

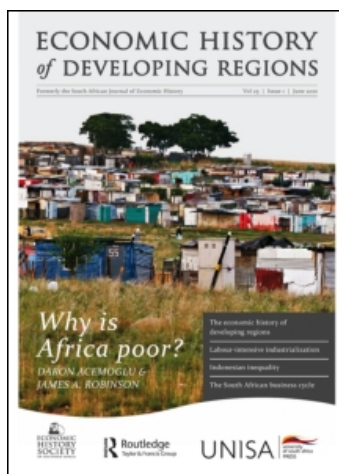
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AFRICAN GROWTH RECURRING: AN ECONOMIC HISTORY PERSPECTIVE ON AFRICAN GROWTH EPISODES, 1690-2010

Morten Jerven^a

^a Simon Fraser University, School for International Studies, Vancouver, Canada

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AFRICAN GROWTH RECURRING: AN ECONOMIC HISTORY PERSPECTIVE ON AFRICAN GROWTH EPISODES, 1690–2010¹

Morten Jerven²

ABSTRACT

Africa has not suffered a chronic failure of growth. In fact, Africa has experienced recurring periods of growth, and this paper reviews some of these growth “spurts” to substantiate that claim. The immediate cause of low income in Africa is that these “spurts” have always been followed by a “bust”. This is a significant reorientation of the central research question – away from a search for the root causes of Africa’s underdevelopment and towards explaining the causes and effects of growth and decline. The growth spurts are approached as local responses to a global demand for African produced commodities. In this paper, I shall argue that these supply responses involved more than a reallocation of land and labour; they entailed investment and required institutional change. It is precisely because these periods of rapid economic change and accumulation caused significant qualitative changes in how society and the economy were organized that they cannot be ignored – as they have tended to be in the search for a root cause of Africa’s chronic failure to achieve growth.

Keywords: growth failure, Africa, institutions, geography, Dahomey, Ghana, Zambia, Botswana

JEL classification: N17

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- 2 Simon Fraser University, School for International Studies, Suite 7200/515 West Hastings Street Vancouver, BC V6B 5K3 Canada. E-mail: Mjerven@sfu.ca

Despite manifest proof to the contrary, Africa's post-colonial economic performance is usually summarized as: "Africa has suffered a chronic failure of economic growth. The problem for analysis is to determine its causes" (Collier and Gunning 1999; for a critique see Jerven 2009a). This stylized fact of permanent stagnation fits well with the popular view of the distribution of income and growth in the world, embodied in the phrase "the bottom billion" (Collier 2007).³ Of course, when Collier and Gunning referred to Africa's "chronic failure of growth", they had in mind the recent past and were not committing themselves to grand historical judgments. Nevertheless, it is argued here that this stylized fact has provided the impetus for a literature that focuses on finding the historical causes of persistent low incomes in African economies (Acemoglu and Robinson 2010; Acemoglu et al. 2002 and 2001; Nunn 2008 and 2007; for a critique see Jerven 2010a, and Austin 2008b). This search for the historical roots of poverty has created a renewed interest in African economic history (Hopkins 2009) and economists, having agreed some time ago that "institutions matter" (for instance, Bardhan 2005), are now seemingly forming a new consensus around another truism. This time it is "history matters" (Nunn 2009; Woolcock et al. 2009; Guinnane et al. 2003). This paper certainly agrees with that point of departure, but suggests a different path: investigating economic growth in Africa as a process, rather than as one outcome with one historical root.

The experience of growth among African economies might better be approached as "growth recurring". The concept was used by Jones (1988) to show that intensive growth or periods of increasing per capita income have occurred at several times and places, both outside Europe and before the industrial revolution. His investigation was limited to the Eurasian Continent. According to Jones, economic history can be understood as an ongoing struggle between the propensity for growth and the propensity for rent-seeking. When the propensity for growth is stronger, it results in a period of increasing per capita incomes. Such episodes have occurred throughout the world, and although most of these periods were not "growth triumphant" (Easterlin 1996), as in the case of European industrialisation or late development in regions such as East Asia, they were still important in that they led significant increases in economic welfare and were associated with qualitative changes in how politics were organized.

Africa has experienced such growth episodes. This paper will investigate periods of increasing per capita income during pre-colonial, colonial and post-colonial times, taking the concept of recurring growth as a starting point. These growth episodes were rooted in trade and the world economy, but growth was only possible owing to a reorganization of factors of production, and a combination of investment and technological growth, which had significant consequences for political economy. The central thesis in this article is that, while factors of production could be relocated relatively smoothly and producers were able to change patterns of specialization with temporary social costs, the patterns of boom and bust crucially affected state revenue, and thus necessitated state reorientation, a process that was often slow, costly and associated with conflict.

3 "The Bottom Billion" is also referred to as "Africa +".

The paper will draw on existing scholarly work quantifying such historical growth episodes, and evaluate the development outcomes of these episodes. The article starts with a short review of the economic growth literature on the “root causes of African underdevelopment”. In section two, the Maddison data on African economies is presented, and its limits are reviewed. In four subsequent sub-sections, case studies from pre-colonial Dahomey, the colonial Gold Coast, the colonial and post-colonial Northern Rhodesia and post-colonial Botswana are presented to substantiate the claim that growth spurts have been an integral part of African economic past. Such spurts will also be part of Africa’s future, which makes the search for a root cause of African underdevelopment futile. There is a crucial difference between approaching the conundrum of African growth by asking why there has been a chronic growth failure compared with asking why African economies have grown and why they have regressed. In section III, this analysis is complemented with a comparison of the distribution of growth through time and space in Africa since 1950s. This section reconsiders and compares the two post-colonial growth episodes: 1950–1975 and 1995–2009. In 2009, the IMF predicted a fall in GDP per capita for African economies in 2010, marking the end of a period of sustained growth since the mid-1990s. This is a good point at which to consider the development effects of this recent period of economic growth. It is too early to tell whether the 2009 economic recession will evolve into a prolonged crisis like that of 1975 to 1995. This paper offers some new tools to analyse these prospects.

I

1.1 Root Causes of African Underdevelopment

If one accepts the stylized fact of persistent growth failure in post-colonial Africa and approaches economic growth as a linear concept, the next logical step is, and indeed has been, a search for the root cause of underdevelopment.⁴ Low income today must be the result of lack of growth in the past. The “first generation” of empirical growth literature explained the lack of growth in post-colonial Africa by linking measures of low institutional quality and proxies for growth-retarding policies with slow average growth (Collier and Gunning 1999; Jerven 2009a). Lack of openness to trade, state intervention in markets and rent-seeking activities, and other variables were found to correlate with, and were argued to be causally related to, slow growth in Africa (Barro and Lee 1993; Mauro 1995; Sachs and Warner 1997).⁵ In 1981, Bates offered a seminal rational choice theory explanation for why these growth retarding policies were adopted in the first place. He argued that African politicians chose policies that served their own interests rather than those favouring economic development.⁶ The

4 For a critique of this logic and a review of different growth patterns, see Pritchett (2000).

5 Durlauf et al. (2005, 639) report in the Handbook of Economic Growth that, in cross-country growth regressions, 145 explanatory variables have been found statistically significant; they identify 43 conceptually different ‘theories’ of growth as being ‘proven’ in the literature.

6 For a critique, see Leys (1996).

“second generation” of growth literature ventured further down this path, suggesting that lack of growth and lack of pro-growth policies could be explained by “initial conditions”, using different measures for lack of state legitimacy, lack of social capital and ethnic diversity to explain why African states choose not to promote development (Englebert 2000, Temple 1998; Easterly and Levine 1997).

A noted complaint from economic historians was that 1960 was conventionally taken as a starting point in this work, as if the period before then had no relevance for current economic outcomes (Hopkins 1986; Manning 1987; Austin 2007). There has been a definite change of emphasis in recent years. The seminal contribution here was made by Acemoglu et al. (2001), who argued that different patterns of colonization have had a persistent impact on economic growth through institutions. Austin (2008b) recently suggested that the ‘reversal of fortune’ thesis is the most discussed contribution of development economists since Lewis’s model of unlimited supply of labour, while Hopkins (2009) declared this recent surge in contributions to the study of long-term growth in Africa to be the “new economic history of Africa”.

The main contenders in the empirical growth literature searching for a root cause of underdevelopment can be organized into three chronological strands according to whether they: emphasise the negative effect of Africa’s geographical characteristics; the decisive impact of the slave trade; and the effects of the European colonization.⁷ Many of the contributions are variations of the same argument, essentially arguing that a particular historical event or factor endowment led to a particular institutional constellation that has had a lasting economic effect and thus determines relative poverty in world today. The big question in the literature is first: which of these historical events had the decisive causal impact and, secondly, through which transmission channels does this exogenous event continue to have an effect? A divisive issue is the relative importance of institutions versus geography or, as it was succinctly phrased in a recent debate: “Institutions rule” versus “Institutions don’t rule” (Rodrik et al. 2002; Sachs 2003 [respectively]). The common feature of the literature is that it searches for a root cause of African underdevelopment to explain a static outcome of growth failure. Or, as Acemoglu and Robinson argued recently in this journal: that, while “there are plenty of signs of dynamic indigenous capitalism and entrepreneurship in Africa this has been held in check by the institutional environment”(2010, 22). It is argued here that there might be more to learn from investigating economic change and that those lessons call into question the idea that institutions are path dependent.

1.2 The Political Economy of Episodic Growth in Africa

Specialization for export production is at the heart of Africa’s growth episodes. It is a truism that specialization increases risk, a risk that may or may not be justified by increased returns. Thus, in conventional development economics, this is an issue of opportunity cost. That risks are higher in production for a market than in ‘subsistence

7 As summarized by Battacharyya (2009). The seminal contributions for each respective strand are Bloom and Sachs (1998), Nunn (2008) and Acemoglu et al. (2001).

production' is not straightforward. A rational choice perspective would interpret the manifest growth in production for the market as implying that the informal cost-benefit analysis worked out in favour of specialization. A political economy perspective would take into account the fact that specialization was not an individual decision, but often subject to force in the interplay between individuals and pre-colonial, colonial and post-colonial states. African producers have been able to balance these risks, sometimes at the expense of the state. States and their rulers have sought to specialize in taxing production for the market, or have exploited their monopolies on certain resources. When the markets for these products failed, so have the states.

The factor endowment perspective, as endorsed by Sokoloff and Engerman for Latin America (2002), and modified for Africa by Austin (2008a), argues that institutions form in response to factor endowments.⁸ A related formulation is the staples theory, used by Hopkins (1973, 125) to analyze the implications of different export bases, in particular those arising from differences in factor combinations and the returns to scale. The perspective adopted here argues more specifically that the revenue base of the state has been changing dramatically through these recurring periods of growth and, importantly, that the character of the state has determined how and whether these revenues were re-invested. Periods of rapid economic change were accompanied by institutional change. It is these dynamics that call the wisdom of a root cause into question.

The historian, Cooper (2002), has proposed that the African state should be characterized as a "gatekeeper state", and describes the colonial and post-colonial state in Africa as typically relying on taxing exports. Bayart (2000), a political scientist, places the origin of this external dependence further back in time and argues that the slave trade was the first move towards 'extraversion'. The dependency theory version of this argument places the blame for this transformation firmly on Europe (Rodney 1972). In Bayart's version, the African elites played the key role. Bayart focuses on the orientation of the domestic political elite; a similar logic is found in the resource-curse theory, where it is argued that the political elite have no incentive to promote favourable institutions since rents are secured through mineral rents (Auty 2001). Going beyond mineral revenues, Deaton's landmark study of commodity export prices and African economic growth found no clear support for the resource-curse thesis. He found that African economies do better when the prices of commodities are high and that they suffer when prices are low (Deaton 1999, 38). Thus, in Deaton's view, the "paradox of plenty" does not apply. Commodity exports and related economic growth are opportunities rather than curses.

As will be illustrated in a study of growth episodes in the second section of this paper, these approaches all underestimate the institutional changes and in particular the changes in the role of agency that accompany the process of specialization. To be specific: specialization in slave trading testifies to the power of African elites and

8 Herbst (2000) argues, more deterministically, that historical land abundance in African economies can explain 'state failure' in Africa today. See Fenske (2009) for an attempt to test this hypothesis econometrically.

states. From their perspective, the slave trade was a means of securing returns through exports in lieu of a land tax. After the closing of the trans-Atlantic slave market, growth in “legitimate commerce” did in some places occur in spite of both pre-colonial and colonial states. Peasant producers were the leading agent of change during this period. The marketing boards, an institutional innovation by the colonial state, provided the basis for the state to reassert itself, and built the foundation for the post-colonial state. When these revenues were undermined by external markets and internal rent-seeking, structural adjustment and a radicalization of “extraversion” occurred. The most recent growth episodes have been based predominantly on mineral exports (OECD 2010). The internal revenue base of the state has remained limited and taxation through marketing boards has been curtailed.

II

This section examines the picture of African growth according to the available aggregate data sources. Data on African economic growth is not only constrained by low quality, but also by low availability (Jerven 2010b). The main reason that studies of economic growth have been confined to the period after 1960 is that datasets are not generally available for earlier periods. Thus, when Artadi and Sala-i-Martin (2003) address the “the economic tragedy of the 20th Century” the data marshalled to substantiate the claim only cover the period from 1960 to 2002. There are some data that go further back in time than that. Some colonial statistical offices did produce national account estimates and, as will be reviewed here, official estimates were made for Rhodesia and Nyasaland from 1945 onwards. In addition, some individuals have provided estimates for parts of the colonial period.⁹ The dataset currently providing the longest time series has been made available by Maddison (2009). Indeed, Bloom and Sachs (1998, 2) use an earlier version of this dataset to conclude that, for the past two centuries, “Africa’s poor economic growth has been chronic rather than episodic”. Austin (2008b, 1002) recommends caution when approaching these observations and reminds us that the literal interpretation of the word data is “things that are given” and therefore many of the historical income or population estimates used in the literature for African economies should not be considered as data in the strictest sense. The underlying primary sources are not always available for Maddison, but presumably the data before 1960 are projections relying on proxy variables such as exports and taxation (annually published national income estimates were generally not published before 1960s).¹⁰ Thus, internationally comparable GDP per capita “data” for all African countries is only available for the period 1950 to 2006, but there are observations for the whole continent back to year 1.

9 For example: for Ghana by Szereszewski (1965), for Nyasaland and Rhodesia by Deane (1953), and for Nigeria by Okigbo (1962) and for Kenya by Bigsten (1986).

10 For a review of early national accounting in Africa, see Ady (1988) ‘Uses of national accounts in Africa’.

Table 1: African and world GDP per capita, 1 (C.E.) – 1950

	1	1000	1500	1600	1700	1820	1870	1900	1913	1940	1950
Total Africa	472	425	414	422	421	420	500	601	637	813	889
World	467	453	566	596	615	667	871	1,262	1,525	1,958	2,109

Source: Maddison (2009). All values in constant 1990 International Geary-Khamis dollars. Note that the only African countries for which Maddison has individual income estimates for in this period are Algeria, Egypt, Libya, Tunisia and Morocco.

The GDP per capita estimates in Table 1 assume that, on average, “Africa” was richer than other parts of the world in year 1. This is driven by estimations of a higher income in Egypt than elsewhere in the world. The data implies that “Africa” gradually fell behind the rest of the world due to stagnation in income per capita from year 1000 to 1820. Between 1820 and 1913 income per capita increased in “Africa”, but it was falling further behind the world on average as incomes increased more rapidly in other places. Between 1913 and 1950 “Africa” ceased falling behind the world average. In this period the average GDP per capita growth was 1 per cent. Population growth is estimated at 1 per cent, meaning that the economies in Africa were growing at an average 2 per cent in this period.

The general aggregate picture shown in Table 1 does not entirely mesh with what is known about export growth, state formation and accumulation in parts of Africa. There were large flows both of factors of production and commodities, both internally and externally, during the Atlantic Slave trade and the cash-crop revolution. Kingdoms rose and fell; colonial empires were established, railways and mines developed and yet the GDP per capita measure barely alters. It will be argued here that it is certain that well-documented growth in African markets for currency, labour and goods led to Smithian growth through specialization in some areas (Hopkins 1973). Moreover, the Atlantic trade brought with it not only exchange of commodities, but also new technology – for instance, the introduction of new cultigens – which must have led to increased total factor productivity (Austin 2008a, 588). In addition, the economic growth could not have occurred without significant investments in land improvement, planting of perennial crops and transport infrastructure. Finally, these growth episodes led to historically documented institutional changes such as the formation of markets in land and labour, the strengthening of states, and higher living standards.

This paper re-evaluates the history of economic fluctuations in Africa, and juxtaposes the static aggregate data against data from four cases of ‘boom and bust’. The first occurred in pre-colonial and colonial Dahomey centred on export booms in slaves and palm oil. The second case is the cocoa boom in the Gold Coast; the third the copper boom in Northern Rhodesia.¹¹ The fourth and final case is the diamond based growth in post-colonial Botswana. The last section of the paper considers recurring growth in Africa and evaluates the growth experience from 1995 to 2009 in comparison with the economic growth in the period from 1950 to 1975.

11 Contemporary Benin, Ghana and Zambia respectively.

II.1 Case 1: Slave Trade and Export Growth in Pre-Colonial and Colonial Dahomey

The experience of Dahomey, 1690–1950, could be considered typical for West and Central African coastal states, many of which became deeply integrated into the Atlantic economy during this time. According to Manning (1982), two million slaves were exported from the West African region through the Kingdom of Dahomey between 1640 and 1865. Like Asante and Oyo, Dahomey grew from a small state to a major kingdom during this period (Austin, 2008b, 1005). This pattern was not replicated throughout the region. Some states, like Benin and Kongo, chose to disengage from the slave trade. In other areas low political concentration prevailed (Klein 2001). The slave trade created millions of African victims, but it has become generally accepted that African agents, in the form of states or networks of merchants, engaged in this trade because they were able to realize sizable economic gains from it (Northrup 2002, 56). Europeans traders generally did not have the means to coerce African leaders to sell slaves (Thornton 1992). Nevertheless, many scholars have argued that the slave trade had long-lasting, negative economic effects. The direct effect of lost human resources and the persistence of low labour concentrations in sub-Saharan Africa figure prominently. Inikori (2007, 84) argues that “the transformation of the Gold Coast into a major exporter of captives to the Americas retarded the developing inter-regional specialization and the growing commercialization of agriculture”. It has further been suggested that the persistence of poverty in Africa was caused by the slave trade either through negative effects on state formation, or on social capital such as trust (Nunn 2008). The latter work tends to understate the economic motivations for states engaging in the slave trade, and has not explicitly dealt with the implications of short-term gain versus long-term effects (Austin 2008b).

Table 2: Income and growth, Benin 1800–1950

	Real National Income Growth	Per Capita Domestic Product (1913, GB pounds)
1800s–1840s	1.1	1.5
1840s–1860s	3.4	1.9
1860s–1890s	2.7	3.4
1890s–1910s	1.7	5.8
1910s–1930s	2.8	6.7
1930s–1950s	0.1	9.5

Source: Manning (1982). The data for national income growth are proxied by import purchasing power, and the per capita income is estimated by assuming that the per capita export revenue multiplied by seven equals per capita domestic product. We should not accept these data as “facts”, but they are an indication of the rate of change, and of the economic resources at the state’s disposal. By comparison, according to the Governor of Southern Rhodesia, the per capita purchasing power in Jamaica and Zimbabwe in 1933 was 30 and 70 shillings respectively (Bowden et al. 2008, 1054).

The data reproduced in Table 2 span from the end of the slave trade into the period of “legitimate commerce”. A central thesis, suggested by Hopkins (1973, chapter 4), is that the closing of the Atlantic slave trade market meant stagnation and loss of power for centralized states as fiscal capacity disappeared; this is referred to as the ‘crisis of adaptation’. It did not always mean the end of slavery as a mode of production, as documented by Lovejoy and Hogendorn (1993, 1): “At the time of the colonial conquest (1897–1903), the Sokoto Caliphate had a huge slave population, certainly in excess of 1 million and perhaps more than 2.5 million people”. Furthermore, in some areas such as Dahomey, the ban of the slave trade actually led to an intensification of trade in slaves in the middle of the 19th century (Flint and McDougall 1987).

Manning’s estimates (Table 2) provide a suggestive quantitative study of effects of the slave trade in Dahomey. It is estimated that, during the height of the slave trade, the per capita export revenue in Dahomey was comparable to that of Great Britain (Manning 1982, 3). This probably led to a rapid increase of GDP per capita, while total GDP might have declined because of the loss of human resources. In the longer run, this kind of economic growth was not sustainable (Manning 1982, 4). The economic specialization in slave trading suggests that, from the point of view of the states, the return on slave exports was superior to the return on labour in domestic production (Manning 1982, 12). The profitable slave business thus facilitated the growth of stronger states. Imports of money and other commodities further spurred exchange and growth in the domestic economy for some actors. When the slave trade ended in the 19th century, this undermined the fiscal basis of Dahomey and other West African states (Austin 2008b, 1005).

The end of the slave trade opened up new economic opportunities. It paved the way for what has been called the period of ‘legitimate commerce’ and what is also referred to as the ‘cash-crop revolution’ in sub-Saharan Africa (Law 1995). This was driven largely by peasant producers, although some crops were produced on plantations. Some of these were worked by slaves like those involved in palm production in the Sokoto Caliphate. The cocoa boom, in contrast, involved African peasants, or capitalists as Hill (1970) calls them. The growth in Dahomey recorded in Table 2 was underpinned by palm oil and palm kernel exports. The growth rates are proxies and should not be interpreted literally, but testify to a rapid export growth that further facilitated growth in the domestic economy. Less is known regarding the effect and the relative importance of the local economy (Cooper 1993, 91–92). Helleiner (1966, 7), in his study of the Nigerian economy, reasoned that the export economy only accounted for 15 per cent of the total economy in 1900. For 19th century West Africa, Flint and McDougall (1987, 398) suggested that as much as 90 per cent of all production remained outside the cash-based coastal economies. If we take Manning’s data seriously, this would mean a tripling in GDP per capita during a half a century of export-based growth. According to Manning (1982, 17), the French colonial rulers taxed the exports, but the impact of the colonial authorities on economic organization was modest. There was some fiscal drain of the export revenues (estimated at 3 per cent of domestic product), but it was the Depression and the Second World War that finally undermined economic growth, and Benin has yet to experience sustained growth again, apart from a very short period in the 1980s.

Table 3: Gold Coast GDP, 1911 constant prices (GB pounds)

	1891	1901	1911
Export Production	872	740	3,612
Private Consumption of Imported Goods	1,595	2,741	4,310
Consumption of Government and Public Services	150	490	635
Gross Capital Formation			
a) buildings and construction	98	837	800
b) equipment	56	287	490
c) cocoa	4	169	1,573
d) net accumulation of species	73	257	560
e) changes in stocks of imported goods	8	17	-3
Traditional Consumption	9,200	10,000	11,100
Imports of Goods and Non-Factor Services			
a) imports of merchandise and non-factor services	-835	-1,870	-3,050
b) net imports of specie	-73	-257	-560
Total (A): including Traditional consumption	11,148	13,411	19,467
Total (B): excluding Traditional consumption	1,948	3,411	8,367
Per capita in GB pounds, Total A	6.8	7.5	9.7
Per capital in GB pounds, Total B	1.2	1.9	4.2

Source: Szereszewski (1965)

The example of growth from pre-colonial and colonial Dahomey, with export booms first in slaves and then in palm oil and kernels, shows that the external market can function as a ‘vent for surplus’ (Myint 1958). However, it was not simply a reallocation of previously idle resources, labour and land (Smith 1976; Tosh 1980). The case further shows that reliance on external export markets cannot be sustained indefinitely. The end of the slave trade led to a crisis for African states, but created an opportunity for African peasants. How that opportunity was seized and how it contributed to growth and development is best examined in the case of cocoa in Ghana.

II.2 Case 2: Cocoa Production and Export Growth in colonial Ghana

The cocoa boom originated in the Gold Coast colony, and then spread to areas such as the Ivory Coast and Nigeria. In all these areas peasants responded to the earning potential arising from an external market demand for this new cash crop. In his study of the Ghanaian economy from the end of the slave trade until independence Austin (2005, 432) writes that “much of the rise in rural output should be attributed to higher productivity” and that the expansion of production also no doubt “involved a vast increase in the quantities of resources employed within the rural economy”. This

increase in production of cocoa was only made possible by a vast increase "in the stock of capital in the form of cocoa trees" (Austin 2005, 432). So in pre-colonial (Asante) and colonial (Gold Coast) Ghana there was both intensive and extensive growth, based first on the production for export of kola nuts, gold, timber and rubber ("legitimate commerce") and then, from the very end of the 19th century, on cocoa production (the 'cash-crop revolution').

Szereszewski's estimates (Table 3) indicate a period of rapid growth. If the assumed stagnation in traditional consumption is not taken into account, GDP per capita more than tripled over two decades, implying a very high growth in the export economy and implying a 6.5 per cent per capita growth over the period.

This rapid expansion did facilitate the improvement in living standards and diets. Moradi et al. have associated this growth with marked increases in the mean height of the Ghanaian population born in this period, indicating that the cash-crop growth did result in widespread development in Ghana during the colonial period (2007).¹² This cocoa boom and the economic growth in the countries dependent on this crop eventually petered out. In Ghana the end of growth came prematurely due to the perverse taxation of cocoa producing peasants during the 1960s (some of it indirect by allowing the Ghanaian Cedi to become grossly overvalued). Growth continued in neighbouring Ivory Coast until the late 1970s, when depressed world market prices led to stagnation and decline. As pointed out by Hopkins (1973, 218–219; also Austin 2010), the Ivory Coast had a slow start due to discriminatory French colonial agricultural policies, and then grew quickly when the state suddenly became favourably disposed to cocoa production after independence.

Growth was rapid and sustained over a long period. Although production largely took place in spite of the state, it enabled colonial and post-colonial states to increase their expenditures. While, according to most indicators, the increase in financial and other resources caused widespread development, it also spurred positive institutional change, such as the development of markets in capital, land and credit. In Ghana, it would be fair to say that growth was cut short by the rent-seeking propensity of the post-colonial state, but it should also be remembered that the limits of the external market eventually caught up with Ivory Coast in the late 1970s.

II.3 Case 3: Copper Boom and Mining Growth in Colonial and Post Colonial Zambia

Copper had been produced for at least a millennium in what was Northern Rhodesia, but until the late 1920s the country's development was described as "fitful and speculative" (Butler 2007, 13). The British South African Company, which controlled the territory since 1890, was not originally optimistic about copper mining, mainly because of concerns about high transport costs. In the 1920s, Northern Rhodesia became a British colony and the prospects for growth changed. Growth in international electricity and

12 Using similar evidence and methods, Moradi (2009) finds the same for colonial Kenya.

automobile industries radically altered the demand and consequently the price for copper in the world market; high transport costs now posed less of a problem. The Northern Rhodesian copper industry consisted of two major mining groups: Rhodesian Anglo American (RAA) and Rhodesian Selection Trust (RST), the former controlled mainly by South African and the latter by North American capital. Large scale copper production in Northern Rhodesia coincided with the onset of the Depression and the price for copper, which earlier had been upheld by a producers' cartel, fell sharply from 1929. Production re-started in the 1930s as demand for copper revived (Roberts 1982, 351).

According to Roberts (1982, 347), the copper mines of Northern Rhodesia "represent a particularly striking example of the 'leakage' of wealth from an African colony". After the Second World War, Southern Rhodesian politicians lobbied to unite Southern and Northern Rhodesia with Nyasaland in a single, central African State, appealing particularly on behalf of the large copper companies and arguing that economies of scale would benefit the industry, particularly in energy provision (Gann 1986, 384). The Federation was formed in 1953 and, according to Hall (1969, 61), "the Copper belt was the milk cow and Northern Rhodesia suffered a net loss in the years 1953–64 of nearly £ 100 million – the bulk of which was used to develop Southern Rhodesia and the rest to prop up Nyasaland".¹³ Production, sales and investment in the copper industry increased rapidly in the post-World War II period, benefiting from high prices and a devaluation of the pound. But as Murray (1965, 23), a former commissioner for Zambia, noted, the federation diverted "money which we could well have invested within our own borders". Supporting this point, a commission reporting for the colonial office in 1938 noted that "social services are very backward", but that this "would not be the case if it received a larger proportion of the proceeds of the country's only really important industry, the mining industry" (CO 145 1938, 347).

Certainly, political independence in Zambia "soon led to a marked reduction in the leakage of copper profits abroad", but the process of controlling the revenue was not straightforward (Roberts 1982). The first step was the introduction of an export tax in 1966, instead of the previous royalty system. In 1969 the government took a 51 per cent ownership in the mines. In return for equity the companies were given dollar denominated bonds with 8 to 12 year maturities. In 1973 the second and decisive move was taken, when the Zambian government borrowed from international lenders and redeemed the bonds (Stoeber 1985). These moves were not resisted by the foreign mining companies". According to H. F. Oppenheimer, one of the great South African mining magnates, the new arrangements provided the companies with liquid funds derived from compensation payments that enabled the corporations to broaden their field of operations elsewhere" (Gann 1986, 186–187).

In 1971 (57), e: "For the future one can only look to the planned increases in copper production, the promising trend in imports, the large reserves, and keep one's fingers crossed, as ever, concerning the copper price". In retrospect, the timing of the Zambian government's acquisition of the mines was very poor; "by 1974 copper (the source of some 98 per cent of all Zambia's export earnings) had drastically decreased

13 Roberts (1982, 354), puts it at 97 million pounds.

in value; inflation had caused costs to spiral, and the two great state owned mining concerns were operating at a loss” (Gann 1986, 186). At the time, Shaw (1976, 7) noted that the ability of the ruling class to maintain political order in Zambia was related to the production and price of copper, and argued that Zambia was one of the “most dependent economies when measured along the contribution of a single dominant industry”.

The data on copper production in Figure 1 tells a story of rapid growth from the 1930s into the 1970s, followed by a long period of decline. Deaton (1999), in his study of commodity prices, shows that copper prices remained low throughout the 1970s and 1980s, with an improvement in the 1990s when production also started to recover. The Central African Statistical Office in Southern Rhodesia published national account statistics in the *Monthly Digest of Statistics* from 1945 onwards (Table 4). It gives further support to what the copper statistics already indicate. In current prices, the value of domestic production increased more than 9 times, averaging an annual growth of 29 per cent. Expressed in constant prices, using a pound deflator, this represents faster growth than the average of 20 per cent GDP growth in the decade from 1945 to 1955 – far faster than the ‘growth miracle’ recorded in post-colonial Botswana (Officer 2008).

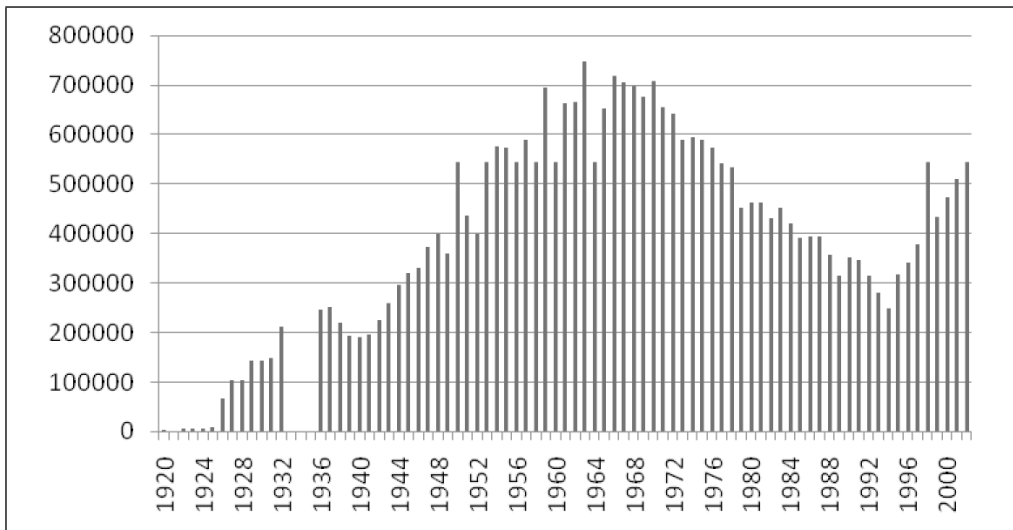


Figure 1: Copper production in Northern Rhodesia (tonnes), 1920–2006

Sources: 1920–1938, Blue Book (Rhodesia), 1941–1945, Economic Statistical Bulletin (1952) and 1946–2008, International Copper Study Group (supplied data on request).

Table 4: National income at factor cost, Northern Rhodesia 1945–1962, £ million

1945	1946	1947	1948	1949	1950	1951	1952	1953
15.4	18.1	27.8	34	43.9	58.5	85.9	96.8	112.2
1954	1955	1956	1957	1958	1959	1960	1961	1962
150.5	177.4	195.6	161.2	144.7	201.6	218.5	200.9	198.2

Source: Central Statistical Office, *Monthly Digest of Statistics* (1951, 1962 and 1964)

In Zambia, economic growth accelerated and decelerated in accordance with external market opportunities. Because of the colonial political economy, during the mining boom the mineral rents were only partly invested in the Zambian economy. In the decade after independence, while world market prices were high and rents from the mines available, domestic investments were made in industrial diversification, infrastructure and human capital. Most of these investments had to be reversed in the 1970s, 1980s and 1990s, when the copper market was depressed (Bates and Collier 1995). The prolonged crisis led to severe indebtedness, predatory rent-seeking and considerable political unrest, but never a violent contest for the state.

II.4 Case 4: Diamond-Led Growth in Botswana, 1973–2009

Botswana has received considerable attention because of its rapid economic growth in the post-colonial period. Indeed, its growth rate, by some measures, has surpassed that of any country in the world since the 1960s (see Jerven 2010c for a discussion of the rate of growth in Botswana). The country has figured widely as the exceptional African growth success story, in marked contrast to the “African growth tragedy” (Easterly and Levine 1997).¹⁴ In the literature on African growth, Botswana is frequently cited as the ‘exception that proves the rule’ by scholars who argue that African economies are capable of rapid economic growth as long as the institutional framework and development policies are right (Ndulu et al. 2008). Botswana has confirmed that African economies can perform well, despite the potential of being caught in various “development traps”, such as the natural resource trap or its landlocked position. Botswana’s citizens have decisively escaped membership in what Collier (2007, 50) calls the “bottom billion” thanks to a few decades of rapid growth. In the growth literature, “there is almost complete consensus that Botswana achieved rapid growth because it managed to adopt good policies” (Acemoglu et al. 2003).

The De Beers Botswana Mining Company (Debswana) was established in 1969 in order to develop the Orapa diamond mine, at the time the second largest kimberlitic pipe in the world.¹⁵ In 1975 a second pipe was discovered at Orapa. According to Jefferis, De Beers recovered its original investment in Orapa within less than two years. In 1977 the largest diamond discovery came at Jwaneng and development of the mining complex cost over USD250 million, including the infrastructure of the new town. Production commenced in 1982 (Jefferis 1987, 301). The original 1970 agreement between Debswana and the government provided a royalty based on production levels, taxation on profits and a free 15 per cent equity share for the government. “Full details of the new agreement have never been disclosed, but it is reputed to be one of the best mineral exploitation contracts in the world” from Botswana’s perspective (Jefferis 1998, 304).

14 The phrase ‘an African miracle’ was first attributed to Botswana by Samatar and has been much quoted since (1999).

15 Second only to the Williamson pipe in Tanzania.

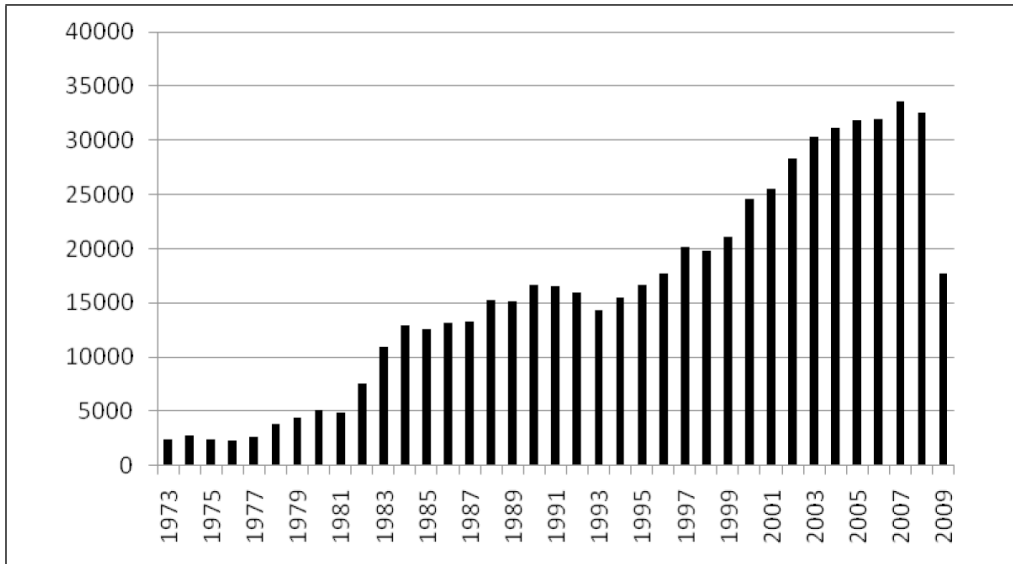


Figure 2: Botswana, diamond production (000 carats), 1973–2009

Sources: 1973–1998, Botswana, *Statistical Bulletin* (1982, 1985, 1993, 1999), 1998–2003, Botswana, *Statistical Yearbook* (2003) and after 2003 data supplied from Central Statistical Office, Botswana.

De Beers runs the Central Selling Organisation (CSO) marketing cartel, which controls about 80 per cent of the world's supply of rough diamonds. This means that, as a commodity, the price level of diamonds is relatively stable, and the selling price is much higher than the production cost (owing to monopoly profits). The CSO has been able to control supply through a buffer stock arrangement that has been judged to be “by far the world's most successful commodity buffer stock arrangement” (Jefferis 1998, 307). The CSO represents a durable producer cartel, exactly what primary producers have strived to achieve, but have never succeeded in establishing on a permanent basis.

By the mid-1990s Botswana had become the largest diamond producer in the world, giving it a significant power when bargaining royalty contracts (Jefferis 1998, 306). In tune with diamond output, growth has stagnated in Botswana since the mid 1990s. As a response to failing demand, connected with the global recession, the diamond mines shut down operations in the summer of 2009 (Cramer et al. 2009). As is shown in Figure 2, output in 2009 was almost halved as a result of the midyear shut-down.

Botswana is a very good example of how vantage point influences the contemporary judgement of economists (Jerven 2009b). Acemoglu and Robinson argue that “economic incentives in Africa were terrible” and that “only Botswana escaped this general pattern” (2010, 23). First of all, this is an inaccurate generalization. Second, as Jerven (2010c) shows, economic growth outside the diamond sector was slower than what has generally been thought, indicating that the incentives were less favourable and/or less important than generally thought. Elsewhere in their paper a comparison is made with Sierra Leone, supposedly to illustrate that diamond wealth in the context of poor institutions does not lead to economic growth (Acemoglu and Robinson 2010).

The authors fail to note the crucial difference between the two countries. In Sierra Leone diamond deposits are alluvial, while in Botswana they are non-alluvial. It practice this means that, in Sierre Leone, individuals without capital can sift for diamonds, while in Botswana diamond production requires the financial backing of a company such as DeBeers (Jerven 2010c). Furthermore, as noted by Poteete (2009: 555–556) the rosy interpretation of Botswana’s pre-colonial institutions by Acemoglu et al. does not stand up to scrutiny, and she concludes that “the openness and stability of Botswana’s political system was in no way foreordained”.

While Botswana is well known as the ‘African growth miracle’, the previous three cases show that rapid growth over a period of two or three decades is not as exceptional in an African context as commonly assumed. The current events in Botswana’s diamond industry are raising the possibility of regression in that country. It has been pointed out that one of the sources of political stability and democracy in Botswana is the availability of mineral rents (Jerven 2010c, and Acemoglu et al. 2003). These rents have been invested in infrastructure and human capital, but the economy remains undiversified and heavily dependent on import; thus its future growth depends on the demand for diamonds. Some scholars have further questioned the Botswana development miracle, pointing to the increased inequalities in income and the limited gains outside of accrued diamond earnings (Good 2008, and Hillbom 2008).

Booms and busts in African economic history leave lasting effects. Growth in the pre-colonial period, based on the slave trade, was definitely unsustainable in the long term – but the rents from this growth were captured by elites and in some cases facilitated the temporary strengthening of states and their fiscal capacity. Conversely, although the end of the Atlantic slave trade in the 19th century weakened those states dependent on the trade, it induced another period of growth based on agricultural production.

The growth of export crop production in the 19th century did entail large improvements in GDP per capita which were enjoyed by the peasant population, sometimes directly. The opportunity to capture rents from this growth in exports was eventually seized by the colonial state through the formation of marketing boards. These revenues facilitated the emergence of the developmental state in the late colonial period, until structural adjustment put an end to it. In many cases, states engaged in predatory rent-seeking, letting producer prices drop to a small fraction of world market prices. Inflation and overvalued currencies contributed strongly to this trend. In some states, elites did not favour heavy taxation of export crops. Nevertheless, both regimes favouring crop production and those biased against it failed, and both types underwent structural adjustment in the 1980s.

The mining booms in Botswana and Zambia testify to the power of external markets to spur rapid increases in GDP per capita, which led to qualitative changes in these economies also. Both countries experienced urbanization and increases in formal employment. The vulnerability associated with mining dependence is well illustrated by the case of Zambia. The infrastructural investment and human capital investments ceased, and the initial improvements eventually reversed in the 1970s, 1980s and 1990s when copper prices remained low. During colonial rule the Northern Rhodesian state received only a limited share of copper revenues. After Zambia gained independence,

the imperative became to secure access to these revenues. However, the copper revenue soon dwindled as copper prices fell and remained low from the 1970s through the 1990s.

Botswana experienced a period of uninterrupted per capita growth and, although this was associated with high income inequality, development was manifested particularly in the advances made in education. Botswana also exemplifies stable democratic rule in Africa. The availability of economic rents was central to this peace and stability. Botswana's reputation of "good governance" derives from the fact that these rents were not squandered. Public investments were increasingly made in the 1980s and 1990s, but Botswana's economy remains diamond dependent and has not diversified.

Easterlin (1996, 1) characterizes "modern economic growth" as an increase in living standards and a process that has upset the balance of political power. Recurring growth in Africa has not led to the same levels of living standards as currently enjoyed in most "Western economies", but the growth episodes reviewed here have been associated with marked increases in living standards. The case studies of Dahomey, the Gold Coast, Northern Rhodesia and Botswana further demonstrate that these economic growth episodes spurred political and institutional change. Even if growth was temporal, and not indefinitely sustained, it would be a mistake to interpret African economic history as if modern economic growth had not touched the African continent at all.

III

What can we learn from African growth episodes between 1950 and today? Different methods have been used to identify and define periods of sustained growth or growth accelerations (Berthelemy and Soderling 2001; Hausman et al. 2005). In this exercise growth is classified as "sustained" if the 9 year moving averages of GDP per capita growth are 3 per cent or higher, which is quite a strict criterion, comparatively.¹⁶

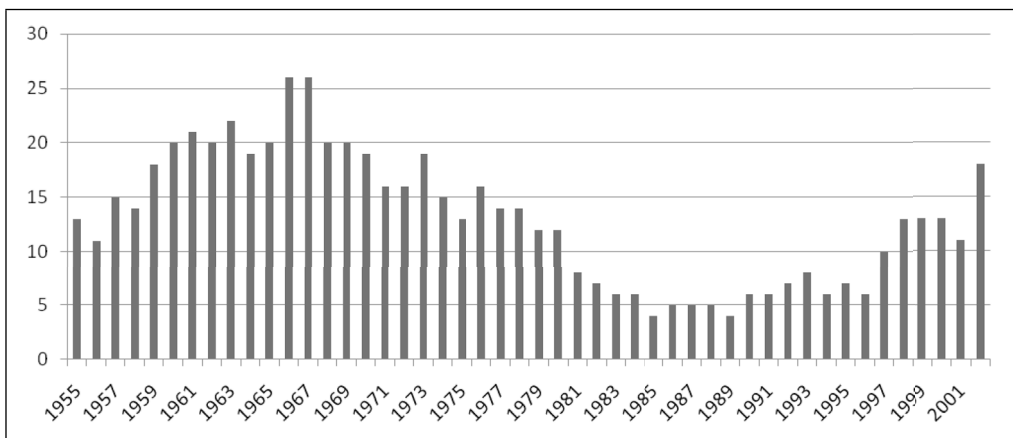


Figure 3: Number of African countries experiencing sustained growth 1950–2006

Source: Maddison (2009).

16 The average annual GDP per capita growth in the world over this period was 2 per cent (Maddison 2009).

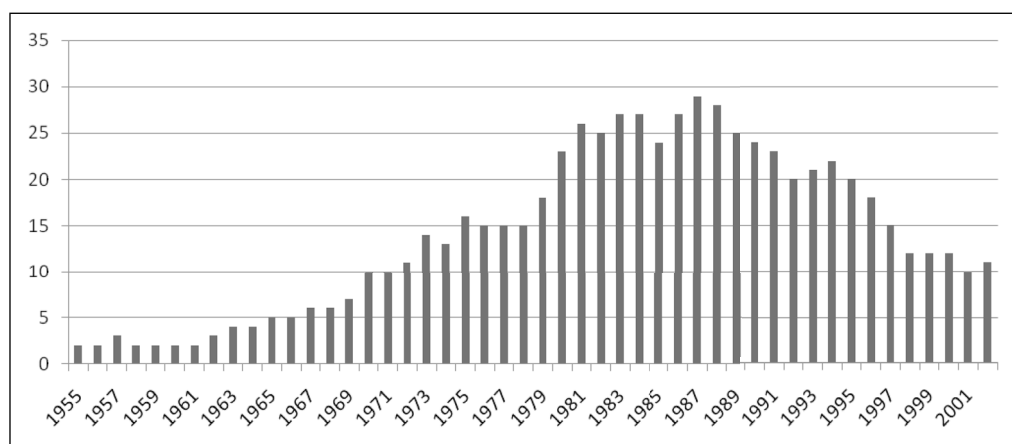


Figure 4: Number of African countries experiencing sustained growth failure

To some extent the findings here can be conditioned by the use of the Maddison dataset as compared with using World Development Indicators or Penn World Tables. Ideally, one should have used the primary source – the official national account files – but these are not yet available. A study of the quality of the post-colonial growth evidence found that most of the errors in the data are eliminated if one averages growth over periods longer than 5 years, and that there were fewer erroneous growth fluctuations in the Maddison dataset as compared with the Penn World Tables and the World Development Indicators (Jerven 2010b). The full list of countries and the observations of sustained growth by country is given in the appendix. Of course, when 9 year moving averages are calculated, the data set only covers 1955 to 2002.

The interpretation of Figure 3 is straightforward. Many countries experienced high growth towards the end of the colonial period. When most African economies regained their independence, the prevalence of sustained growth in Africa increased. In 1967 to 1968, half of Africa's economies were in the middle of a decade of sustained rapid growth. This trend (that is, of more countries joining a path of growth) was reversed at the beginning of the 1970s. Following the second oil shock of 1979, only a handful of countries were able to achieve sustained growth during the subsequent decade. There was a slight improvement in the 1990s. Since 1998, a quarter of African economies have experienced sustained growth.

Between 1985 and 1989 among the few countries that experienced sustained growth were Mauritius and Botswana, which are widely recognized as African 'growth miracles'. Less recognized in the literature are Cape Verde, Equatorial Guinea, Lesotho and the Seychelles, but given their past growth and current relative position in terms of GDP per capita, they deserve the same kind of attention given to Mauritius and Botswana (Jerven 2010). Liberia and Chad also experienced a 4 year period of sustained growth in the late 1980s.

The phenomenon of failed growth has received far more attention in the economic literature on African development. Here sustained growth failure is defined as occurring when the 9 year moving average of real GDP per capita growth is less than zero

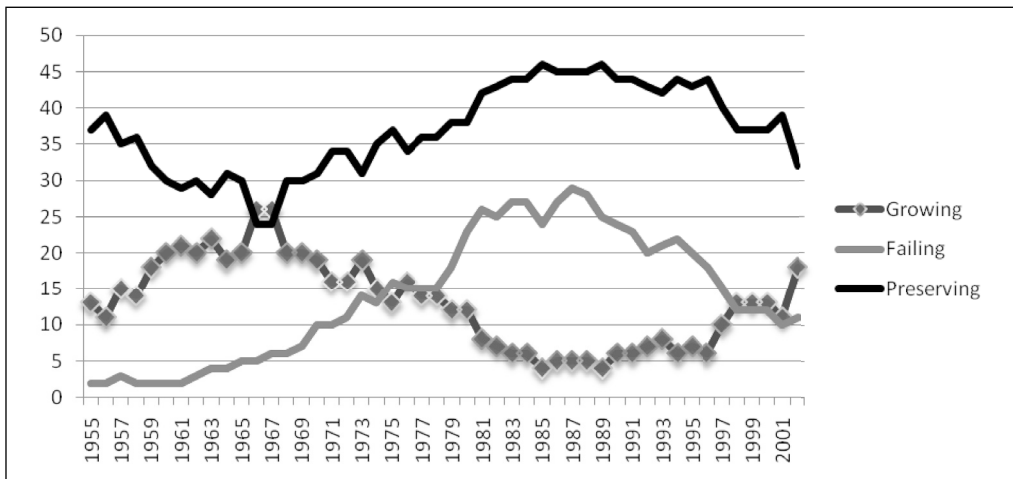


Figure 5: Growing, failing and preserving African economies, 1950–2006

per cent. Figure 4 shows the occurrence of growth failure in Africa each year between 1955 and 2002. Until the 1980s, a sustained growth failure was the exception in Africa. Between the 1950 and 1960s only Benin, Tanzania and Morocco experienced sustained periods of stagnation and negative growth. In the 1960s Chad and the Central African Republic were also stagnating, and this group of poor performers (Tanzania and Morocco improved their performance) was joined by Senegal, Niger and Somalia in the late 1960s and the early 1970s. A sudden spike in the list of poor performers occurred in the late 1970s. Thereafter, in the 1980s and early 1990s, the failure of growth became the rule rather than the exception. It is in the immediate aftermath of this particular period that the seminal growth literature, which focused on “Africa’s growth tragedy” or “slow growth in Africa”, emerged (Sachs and Warner, 1997 and Easterly and Levine, 1997). It could thus be argued that, in trying to solve the particular puzzle of a lack of economic growth in Africa, the first generation growth literature was a child of its time (Jerven 2009a), and that contemporary literature on African growth is still heavily influenced by this vantage point.

Figure 5 fills in the missing part of the picture painted in the previous figures. While some economies were growing and others were failing, a number of economies were growing in a modest fashion and making progress, albeit slowly. This also supports the idea that economic growth and development was widespread in the 1950s, 1960s and 1970s, when growth failure was the exception. It further shows that, after Structural Adjustment, growth became the exception rather than the rule. Finally, it is evident that the recent African growth episode has been less widespread than the booms of the earlier period.

IV

The global economic downturn in the 1980s hit Africa harder than other continents. A combination of the depressed demand in external markets and elites turning to predatory

rent-seeking ensured that growth failed in the majority of African economies between 1975 and 1995. It is now widely recognized that the economic downturn also led to political disorder and state failure (Bates 2008). The economic literature on civil war and conflict has recognized that both low income and economic shocks are correlated – therefore possibly causing, or at least increasing the probability of, civil war and conflict (Miguel and Blattman 2009).

Do the developments taking place since the 2009 recession suggest a similar failure? There is reason to hope that this crisis might be less deep and prolonged, because the majority of African states are now pursuing orthodox market policies. There are fewer opportunities for predatory rent-seeking. It is not yet clear whether African economies will be in position to soften the downturn for large parts of the population. The period of economic contraction in the 1980s was met by fiscal austerity as prescribed in structural adjustment policy programmes. In strict contradiction to previous austerity reforms, the IMF suggested the use of counter-cyclical fiscal policy to “weather the storm” following this recession (IMF 2009). The first thing that suffers in an externally induced economic crisis in export-oriented economies is fiscal capacity. A recurring theme has been the state’s vulnerability to economic shocks. Rather than being counter-cyclical, fiscal policy and state intervention have expanded during periods of economic growth. To engage in fiscal expansive policies this time, African states would have to depend on external funds.

The vantage point is always important, and the current slowdown puts recent publications, such as *Africa at a turning point?* (Go and Page 2008) and *Africa’s turn?* (Miguel 2009) in a less favourable light. The authors of these publications suggested that Africa might be about to embark on its long-awaited sustained growth path. Collier, writing when conditions looked rosier for African economies, suggested that one source of growth was that Africa was “learning from mistakes” (in Miguel 2009, 111). What lessons should be taken from the current slowdown? The most recent period of economic growth did not entail significant improvements in human development that were the case from 1950 to 1975 (Sender 1999). Furthermore, the latest period of economic growth has not been associated with much industrial growth. The former (lack of human development) may indicate that the growth has not “trickled down”, while the latter (lack of industrial growth) indicates that we will not see the crisis resulting in deindustrialisation, although some investments in mineral extraction are now being recalled (Cramer et al. 2009). It is also evident that only economies that have enjoyed a comparative advantage in natural resources have really experienced growth in this period; and growth was more widespread and on a broader economic basis in agriculture and manufacturing. The recent period of growth was not matched by an expansion of the state. The fiscal capacity of the state has not been used to diversify away from exports. Instead, specialisation has intensified as most states accepted their comparative advantage in natural resource exports.

The basis of recurring growth in African has always been strong external demand. Growth has not been “triumphant” and the end of growth periods has ended with a combination of predatory rent-seeking and depressed external markets. The recent boom was one-sided, based on external market demand for natural resources. The good

news is that the boom was associated with orthodox macroeconomic management. Most African economies met the 2009 recession with a smaller debt burden, and with a smaller propensity for rent-seeking than in the past. The bad news is that African economies are as dependent on external forces as ever. Economic growth will not return until external demand revives. It has been suggested that fiscal policy might lighten the recession domestically in Africa, but the fiscal basis of African states does not allow this without recourse to external financing. History will be repeating itself. When the world market demand returns and natural resource rents are again available, growth will return. The dependency of African economies on export volumes and prices makes their development path one of recurring growth and recession.

This paper has faced a limitation that all similar efforts must face: a severe paucity of data on the period before 1960. We lack basic data on population, yields, and prices, both for consumers and for those supplying factor markets. Without such data, we cannot estimate total factor productivity and thereby secure reliable measures of growth, much less insight into its decomposition. Such analysis is available for the post-independence period, for instance in the study undertaken by Ndulu et al. (2008). It has been pointed out that this presumed availability of reliable macro data for the post-colonial data is often misleading (Jerven 2010b). Data on the post-colonial period are less reliable than is commonly thought and, conversely, we know more about colonial and pre-colonial economic changes than what is commonly assumed. A mix of qualitative accounts and careful use of the data that are available gives substance to the analysis of growth episodes in this paper. In terms of quantitative data, there has been a focus on factors on the demand side, but analyses of the supply side are just as important.

This paper has emphasised the fact that the search for a root cause of African underdevelopment is futile, and that such a search is based on asking the wrong question. There is a crucial difference between approaching the conundrum of African growth by asking why there has been a chronic growth failure and asking why African economies have sometimes grown and then regressed. There have been periods of rapid economic change and accumulation which, in turn, resulted in important qualitative changes in how societies and economies were organised. It seems that the study of growth as a recurring process is central to understanding the prospects for sustained growth in sub-Saharan Africa. While we know how these periods of growth are related to world economic patterns, initial research on how these patterns change economic power and structure within African economies points to key, yet relatively understudied, questions that demand answers. The growth episodes in this study were rooted in trade and the world economy, but this growth was only possible owing to a reorganisation of factors of production, a combination of investment and technological growth that had political-economic consequences. There is therefore nothing inherently failed or dysfunctional about African markets, states or geography that inhibits economic growth. What needs further detailed study is what happens to African markets and states during the process of growth as well as during decline.

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APPENDIX

Years of “sustained growth” in African economies since state independence

	Years of “Sustained Growth”	Before 1975	1975–1994	After 1995	Longest Uninterrupted Period
Algeria	24	16	7	1	1966–1981
Angola	15	10	–	5	1959–1967
Benin	2	–	2	–	1980–1981
Botswana	23	12	18	5	1963–1992
Burkina Faso	7	6	1	–	1955–1958
Burundi	10	9	1	–	1966–1974
Cameroon	8	–	8	–	1977–1984
Cape Verde	20	–	12	8	1977–1987
Central African Republic	–	–	–	–	–
Chad	7	–	4	3	1984–1987
Comoro Islands	10	10	–	–	1958–1967
Congo ‘Brazzaville’	13	5	8	–	1976–1983

Côte d'Ivoire	9	9	–	–	1959–1967
Djibouti	1	1	–	–	1969
Egypt	21	7	10	4	1972–1984
Equatorial Guinea	32	13	11	8	1955–1967
Eritrea and Ethiopia	10	9	–	1	1959–1967
Gabon	22	20	2	–	1955–1976
Gambia	11	10	1	–	1961–1965
Ghana	2	1	–	1	1957
Guinea	3	3	–	–	1957–1958
Guinea Bissau	17	17	–	–	1955–1971
Kenya	5	5	–	–	1966–1970
Lesotho	29	15	12	2	1969–1980
Liberia	7	3	4	–	1990–1993
Libya	15	15	–	–	1955–1969
Madagascar	–	–	–	–	–
Malawi	10	8	2	–	1967–1976
Mali	10	1	3	6	1997–2002
Mauritania	15	14	–	1	1955–1968
Mauritius	35	10	17	8	1983–2002
Morocco	13	5	6	2	1970–1980
Mozambique	12	6	–	6	1997–2002
Namibia	9	9	–	–	1958–1966
Niger	5	5	–	–	1958–1962
Nigeria	9	9	–	–	1966–1974
Rwanda	16	6	6	4	1969–1974
São Tomé and Príncipe	11	11	–	–	1958–1968
Senegal	–	–	–	–	–
Seychelles	20	7	12	1	1986–1995
Sierra Leone	6	5	–	1	1965–1967
Somalia	2	2	–	–	1973–1974
South Africa	4	4	–	–	1963–1967
Sudan	11	2	1	8	1995–2002
Swaziland	20	20	–	–	1956–1974
Tanzania	2	1	–	1	1966
Togo	10	10	–	–	1960–1969
Tunisia	32	16	8	8	1959–1980
Uganda	11	2	3	6	1992–2000
Zaire (Congo Kinshasa)	1	1	–	–	1955

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Zambia	8	8	-	-	1960–1963
Zimbabwe	11	11	-	-	1966–1973

Source: Maddison 2009.