative homogeneity of its electoral coalition and the weakness of the opposition parties meant that the ruling party had little threat of being replaced. Thus, multi-party politics could be accommodated without the usual inter-ethnic rivalries holding sway in most localities in Africa. Such rivalries led leaders at independence to view the creation of one-party states with strong central governments as the solution; they were concerned that multi-party politics would only exacerbate ethnic polarization. Unfortunately, the authoritarian nature of these governments, coupled with latent ethnic rivalries, led to competition for economic rents created by government controls of the economy. Thus, already existing ethnic polarization presented many African leaders at independence with the "bad luck" to pursue policies that were meant to hold the newly created states together. Furthermore, those policies were consistent with a major paradigm in favor of the important role of government in the development process. Unfortunately, however, those policies also resulted in anti-growth syndromes.

Yet, the more recent syndrome-free regimes in Africa can be attributed to the fiscal and other economic difficulties in which many of these countries found themselves. From country to country, governments sought assistance to escape these difficulties. Ultimately, they turned to the IMF/World Bank, which prescribed programs requiring the adherence to market-friendly policies. The ultimate test is the extent to which these policies are maintained into the future, especially in the light of negative shocks, such as severe droughts and other natural calamities, deterioration in the international terms of trade, and violent conflicts. Unfortunately, as the number of syndrome-free cases has increased as of the latter part of the 1980s, so has the frequency of state breakdowns. The challenge then is to attenuate this syndrome without a return to the other policy syndromes.

5. Concluding Observations

The ability of African governments to continue with major market interventions began to decline in the late 1970s, as the continent's fiscal health and overall performance deteriorated in the face of external shocks and, in some cases, dwindling external support. By the early 1980s, structural adjustment programs dominated the policy debate in many African countries. The liberalizing agenda of these programs reflected a variety of influences, including the non-sustainability of increasingly distortionary control regimes, the rise of conservative governments in Europe and the United States, the elimination of the Soviet Union as the exemplar and main patron of central planning, and the spectacular success of outward-oriented strategies among the East Asian manufacturing exporters. By our assessment, a decade of cumulative reforms had brought most African governments to syndrome-free status by the mid-1990s.

African growth rebounded strongly in the late 1990s. This is consistent with our empirical results, which suggest that syndrome-free status was worth some 2 percentage points of predicted growth during the 1960-2000 period. This is not a small impact; other things equal, avoiding syndromes over the full period would have supported continent-wide growth at roughly the modest rate attained by the industrial countries. Under these conditions, average GDP per capita in Africa, today, would be more than twice its current magnitude.

What are the prospects, however, for truly rapid growth in Africa, e.g., at rates of 4 percent or more in per capita terms? Since 1960 only Bostwana, Mauritius and Uganda in our SSA sample have achieved this outcome for extended periods. Our central message is they have done so, in large part, by steering clear of syndromes: in effect, by guaranteeing "peace, easy taxes, and tolerable administration of justice" – identified centuries ago by Adam Smith as the core functions of government. Extrapolating from our present findings, avoiding anti-growth syndromes will remain a *necessary* condition for rapid growth in Africa. The manifest difficulties of maintaining such status, and the implications of failure to maintain it, are well illustrated by the contemporary cases of Zimbabwe and Cote d'Ivoire.

At the outset, however, we posited that growth depends on opportunities and choices. We have focused on choices, and within this category on a well-defined set of anti-growth syndromes. As observed above, while the avoidance of these syndromes is necessary for sustained rapid growth, it is not in general sufficient. We close with a brief discussion of two related questions. First, what accounts for the variation in growth outcomes among the syndrome-free episodes? Global econometric evidence suggests important roles for geography and resource endowments (as captured in Growth project research by the distinction between high-opportunity coastal, resource-poor economies, low-opportunity landlocked, resource-poor economies, and high-variance resource-rich economies), for luck (contrast copper and oil) and, within these categories, for gradations of leadership and institutional quality that are not captured by our sharp syndrome/syndrome-free distinction. Much can be learned from the country studies about how these factors affect the growth environment in particular contexts. The growth literature also identifies ethno-linguistic fractionalization – the existence of multiple ethno-linguistic groups, each a small proportion of the overall population – as an anti-growth factor, and particularly one that operates through the ability of governments to maintain growth-oriented policies (Easterly and Levine 1997). In related work, we have not found significant effects of ethno-linguistic diversity on growth, once adequate controls are made for Africa's geography and initial conditions (Ndulu and O'Connell 2000, O'Connell 2004). The case study evidence suggests a potentially powerful role, instead, for ethno-regional polarization – a situation in which a few large, regionally-based groups dominate the political loyalties of a substantial fraction of the population. Further work is required to develop adequate measures of *ex ante* polarization and assess their impact on growth via conflict and/or economic policy (O'Connell 2004 makes a start).

Second, are there arenas in which failures to undertake proactive intervention, especially in response to opportunities – errors of omission, in effect, rather than the errors of commission we have emphasized here (Collier and Gunning 1999) – are binding constraints on rapid growth? Here the case study evidence is necessarily less informative, given the limited experience of sustained rapid growth in Africa. Uganda's experience from 1986 to 2000, for example, was primarily one of recovery from the depths of Amin and post-Amin breakdown (1971-86). The Ugandan strategy during the post-1986 period represents as clear a case of prioritizing core functions – in effect, of achieving syndrome-free status – as can be found in the development literature (Reinikka and Collier 1999, Kasekende and Atingi-Ego 2004). To date, therefore, Uganda's lessons have to do with the power of syndromes, not with the details of growth strategy for landlocked and resource-poor countries. Globally, landlocked countries have significantly lower incomes than their coastal neighbors, on which they rely disproportionately not just for transport services but also for markets, including markets for labor services. Within Africa, the strong long-run growth performance of Lesotho and Swaziland within the landlocked group may in part reflect their close integration with the South African economy. The integration of regional markets, both for goods and for transport and labor services, should be a high priority for Africa's landlocked economies.

Botswana's growth, in turn, has been driven by the development of very favorable mineral potential. Globally, mineral rents constitute a low-mean, high variance growth opportunity, with favorable outcomes dependent on good luck with commodity prices and on avoiding the intertemporal and state breakdown syndromes. Transparent and prudent management of rents is therefore the heart of what Botswana has to teach other resource-rich African countries. In the longer run, however, success requires economic diversification, but Botswana's achievements in this area have been limited both by its tiny population and, perhaps, by its membership in a customs union dominated by South African manufacturing firms. Africa's larger resource-rich economies will have to look to global examples for lessons in economic diversification.[14]

Perhaps the most daunting and important puzzle in the African growth experience is the failure of its coastal, resource-poor economies to participate in the explosion of manufactured exports from developing countries that occurred in the last quarter of the

[14] Indonesia famously leveraged its oil boom of 1974-79 into a doubling of the number of primary schools, strengthening the platform for its subsequent diversification both within the primary sector and into manufactured exports (Duflo, 2000).

20h century (Collier and O'Connell 2005). The global evidence suggests that countries like Kenya, Mauritius, and Senegal faced very favorable growth opportunities during this period. But only Mauritius – after a disastrous experiment with import-substituting industrialization – managed to capitalize on its low transport costs and abundant labor by developing a strategy to attract domestic and foreign investment into export-oriented manufacturing. In the early 1970s, Mauritius adopted an outward-oriented, shared-growth strategy that was focused on the attraction of new investment and the creation of jobs (Madhoo and Nath 2003). This required keeping labor costs low, which Mauritius achieved partly through a rapid drive to universal primary education and partly through a combination of wage restraints, a competitive exchange rate, and the provision of non-wage benefits (e.g., housing subsidies) to low-income workers.

For coastal, resource-poor African economies, a central focus of growth strategy should continue to be the achievement of competitiveness in non-traditional export markets, particularly in manufacturing but also in services. Avoiding syndromes will play a key and cumulative role here; Collier and O'Connell (2005) find that diversification into non-traditional export markets depends in part on the duration of syndrome-free status, so that countries that achieved such status in the early 1990s (e.g., Senegal) tended to see substantial diversification later in the decade. Such diversification bodes well for sustained growth and development, as the Asian and other examples have clearly demonstrated.

A critical and unresolved question, however, is whether an export-led growth strategy is subject to major threshold effects in the area of human development. If so, achieving success may require a massive initial impetus to increase the quantity and quality of investment in health and education. At the beginning of its successful export push, Mauritius did indeed have a very substantial head start in terms of human development by comparison with the remainder of coastal Africa. Life expectancy at birth, for example, was 62 years in Mauritius in 1970, as compared with an average of 48 for Ghana, Kenya, Senegal and South Africa. Mauritius was already well into the demographic transition, with a total fertility rate of 3.7, as compared with 6.9 in the comparison group. Enrollment rates in primary, secondary and tertiary education were also much higher in Mauritius.[15] Other things equal, these advantages would increase the short-run economic returns to a labor-intensive export-led growth strategy, thereby raising the political returns to such a choice, relative to a policy of predation on existing trade (Gallup and Sachs 1999). Indivisibilities in human resource investment, if present, would only strengthen the leverage of this argument in explaining the different choices of Mauritius and the rest of coastal Africa during the critical years of the 1970s and early 1980s.

With respect to literacy rates and educational enrollments, slow but steady progress had put many African coastal economies, by 2000, into a position comparable to that of Mauritius on the eve of its export drive, suggesting perhaps that remaining thresholds, if any, are modest. But demographic indicators remain behind, and in the important case of life expectancies show a dramatic reversal of progress as of the mid-1990s, particularly in Southern Africa. And the environment for poor-country manufactured exports is in some clear respects more difficult now than in the early

[15] The cited human development data, including enrollment rates, are from the World Bank's World Development Indicators.

1980s, as major new exporters (e.g., India and China) reap the benefits of early policy reforms, subsequent agglomeration, and most recently, improved access to industrial-industrial-country markets for textiles and apparel. Public investments in education and especially health are therefore likely to play a particularly critical role in successful growth strategies among Africa's coastal economies.

We conclude by returning to the political economy of policy, which is the central focus of the growth project. The fundamental challenge for growth researchers, in our view, is to understand the processes through which durable and pro-growth bargains are identified and sustained, both among political elites and between political elites and the populations that sustain them in power. In our own assessment, based on Africa's experience from 1960 to 2000, the achievement and maintenance of syndrome-free status must be a central operational objective of any such bargain.

Table 1. *Country cases in the Growth Project, by sub-region.*

Eastern and Central Africa	Burundi, Cameroon, Chad, Congo, Ethiopia, Kenya, Niger, Sudan, Uganda.
Southern Africa	Botswana, Malawi, Mauritius, Mozambique, Namibia, South Africa, Tanzania, Zambia.
West Africa	Benin, Burkina Faso, Cote d'Ivoire, Ghana, Guinea, Mali, Nigeria, Senegal, Sierra Leone, Togo.

Table 2: *Opportunities and syndromes.*

Oppor-tunity category	Distribution of years by opportu-nity category	Relative frequency of observed syndromes within each opportunity category, independence to 2000.				
		Regulatory	Redistrib-utive	Intertem-poral	State Break-down	Syndrome -free
				Unweighted		
	(1)	(2)	(3)	(4)	(5)	(6)
Coastal	50.7	45.0	14.3	6.4	12.1	33.8
Llocked	30.3	50.7	17.2	21.0	14.4	28.3
Resrich	19.0	44.4	24.1	23.8	10.6	34.4
Total	100	46.6	16.9	13.9	12.5	32.3
				Population weights		
	(7)	(8)	(9)	(10)	(11)	(12)
Coastal	52.5	40.4	22.8	4.1	11.1	37.8
Llocked	26.13	40.2	23.3	30.4	17.0	14.2
Resrich	21.37	15.2	73.2	63.2	6.5	7.9
Total	100	35.1	33.5	23.3	11.7	25.4

Cols 7-12: Country/year observations are weighted by population in 1980.

Table 3: *Regulatory distortions, African countries with national currencies.*

	Hard	Soft	Syndrome-Free
	Black market premium, %		
	(1)	(2)	(3)
Mean	196.0	148.9	23.8
Median	79.6	41.0	9.6
# observations	93	242	316
	Ex ante real deposit interest rate, %		
	(4)	(5)	(6)
Mean	-19.6	-76.1	-5.2
Median	-7.6	-4.7	-0.8
# observations	49	127	147

Cols 4-6: The ex ante real deposit rate is the nominal deposit rate minus expected inflation, with the latter proxied by a weighted average of once- and twice- lagged inflation (weights .7, .3).

Table 4: *Intertemporal syndromes.*

Classification of year	Indicator variables					
	Fiscal deficit			*Overvaluation index*		
	# obs	mean	median	#obs	mean	median
Intertemporal	108	4.2	3.4	151	173.5	168.1
Syn-free	159	2.3	2.5	402	133.6	124.3
Total	267	3.1	2.9	553	144.5	134.2
	Increase in external debt			*Inflation rate**		
	# obs	mean	median	# obs	mean	median
Intertemporal	182	5.6	3.1	197	452.2	21.2
Syn-free	280	1.3	0.2	503	11.8	6.5
Total	462	3	1	700	111.5	8.5

*****Inflation rate reported for countries with national currencies only.
Source: World Bank and IMF data.

Table 5: *Joint distribution of syndromes and growth.*

5a. Growth rates by syndrome status

Syndrome status	Growth rate		
	# obs	mean	median
Not free	1,109	-0.37	0.02
Syn-free	515	2.33	1.82
Total	1,624	0.49	0.78

5b. Distribution of growth collapses and surges by syndrome status (% of row).

Syndrome status	3-yr MA of growth <0	>=0	Total
Not free	49.3	50.7	100
Syndrome-free	19.1	80.9	100
Total	39.5	60.5	100

Syndrome status	5-yr MA of growth <2.5	>=2.5	Total
Not free	75.9	24.1	100
Syndrome-free	47.5	52.6	100
Total	66.7	33.3	100

Syndrome status	5-yr MA of growth <3.5	>=3.5	Total
Not free	80.7	19.3	100
Syndrome-free	55.8	44.2	100
Total	72.6	27.4	100

5c. Syndrome-free status and frequency of growth surges over time (%).

	1960s	1970s	1980s	1990-00
Syndrome-free and g>2.5	73	52	44	40
Syndrome-free and g>3.5	60	41	42	35

Table 6. *Robust regressions controlling for shocks.*
Dependent variable is growth in real GDP per capita.

Variable	(1)	(2) a/	(3)	(4) a/	(5) b/	(6) a,b/
Syndrome-free	1.747 0.315***	1.650 0.294***	1.672 0.291***	1.816 0.293***	2.120 0.292***	2.086 0.080***
Partner growth	0.309 0.092		0.309 0.084		0.296 0.072***	
Rainfall	0.165 0.144	0.167 0.151	0.135 0.131	0.171 0.150	0.178 0.112	0.177 0.031***
Coastal			0.502 0.298*	0.104 0.299		
Resrich			0.451 0.375	0.595 0.378		
N	1492	1795	1492	1795	1492	1795

* p<.1, ** p<.05, *** p<.01.
All regressions are estimated by the least absolute deviation method.
The excluded category in regressions 3 and 4 is landlocked, resource-poor economies.
a/ Regression includes yearly fixed effects.
b/ Regression includes country fixed effects.

Table 7. *Robust regressions controlling for shocks: all syndromes.*

	(1)	(2) a/	(3)	(4) a/	(5) a,b/
Regulatory	-0.987 0.290***	-0.914 0.196***	-0.908 0.253***	-0.860 0.219***	-1.73 0.308***
Redistributive	-0.997 0.366***	-1.158 0.244***	-0.946 0.319***	-1.123 0.271***	-0.652 0.434
Intertemporal	-0.878 0.409**	-1.090 0.291***	-0.891 0.367**	-1.044 0.333***	-0.335 0.425
Breakdown	-2.320 0.432***	-2.482 0.300***	-2.138 0.378***	-2.612 0.334***	-2.59 0.439***
Partner growth	0.292 0.093***		0.280 0.081***		0.317 0.079
Rainfall	0.102 0.146	0.157 0.106	0.076 0.126	0.141 0.118	0.179 0.122
Coastal			0.330 0.292	-0.062 0.240	
Resrich			0.757 0.360**	0.605 0.298**	
N	1492	1795	1492	1795	1492

Notes: see Table 7.

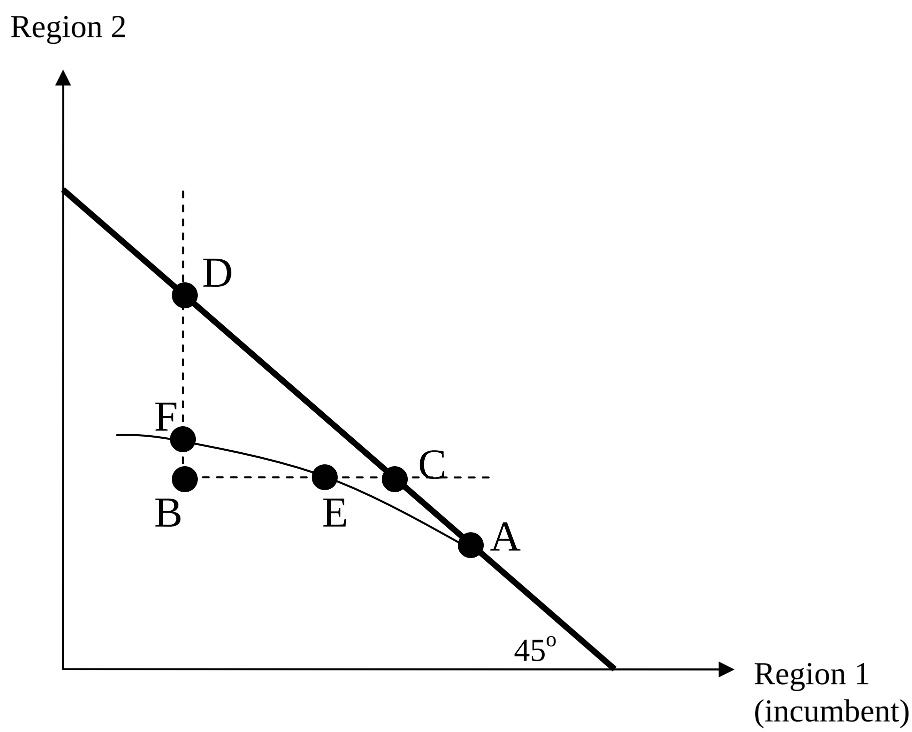

Figure 3: Buying the peace
Source: J.P. Azam, working paper, growth project synthesis**.**

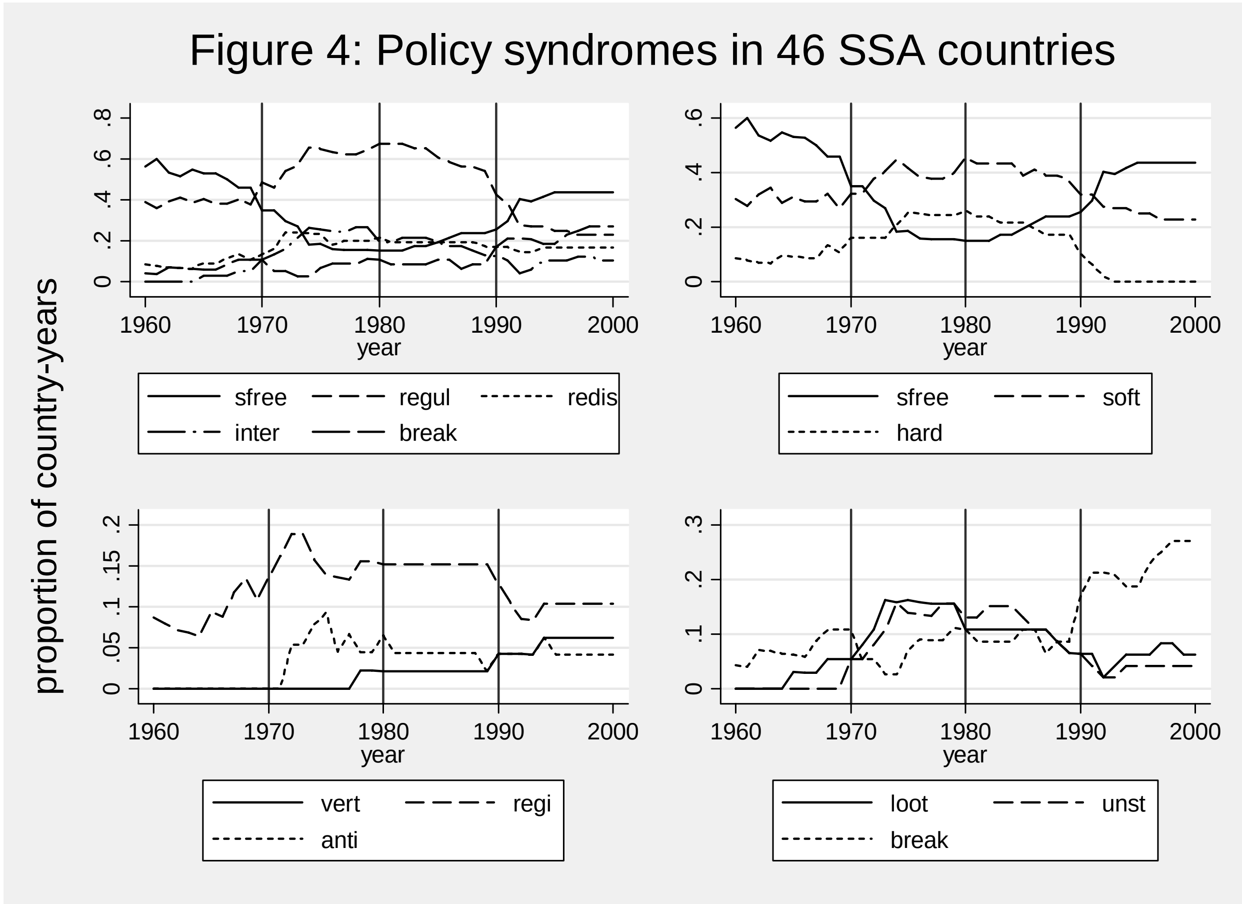

Figure 4: Policy syndromes in 46 SSA countries

Source: Judgmental classification by editorial committee based on country studies and broader literature.

Key: *sfree* = Syndrome-free; *regul* = Regulatory (of which: *soft* or *hard*); *redis* = Redistributive (including in various combinations *vert* = Vertical, *regi* = Regional, *anti* = Anticipated); *inter* = Intertemporal (including *unst* = Unsustainable spending and/or *loot* = Looting); *break* = State Breakdown.

Appendix

Table A1. *Real GDP growth (%), SSA, 1961-2000*

Country	1961-65	1966-70	1971-75	1976-80	1981-85	1986-90	1991-95	1996-00
Angola	..	..	..	..	..	3.3	-3.8	6.5
Benin	3.3	2.7	1.4	4.1	4.7	0.9	4.2	5.3
Botswana	6.3	11.0	18.2	12.2	10.0	11.9	4.1	6.3
Burkina Faso	3.0	2.9	3.1	3.6	4.2	2.6	3.8	4.3
Burundi	1.9	7.6	0.6	4.2	5.4	3.7	-2.2	-1.0
Cameroon	2.7	1.6	6.7	6.9	9.4	-2.2	-1.9	4.7
Cape Verde	..	..	..	..	8.6	3.5	5.2	6.4
Central African Republic	0.7	3.2	2.0	0.7	2.3	0.0	1.1	2.4
Chad	0.7	1.4	0.9	-4.5	9.2	1.9	2.4	2.3
Comoros	..	..	..	..	4.3	1.6	0.9	1.0
Congo, Dem. Rep.	2.8	3.8	2.5	-1.5	1.9	0.0	-7.1	-3.9
Congo, Rep.	3.4	5.0	8.0	5.2	10.6	-0.3	0.7	2.5
Cote d'Ivoire	8.0	9.7	6.4	4.5	0.3	1.2	1.5	3.5
Djibouti	..	..	..	..	..	-0.7	-1.8	-0.2
Equatorial Guinea	..	..	..	..	..	1.4	7.0	35.7
Eritrea	..	..	..	..	..	..	12.5	1.2
Ethiopia	..	..	..	..	-0.9	5.3	1.5	5.3
Gabon	8.2	5.6	18.1	0.4	2.6	1.7	3.1	1.8
Gambia, The	..	4.5	5.5	4.4	3.2	4.1	2.1	4.8
Ghana	3.1	3.0	0.0	1.0	-0.3	4.8	4.3	4.3
Guinea	..	..	..	..	..	4.5	3.7	4.2
Guinea-Bissau	..	..	3.2	-0.6	6.4	3.8	3.2	1.1
Kenya	3.5	5.9	10.0	6.3	2.5	5.6	1.6	1.8
Lesotho	7.6	2.8	8.6	12.3	3.2	5.9	4.0	3.0
Liberia	3.2	6.6	1.6	2.2	-1.9	-16.5	-21.7	38.3
Madagascar	1.4	4.7	0.7	1.5	-1.5	2.7	-0.3	3.8
Malawi	4.6	5.0	7.6	4.9	2.2	2.3	3.5	3.9
Mali	..	3.4	3.4	4.9	-2.2	3.9	3.0	3.9
Mauritius	..	..	..	..	4.3	7.4	5.1	5.3
Mozambique	..	..	..	..	-4.6	5.6	3.5	8.0
Namibia	..	..	..	..	-0.2	2.7	5.0	3.5
Niger	6.3	-0.5	-2.1	5.4	-2.3	2.6	0.8	2.9
Nigeria	4.5	5.6	5.8	4.1	-2.8	5.4	2.5	2.8
Rwanda	-1.6	7.6	0.8	10.3	2.7	1.5	-4.0	9.8
Sao Tome and Principe	..	..	..	..	..	1.8	1.6	2.1
Senegal	2.0	2.0	2.5	1.2	3.2	3.2	1.5	5.3
Seychelles	3.7	3.8	7.1	8.6	0.9	5.6	2.9	6.4
Sierra Leone	4.4	4.2	2.4	2.3	0.9	1.1	-5.0	-3.3
South Africa	6.8	5.8	4.6	2.5	0.9	1.8	0.9	2.6
Sudan	1.9	1.4	5.0	2.7	0.8	4.6	5.1	6.1
Swaziland	..	..	9.6	3.2	2.6	11.2	2.8	3.3
Tanzania	..	..	..	..	..	..	1.8	4.2
Togo	10.1	6.7	3.7	5.1	-0.2	2.5	0.6	2.3
Uganda	..	..	..	..	0.7	5.1	7.0	6.5
Zambia	6.2	1.6	2.5	0.4	0.5	1.6	-1.3	2.8
Zimbabwe	3.6	9.4	4.9	1.7	4.4	4.6	1.4	2.1
SSA	**5.1**	**5.0**	**4.8**	**2.8**	**1.2**	**2.7**	**1.6**	**3.6**

SSA excl. South Africa	**3.5**	**4.1**	**4.9**	**3.2**	**1.5**	**3.4**	**2.2**	**4.2**
SSA_WDI	**5.4**	**5.1**	**4.6**	**2.7**	**1.0**	**2.5**	**1.1**	**3.3**

Notes: Means are weighted by GDP

Source: World Development Indicators CDROM 2004

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