Why no Chinese Miracle in Africa?
Special Economic Zones and Liberalization Avalanches

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Abstract

Special economic zones (SEZs) have been touted as “tools for development”, and yet their results have often been disappointing. We explain how SEZs can be used to reform a country from a system dominated by rent-seeking to a liberalized economy, where officials derive their revenues from taxation rather than rent-seeking. We provide a model of elite dynamics to explain the conditions under which governments can create SEZs that promote country-wide development. Our model predicts that SEZs may only lead to country-wide development in fiscally decentralized countries with heterogeneous elites. SEZs allow areas of a country to liberalize further than the standard theory of federalism suggests. An elite minority in favor of liberalization can therefore introduce SEZs that have external liberalizing effects on other regions in the country. This in turn incentivizes more elite members to promote liberalization. Comparing the SEZ programs in China and Ghana illustrate how seemingly similar SEZ programs can have very different results.

Keywords: Special Economic Zones, Political Economy, Public Choice, Rent-Seeking, Economic Reform.

JEL codes: B52, O19, O24, O43, P26, P52
1 Introduction

Despite the importance of open markets for economic development, political elites in developing countries rarely have an incentive to reform the system (Acemoglu & Robinson, 2000; 2012, ch. 8; Haber, 2002; Kang, 2002; Rose-Ackerman, 2006; Nye 2009; Brollo et al., 2013). Public officials benefit from anticompetitive and market-distorting policies, as market actors rent-seek in the attempt to win politically granted privileges (Buchanan, Tullock and Tollison, 1980; Tullock, 1967; 2005; Mitchell, 2012). The political elites preserve the system because their gains from rent-seeking are larger than the gains from taxing an open and richer economy (Nye, 2009, p. 54). Rent-seeking is particularly pervasive in authoritarian regimes, but it is highly present in advanced democracies as well (Glaeser and Shleifer, 2005). In addition, although authoritarian political elites have some incentive to promote growth (McGuire and Olson, 1996; Holcombe and Boudreaux, 2013), this growth may not come to pass because they cannot credibly commit to preserve a pro-growth property rights system (Leeson, 2011). The interest of elites is thus biased towards stifling open markets. One of the big questions in development economics is therefore how countries ever liberalize (Frye and Shleifer, 1997; Blanchard and Shleifer, 2001; Acemoglu and Robinson 2012, ch. 3 and 11).

Explanations of economic liberalization of rent-seeking regimes often take one of four forms: (1) Elites are taken by surprise by developments generated by creative destruction, and the political balance of power is altered in the direction of a more inclusive system (North and Weignast, 1989; Acemoglu, Robinson and Johnson 2005). (2) Due to the phenomenon of "private truths, public lies" (Kuran, 1995), elites are taken by surprise by social movements that ferment under their radar and unexpectedly turn into revolutions (Kuran, 1989; Tilly, 1993; 2003; McAdam, Tarrow and Tilly, 2001; Tilly and Wood, 2009).¹ The revolutions must then demolish old power structures for the reforms to be sustainable (Murrell, 1993, p. 129; Boettke, 1993; 2001, ch. 9-13; Åslund, 1999). (3) Elites are bought off. They are essentially paid a large present benefit in exchange for giving up their long-term privileges (Wintrobe, 1990). Examples are the abolition of slavery in Britain and various peaceful transitions that involve some form of “reconciliation” (Boettke and Coyne, 2007). (4) Quasi-benevolent and resourceful dictators enter the stage. Examples include South Korea in the 1960s (Haggard et al., 1990, p. 26), Taiwan, and China, where “growth was not blocked by authoritarian rule, and may perhaps have been accelerated by it, as the governments invested heavily in education, infrastructure, and technological upgrading” (Sachs, 2012).

We explore an important fifth path to liberalization that relies on the usage of special economic zones (SEZs). We develop a model of internal elite dynamics that recognizes a government as a heterogeneous group of individuals, rather than a monolithic agent (Wagner, 2007, p. 7; Eusepi and Wagner, 2011). With it, we explain how SEZs can increase political elites’ relative payoffs from liberalization versus the status quo. The SEZ path to liberalization is unlikely to lead to policy reversals. It is also cheaper than buying off an entire authoritarian government at once, as it involves the

¹ This can create “constitutional moments” (Buchanan 1997, p. 186; Voigt, 1997, p. 26; 2004, p. 223), and opportunities for irreversible “shock therapy” reforms (Lipton and Sachs, 1990, p. 100; Åslund, 2001, p. 46).
compensation of only a subset of the existing elites.

We apply our model to a comparative analysis of China and Ghana. China is an often-cited example of how SEZs have contributed to a transition from protectionism to openness towards foreign investment and trade (Ge, 1999, p. 1283). The number of SEZs in other African countries has grown rapidly in the last couple of decades as part of the development programs of many African governments (Farole, 2011, p. 68). If SEZs reformed China, why would they not work the same miracle in Africa?

Ghana provides a good case study because its SEZ program looked promising by the standard benchmarks. According to a World Bank report, Ghana's zone program was "one of the best designed, most flexible, and most innovative" in Africa (Farole, 2010b, p. 23). A commonly cited problem with zones, in the Indian case for instance, is that they are governed by unstable rules (Keshawar, 2008, pp. 11-12). Ghana's SEZs by contrast, had stable of rules and codes and thus a seemingly secure and reliable business climate (Farole, 2010b, p. 12). Ghana also relied on the private sector for zone development, which is regarded as "best practice" for SEZs (Farole, 2010b, p. 15). Like China, Ghana introduced large, diversified zones that engaged in a wide range of businesses, including services (Farole, 2010b, p. 3; Ge, 1999, p. 1269; Fenwick, 1984, p. 380). The incentives for businesses were in fact more attractive, clearer, and more transparent in Ghana than in China (Farole, 2010b, p. 12). Therefore, by the standard benchmarks, it seems as though Ghana would have been at least as successful as China in using SEZs to promote reforms. Instead, China succeeded while Ghana failed.

The problem with standard benchmarks for comparing SEZ regimes is the disregard of the role institutions and political processes, which are evidently important for economic development (Nee, 2000; Chen, Hillman and Gu, 2002; Tian, 2001; Brandt et al., 2004; Brumer and Oxoby, 2012). Our model helps us analyze which institutional and political conditions are needed for SEZs to contribute to a country's overall development. It implies that a country needs to be fiscally decentralized and that the ruling political elites must have conflicting interests for SEZs to be beneficial. As a decentralized system with disagreements within the ruling elite, China fits the mode fairly well. By these benchmarks, however, the SEZs in Ghana were unlikely to spur economic reforms.

The next section defines the SEZ concept and explains why it is a special innovation in federalist practice. Section 3 defines what we mean by “successful” SEZs. Section 4 develops a model to SEZs creation and analyzes the potential for reform reversals. Section 5 applies the theory to the comparative cases of China and Ghana.

2 SEZs as an innovation in federalist practice

SEZs come in many different forms and take on different labels depending on such things as areal size, target market and types of production. We will use SEZ as a generic term, but is often the label used for larger zones with both production facilities and residential properties that are not restricted to producing for exports. Export processing zones, by contrast, are smaller industrial parks that only contain production facilities. Governments generally exclude SEZs from certain trade barriers, taxes, and sometimes also to labor and environmental regulations. As such, they enjoy exceptions to federal laws that other parts of the country must obey.
In the standard model of federalism, institutional diversity at lower administrative levels is embedded in the larger federal legal framework. Laws at the local level cannot breach those at higher levels (Riker, 1964b; V. Ostrom, 1991; Weingast, 1995; Ter-Minassian, 1997; Bednar et al., 2001; V. Ostrom and Allen, 2008). The federal level can prevent protectionist policies by local jurisdictions, which Weingast (1995) argues is a key to a resilient market order. Thus, as E. Ostrom (2005, ch. 9) notes, federal level rules that assure minimal universal standards prevent “local tyrannies”, while still allowing for local experimentation.

SEZs take federalism a step further by avoiding even the federal level rules. For SEZs, the central government explicitly allows federal level rules to be breached. Because SEZs cannot be created locally without the central government’s permission, they are not mere expressions of a country’s political decentralization. In countries that have more than two administrative levels, SEZs can be granted exceptions either to central level rules or to some of the lower level rules. In China, for instance, there are five hierarchical levels of government: Central, provincial, prefecture, county, and township. Chinese SEZs have been introduced both by the central government and by the lower provincial or prefecture levels, thus carving out exceptions to the rules of the different levels of government (Wang, 2013).

Because the decision to create an SEZ is politically easier than changing the rules for the country as a whole, SEZs facilitate the introduction of greater decentralization in particular areas. This allows for institutional diversity that promotes faster changes than the standard federal degree of decentralization. It is therefore not too radical to describe an SEZ as an enclave acting as a “foreign territory” (Chaudhuri and Yabuuchi, 2010).

3 Explaining SEZ success

Exemptions from taxes, tariffs, and regulations allow SEZs to attract FDI, create employment opportunities, and increase demand for domestic products (FIAS, 2008, pp. 12-14). This has earned them praise as tools for economic development (FIAS, 2008, p. 32; Haywood, 2004). Many SEZs have however failed to live up to expectations. The Indian zone program started in 1965, but until a set of policy revisions in 2005, it did not generate much investment or employment (Gopalakrishnan, 2011, p. 139). While the SEZ program in Poland has expanded, the government has increasingly used it to provide benefits to certain businesses (Gwosdz et al., 2007, p. 831). Another problem is when government provided infrastructure in SEZs end up as little more than “white elephants”, structures that cost more to maintain than the benefits they yield (Farole and Akinci, 2011, p. 4).

More than half of Sub-Saharan countries have introduced SEZ schemes, but most of them have shown disappointing performance. The investment attracted to African SEZs has often been unsustainable and vulnerable to political developments (Farole, 2011, pp. 67-69). Nigeria’s zones sparked a conflict with the customs authorities, which refused to give up their revenues by implementing lower tariffs (Farole, 2010a, p. 20). The zone program in Senegal in 1991 served primarily as a safety valve for protected domestic businesses (Baissac, 2011b, p. 12). SEZs clearly do not only face economic obstacles, but political ones as well.
To analyze the necessary institutions for SEZ driven reform, we must first specify what we mean by SEZs being “successful”. It is incorrect to judge this solely on the basis of the amount of investments or structures in a zone. While investments and exports in an SEZ may grow, that does not mean that the zone is good for the economy. It may be merely be shifting investments around, causing resource misallocations as a result. Also, buildings in SEZs may just be white elephants or the result of rent-seeking rather than market-driven profit seeking. A successful SEZ scheme by contrast, is one that promotes economic growth in the country as a whole.

Under what conditions, then, is this possible? A system of growth-harming policies, such as repressive taxes, trade protectionism, wage controls, and government expropriations, encourages rent-seeking by businesses seeking exemptions. Rent-seeking is wasteful and makes the economy underperform as a whole. If SEZs, which rely on attracting investors, can abolish the destructive policies, it may successfully promote liberalization. If, by contrast, the system is already liberalized, with low taxes and prudent regulations, SEZs do more harm than good. There will be a minimum amount of rent-seeking already if all businesses are subjected to the same growth-promoting rules (Buchanan, 1980; Buchanan and Congleton, 1998; Boettke, 2009). As a policy of differential taxation and trade restrictions, SEZs will then likely create rents, rather than to lower them.

Whether SEZs promote liberalization or cause more rent-seeking depends on the incentives of policymakers. In a liberal and fair system, the only possible reason to introduce SEZs is to extract rents. In a system filled with distortions and rent-seeking, we must ask why the government wants SEZs. If all powerful decision makers in the government have an interest in extracting maximum rents, they will only introduce SEZs to use them as rent-seeking tools. They may even use SEZs to avoid policy changes nationwide, and thus effectively stifle liberalizing reforms (WB, 1992: p. 3). If a majority of the elites actually want liberalization, they can more effectively liberalize the economy by introducing more general reforms, rather than the selective SEZs. There is however a third, more interesting scenario. Because people in government may not have the same interest, reform-minded powerful people may exist who are too few to change the system as a whole. If this elite minority can use SEZs to gradually change the system, then the zones are indeed useful as tools for liberalization. This is the case that we will explore.

4 Pro-growth SEZs and liberalization avalanches

We apply a public choice framework to analyze the incentives of political elites with conflicting interests. This heterogeneity of elites, coupled with the need to make a common decision at the central level about an SEZ, are critical factors for understanding the process by which SEZs are created, and whether they are likely to promote economic development.

A system of rent-seeking persists when it is profitable for a majority of the political elite. While liberalizing and promoting pro-growth policies would increase
their tax revenues, such reforms would lower their rents even more. For a minority of officials, however, liberalization would generate higher tax revenues than the rents that they lose. These reformers build a coalition in favor of SEZs. Although they prefer countrywide reform, they can initially only aim for this more modest step towards liberalization. The more radical is a change, the more politically difficult it is to implement. The most liberalizing reforms that are politically feasible are therefore often “second-best solutions”, which is a label also bestowed upon SEZs (WB, 1992, p. 3; Rodrik, 2008, p. 7). SEZs thus have two positive features for an official pursuing increased local liberalization: (1) they look less threatening to political elites who benefit from the status quo, and (2) their policies can be more radical than compromises about changes in the prevailing rules.

To understand the political economy behind the creation of pro-development SEZs, we first look at how SEZs can generate avalanches of liberalization, and we then discuss the risks of policy reversal.

### 4.1 How SEZs yield liberalization avalanches

As we will show, fiscal decentralization and heterogeneous elites are crucial components in SEZ success. However, while fiscal decentralization is a recognized promoter of growth inducing change, the importance of elite heterogeneity is less appreciated.

In Blanchard and Shleifer’s (2001) model of federalism, a local government chooses to promote growth if

$$p a y > b$$  \hspace{1cm} (1)

where $p$ is the ratio of the probability that the local government stays in power if it promotes growth, to the probability that it stays in power if it prevents growth. The parameter $a$ is the share of local revenues that the central government allows the local level to keep, and $y$ is economic output from growth-promoting policies. Finally, $b$ is the benefit to the local government from pursuing growth-suppressing policies, as it benefits from the rent-seeking that these policies generate. A central government can raise the magnitude of $p$ by both rewarding local officials for good economic performance, and by deposing them if they perform badly. The higher is $p$, the higher is thus the level of political centralization. In the words of Blanchard and Shleifer (2001), “[t]he local government is more likely to choose growth, the stronger the stick (the higher $p$), the bigger the carrot (the higher $a$), the larger the growth potential (the higher $y$), and the smaller the benefits of capture or the lower the costs of reining in

bribes can adopt the Singapore strategy, with higher punishment, monitoring and other disincentives (Quah, 1995; Becker, 1974). For the purpose of this paper, we ignore the principle-agent problems between high-level political elites and lower members of the administration. In line with Schleifer and Vishny (1993), we model a government’s vested interest in rent-seeking as a function of the benefits a government can derive from it, rather than the outcome of a principal-agent game between government officials and bureaucrats (Becker and Stigler, 1974; Banfield, 1975; Rose-Ackerman, 1975; Klitgaard, 1988).  

3 As Acemoglu and Robinson (2013) note, “a set of policies which may seem deeply misguided by the standards of basic textbook economics may nonetheless be serving the political economy purpose of holding together a governing coalition”.

competition for rents (the lower b)."

This model leads them to conclude that “for federalism to function and endure, it must come with political centralization”. To come to this conclusion however, Blanchard and Shleifer assume that the central government is united in the pursuit of maximizing economic growth. In their model, local governments may be captured by growth-oppressing interests, but the central government is not (p. 6). The analysis thus ignores the fact that central government officials may benefit from a rent-seeking system and therefore prevent reform. Without accounting for rent-seeking by the central government, Blanchard and Shleifer do not provide an explanation for how reform of such a system can come about.

Much of Western European economic history does indeed tell of the adverse motives of ruling elites (Ekelund and Tollison, 1981; Nye, 2007; Braithwaite, 2008, ch. 1). Within European mercantilist societies, liberal reforms occurred only if “the major elites benefited from commercialization and could successfully cut off those who would oppose the spread of national commerce” (Nye, 2009, p. 59). The change emphasized in this literature is the switch from rent-seeking to taxation. When developments occur that reduce the costs of setting up an effective system of taxation, the government has an incentive to open the economy and obtain more revenues from taxation and less from rent-seeking.

By introducing elite heterogeneity, we can analyze the internal dynamics of a rent-seeking government. As we will show, in addition to fiscal decentralization, heterogeneous elites are a crucial part of gradual SEZ driven reform. Following Blanchard and Shleifer (2001), we denote revenues from taxation as \( p \) and revenues from rent-seeking as \( b \). We assume that the same trade-off for local leaders between rent-seeking and taxation is at work, and that local leaders can use the discretion over local policies that the federal system allows them to determine the balance between taxation and rent-seeking.

A local leader who benefits from liberalization decides to rely on taxation as much as possible, and will also want to host an SEZ to increase tax revenues further. SEZs liberalize the economy more than the federal system allows, through its exemptions from federal taxes, tariffs, and regulations such as labor laws.

If an elite member is granted an SEZ, this person is further incentivized to pursue pro-growth policies and discourage corruption at the local level. To illustrate this, we let \( \lambda \) denote the level of local liberalization that SEZs generate, where \( 0 < \lambda < 1 \). Local officials may have a Cobb-Douglass utility of the revenues from taxes and rent-seeking respectively:

\[
 u(p, a, y, b) = \lambda \log(p a y) + (1 - \lambda) \log(b)
\]

A local leader can only obtain an SEZ if there is enough support for the policy at the central level. We assume that the central government deciding about SEZs consists of elites with interests aligned with the country's local leaders. They can either formally represent local leaders, or receive informal kick-backs from them. The heterogeneity of central decision makers thus stems from the divergent interests of the local leaders that they represent.

The divergent interests of local elites results in turn from the fact that some
local leaders see higher profits from liberalization than others. Their areas may have higher growth potential because they are more attractive to investors. An area on the coast, for instance, benefits from tariff exemptions because they easily attract exporting companies. In other areas, local practices and institutions may prevent effective tax collection, thus raising the cost of extracting taxes. Local elites also have different capacities of governing in a business friendly way.

A member of the elite that wants to introduce SEZs must persuade a majority of the other members to be in favor of the policy for their region. These can be bribed, threatened, or cajoled. Because the SEZ aspirant must incur these costs, this will likely be the local leader with most to gain from introducing an SEZ, persuading those with the least to lose from liberalization. Reform opponents must at least perceive that they will lose less individually than the elite advocating an SEZ can offer them as compensation. The immediate loss of the anti-reform elite primarily stems from the risk of SEZs attracting companies from their region. This makes local monopolies less profitable, hence lowering their b.

We denote elite heterogeneity as the members of the elite having different costs of extracting taxes and revenues. Those with relatively low costs of tax collection as opposed to rent-seeking will thus be the ones asking for SEZ approval. The local elites’ expenditures on taxing and rent-seeking respectively are limited by their budget constraints, \( B = P_{\text{tax}} a y + P_{\text{rents}} b \), where \( P_{\text{tax}} \) and \( P_{\text{rents}} \) represent the administrative costs for taxation or rent-seeking respectively.

Maximizing \( u \) with respect to \((p a y)\) and \((b)\), subject to the budget constraint, gives the demand functions for rent-seeking and taxation for each region:

\[
\begin{align*}
  p a y &= \lambda \frac{B}{P_{\text{tax}}} \\
  b &= (1 - \lambda) \frac{B}{P_{\text{rents}}} 
\end{align*}
\]

When liberalization in a region is low, the demand for rent-seeking rises above the demand for taxation. Therefore, assuming that the administrative budget remain unchanged, the revenues from rent-seeking become larger than that from taxation when liberalization decreases, as illustrated in Figures 1a and 1b. More liberalization, by contrast, raises the potential revenues from taxation while lowering the revenues from rent-seeking.

The introduction of an SEZ is not an isolated event, as liberalization in one area generates political externalities for other regions. Simmons and Elkins (2004) describe how policy diffusion can stem from a reputation effect. As other countries introduce a policy, the reputation of other countries from engaging in it changes. SEZs can similarly change the reputation of other regions in a country as being more liberalized. Businesses may then start acting as if the country is less corrupt. SEZs may also lower the effective protectionism in other regions if importers start avoiding tariffs by buying or smuggling inputs via the SEZs.
In these ways, SEZs generate liberalizing externalities that on the margin make taxation relatively more attractive than rent-seeking to elites in other parts of the country. Areas without SEZs will thus also see a slight rise in $\lambda$, the level of liberalization from SEZs. A pro-growth SEZ in region $k$, thereby creates a liberalizing externality on the other regions: $\Delta\lambda = L_{ik}\Delta\lambda_k$, where $0 < L_{ik} < 1$ and represents the size of the region-to-region liberalizing externality.

The change in external liberalization affects the trade-off that local leaders make between taxation and rent-seeking policies. To see this, we introduce the demand functions (3) back into the utility functions (2). We then get each elite member’s satisfaction with the existing level of liberalization in their region (fig. 2):

$$u(\lambda) = \lambda \log\left(\frac{B}{P_{\text{tax}}}\right) + (1 - \lambda) \log\left((1 - \lambda) \frac{B}{P_{\text{rents}}}\right)$$

No member of the elite is ever satisfied with the existing degree of liberalization, but political externalities between regions make it impossible for any local elite to change $\lambda$ unilaterally. What they can do is to advocate for or against SEZs in other regions. The externality generated by liberalization either increases or decreases their utility, $u(\lambda)$. Whether they are for or against more liberalization thus depends on what the current level of liberalization is in the country.

[Fig. 2a and 2b]

We can now analyze whether an SEZ leads to a liberalization avalanche or to a policy reversal. The introduction of an SEZ raises the level of $\lambda$ for all local elites. Because their $u(\lambda)$ has only one minimum, a local leader in favor of liberalization (with the pre-SEZ level of $\lambda$ already to the right of the minimum) then becomes an even stronger advocate for SEZs, that induce further liberalization (fig. 2a). Some of the elites will switch from being against to being in favor of liberalization, if the creation of the SEZ pushes the level of liberalization to the right of the minimum of their utility function (fig. 2b). After the creation of the SEZ, further liberalization then increases the agent’s utility, while smaller reversal in the direction of less liberalization decreases it: $u(\lambda + \Delta\lambda) > u(\lambda - \Delta\lambda)$.

The creation of one SEZ can thus lead to the creation of further SEZs. One zone gives more members of the elite the incentive to support further SEZ initiatives. New local leaders will also want to pursue an SEZ for their region. The fewer the members of the elite against SEZs, the cheaper it will be to obtain government majority approval. With an increasing share of local leaders in favor of SEZ, the SEZ opposition loses steam. Eventually, a majority of the elite prefers liberalization, and can pursuing broad liberalizing reforms. More local leaders will then have the incentive to dismantle their rent-seeking systems in favor of economic growth and taxation.

This model shows the importance of elite heterogeneity and fiscal

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4 Because SEZ leads to more investment in other areas of the country, they may not grow at the expense of other regions. Indeed, it seems that the Chinese SEZs did not have such negative effects on other regions (Wang, 2013).

5 One can imagine that the liberalization externality could also be negative, but Simmons and Elkins (2004) show empirically that this is unlikely.
decentralization for SEZs induced reforms. If a rent-seeking government is in agreement about preserving the protectionist regime, no elite minority will attempt to liberalize with the help of SEZs. If the country is fiscally centralized, local leaders do not obtain the proceeds from a growing economy and therefore do not have the incentive to initiate SEZs. In that case, for SEZs to come about, they must be imposed on local elites by the central government. This may happen if a majority of the government is in favor of more liberalization. However, as we have argued, SEZs are not important or even beneficial for a government in a genuine pursuit of economic growth. A government against liberalization, on the other hand, would only impose SEZs on a region to create more opportunities for rent-seeking by providing particular company privileges. Therefore, SEZs cannot be useful under a regime of fiscal centralization. If they do appear, they either signal that the government is misguided in its choice of development policies, or that there are severe corruption and rent-seeking problems at the top.

4.2 Reform robustness or policy reversals

Any development policy can only work if the government can credibly commit to it (North, 2005, ch. 8; Boettke, 2009). This will not be the case with SEZs if the government may reverse them. If the government that created the SEZs is not believed to keep the rules in place, investors will likely stay away from them.6

A government’s commitment can only be credible if it is incentive compatible. As we have shown, SEZs generate their own incentive compatibility, by making elite members benefit from liberalization. They are not introduced because the administration in office saw value in human flourishing among its people, so that less benign future administrations will want to reverse the policy. SEZs are not a way to lure companies to make investments that the government can subsequently expropriate. Rather, their introduction and persistence are driven by the self-interest of elite members in pursuit of maximizing their personal revenues.

Even when the promise of fiscal decentralization is broken in a federal system, SEZs seem less likely to be affected. Because they enjoy substantial independence compared to local jurisdictions under standard federalism, they enhance the credibility of a revenue-sharing arrangement between levels of government. This SEZ independence has manifested itself in China. Weingast, Montinola and Qian (1995) describe China as a system where the central government commits to preserving federalism. However, Chen, Hillman, and Gu (2000) show that this is not a credible commitment. When the central government’s revenues previously decreased, this weakened the revenue-sharing arrangements with the local levels. Local governments were then incentivized to switch to a model of governance that undermined economic growth. Yet, despite the decline in fiscal decentralization at this time, the creation of SEZs continued unabated (Wang, 2013). The SEZs may thus have served as decentralization’s more robust substitute.

6 The issue of credible commitments has proven to be of great importance also in other contexts (Williamson, 1983; Weingast, 1995; Boettke, 2009). For example, in the post-communist transition apparently successful reforms were reversed or engendered a backlash as the political elites lacked the incentive to keep the reforms in place (Murrell, 1993; Boettke, 1993; 2001: ch. 10-13; 2009; Åslund, 1999).
5 Case studies

The case studies of China and Ghana illustrate our argument. In China, SEZs were introduced in a context of political disagreements and fiscal decentralization. In, Ghana they were created under political agreement and fiscal centralization. This has led the SEZs in China to work in favor of the reform process, while they failed to do so in Ghana.

Among African countries with zones, Ghana makes a good comparison with China, as it is seemingly the best candidate to have replicated China’s successful use of SEZs as a part of its economic reforms. In 1995, Ghana adopted a promising SEZ program as part of an industrialization strategy inspired by the successful East Asian countries. It was not a relatively backward country at the time. Both its inflation adjusted GDP per capita and its score in the World Bank’s human development index were higher than it was in China when it introduced SEZs back in 1980. Until 1982, the people of Ghana were actually richer than the Chinese. By 1995, the people of China were almost three times richer (fig. 3).

[Figure 3]

Macroeconomic data give little guidance as to whether the SEZs played a role in the countries’ progress. Many factors play into a country’s development (Sala-i-Martin, 1997). To understand whether SEZs are used for economic reform or as tools for rent-extraction, we look at the political process by which they came about. We discuss this development in light of the key factors that drive our model: decentralization and heterogeneity among decision makers.

5.1 China

The Chinese reform period began in the late 1970s, and SEZs are acknowledged as playing a prominent part in the subsequent Chinese “growth miracle” (Ge, 1999, p. 1283). China had by then developed a decentralized system, both fiscally and politically. Xu (2011) describe the Chinese system as a “regionally decentralized authoritarian regime”. The central authority appoints local officials, who in turn decide most local policies. Local leaders thus have the discretion to change their policies towards more taxation or rent-seeking. In addition, Chinese fiscal decentralization incentivizes them to make profits from taxation through good policies (Li, Li and Zhang, 2000, p. 283).

Fiscal decentralization resulted from tax reforms in the early 1980s. By the mid-1980s, Chinese provinces could keep a large part of their internal tax revenues. While different provinces had somewhat different sharing schemes, the share of tax revenues that was sent to the central government was clear and predictable (Oi, 1992; Ter-Minassian, 1997, ch. 26). An official deciding whether to rely on revenue from extracting rents or from taxation from a growing economy could therefore make the relevant cost-benefit calculation.

Local demand for SEZs manifests the importance of fiscal decentralization for SEZ creation (Crane, 1990, p. 163). While the Chinese SEZs had to be granted by the
central government, the initiative came from local elites, who began to lobby for SEZs when they saw the profit opportunities that they offered. The first initiative came from representatives of China Merchants’ Steam Navigation Company, based in Shekou in Guangdong province, who had property and other commercial interests in nearby Hong Kong. They persuaded the Minister of Communications, Ye Fei, to grant them a special deregulated area for conducting business with the then British territory, and the government subsequently declared the Shekou Industrial Zone in 1979. Minister Fei thus became one of the early proponents of zones within the ruling elite (Sit, 1985, p. 75; Crane, 1990, pp. 26 and 156).

Another early SEZ promoter was the party secretary for Guangdong, Wu Nanshen. He managed to get the government to grant the creation of the first SEZ in his province in 1979. The central government then allowed for three SEZs in Guangdong, and another one in the province of Fujian (Coase and Wang, 2012, pp. 60-2; Crane, 1990, pp. 27). Following the creation of the Fujian SEZ, conflicts between the local and national leadership over SEZs became tense, with the latter opposing further expansion. This caused a halt to any new regulations in the zones for four years (Crane, 1990, pp. 20, 28 and 34). In 1984, China’s fifth SEZ was introduced in Hainan, along with 14 so called “coastal cities” (p. 95).

The disputes surrounding the SEZs reveal the heterogeneity and divergent interests of the Chinese elite. There was no government consensus on the policy. Even Deng Xiaoping, the then Vice Premier of China, who is the person most commonly associated with the policy, was not initially a supporter. The SEZs had only a handful of advocates back in 1979-1980, and Deng only came on board with the idea around 1983-1984, when several other central leaders started supporting it (Crane, 1990, p. 156).

As the first SEZs did not enjoy much political independence from provincial and state authorities, they reflected careful compromises with the protectionist elite. More political decentralization came in 1981-1982, when the authority over the SEZs was divided between local, regional and state levels (p. 55). In 1984, further reforms gave SEZ factory managers substantial responsibilities (Crane, 1990: 82-5). Growing SEZ support also made the central government remove several regulations and bureaucratic obstacles for SEZ businesses (pp. 76-9). After a slow start, industrial investments in the SEZs then started to increase substantially (p. 101).

More members of the Chinese elite started supporting the SEZs as they grew in quantity and size. As a result, they were not reversed despite facing some serious challenges. In 1985, a corruption scandal in Hainan allowed SEZ opponents to point at the problems with SEZs. More government monitoring and central power over the SEZs followed (Crane, 1990, pp. 111-16). Yet, these were mostly rhetorical changes. SEZ proponents had by then also grown powerful and plentiful enough to see to it that the policy was not reversed.

To appease the elites who feared the loss of their rent-seeking revenues, the reformers agreed that the SEZs would aim to attract more foreign investors and fewer national companies. This would lower the risk of domestic companies moving to the SEZs from other areas. They also agreed on a policy that explicitly combined SEZs with import substitution. Protectionist local elites would thus have less incentive to resist SEZs. As a result, the SEZ expansion could continue despite the opposition (Crane, 1990, pp. 117-22). The SEZs were thus introduced gradually, and only when they were not
perceived as too threatening by the protectionist elite. More straightforward liberalization of regional or central rules would have been more vigorously opposed, as they would have overtly challenged the existing power structure.

With more SEZs, more regional leaders benefited from the tax revenues that decentralization granted them, which gave the SEZs growing support. Regional governments that saw that they benefited from hosting growing communities of enterprises and productive people did not want to see the reforms reversed (Weingast, Montinola and Qian, 1995, p. 69). Conservative officials who felt threatened by the SEZ reforms therefore found themselves in a shrinking minority.

The weakening SEZ opposition set the stage for the liberalization avalanche in China. The number of SEZs has grown dramatically since the 1980s. The share of municipalities hosting SEZs was 9% in 1985. In 1992, all provincial capitals were given SEZ status and by 1995, almost 70% of Chinese municipalities hosted SEZs. By then, the liberalization avalanche had clearly played out. In 2008, this share had risen further to 95% (Wang, 2013, p. 136; Alexander, 2014). Concurrently, China has liberalized nationally. Between 1980 and 1985, China’s score in the Fraser Institute’s Index of Economic Freedom improved from 4.0 to 5.1, followed by further improvements to 6.3 in 2005. Corruption may still be a problem in China, but it is no more prevalent than in other countries at the same level of development (Ramirez, 2012).

5.2 Ghana

Ghana saw decades of economic mismanagement after its independence in 1957. Subsequent socialist and nationalist governments introduced state monopolies and cumbersome regulations of foreign investments, and made the main export sectors dependent on state subsidies (Frimpong-Ansah, 1991; Grant, 2001, p. 999). Before the mid-1980s, Ghana experienced decades of declining GDP per capita and attracted significantly less FDI than other African countries of comparable wealth (Dzorgbo, 2001).


These reforms came more than a decade before the country’s SEZ program started in 1995. Rawling’s government introduced SEZs as part of a program to turn Ghana’s economic interests eastward. There was popular resistance against western dominance in foreign investment, as well as a growing pessimism about the result of the country’s “Western” reforms. The government wanted to adopt the state-led development models of China and Malaysia, and to seek new trading partners in their region. The government could use the privatization of its state-owned assets to offer lucrative contracts to Asian companies and thus attract them to Ghana (Ansah, 2006, pp.
Ghana’s government fostered particularly close ties with Malaysia. Ethnic Malaysians, the Bumiputeras, had received favors and subsidies from the Malaysian government for decades (Johnson and Mitten, 2003, p. 355). The Malaysian government then started directing them to venture abroad to gain global market positions (Ansah, 2006, p. 268-9). Ghana was suitable as a trading post, and the lucrative investment deals by the Ghanaian government allowed the Malaysians to dominate several key sectors throughout Ghana, notably the telecom industry (p. 297).

The centerpiece of the government’s policies to attract FDI to Ghana was the SEZ in the port of Tema, about 16 miles east of Accra (Farole, 2010b, p. 3). East Asian investors in particular, were expected to increase Ghana’s exports by investing in the zone (Killick, 2008, p. 27; Ansah, 2006, p. 261). The government granted the right to develop the Tema zone to Business Focus, a company owned by Datuk Shah Omar Shah, a Malaysian businessman with close links to the Malaysian prime minister and his party (Farole, 2011, p. 193). Business Focus also controlled the development of Ghana’s Port Authority (Ansah, 2006, p. 274).

Ghana’s first SEZ thus came about as part of the government’s strategy of industrial policy, trade, and international political relations. The SEZ was not, as in China, driven by the demand of local officials or entrepreneurs. More than economic, the government had political goals with Tema (Ansah, 2006, p. 9). With their newfound reciprocal benefits, the governments of Ghana and Malaysia formed a peculiar marriage, where the Ghanaian government used the SEZ to please Malaysian companies. The success of the zone became increasingly dependent on Malaysian investments, and thus vulnerable to Malaysian politics (Ansah, 2006, p. 285).

Relations between Ghana’s government and Business Focus soon soured due to disagreements over infrastructure and service delivery. Business Focus halted its ongoing development of the SEZ, resulting in insufficient and half-made infrastructure that kept other potential investors in Tema away. The Asian financial crisis had the Malaysian government impose capital controls and other policies that discouraged the government-connected firms from investing abroad. Ghana’s government found itself unable to make Business Focus resume its work (Ansah, 2006, p. 286; Farole, 2010b, p. 4).

In 1998, the World Bank attempted to rescue the project, promising $50 million in support conditional on other investments from private companies. The private money never materialized, however, and the SEZ development remained stagnant (Xinhua News Agency, 1998; Mallet, 1999). The SEZ at Tema was more or less deserted until 2005, when the World Bank started sponsoring the project. The SEZ has subsequently attracted investments. The government has provided the infrastructure, and there is an information, communication, and technology (ICT) park that is partly financed by the World Bank (Farole, 2010b, p. 4; Shan, 2011). Ghana also designated another three zones, which by 2010 had yet to see any development (Farole, 2010b, p. 7). The Ghanaian media have lately described the Malaysian deal in Tema as failed and corrupt.7

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7 “Government takes back Tema shipyard” (Daily Graphic, August 15, 2012); “Politicians take over Tema port” (Vibe Ghana, October 22, 2013); “Tema Shipyard saga rages on after divestiture” (K. Selorm, MyJoyOnline, August 1, 2010); “Tema Shipyard Deal: Malaysians Swindle Ghana” (Modern Ghana, 27 March 2013).
The story of Ghana’s SEZ regime lacks any resemblance of one where SEZs have the potential to drive economic reforms. The problem was not a misfortunate zone location. The Tema port has been important for Ghana’s economy for decades. It is not that Ghana was a country somehow unable to reform itself. Ghana has seen substantial liberalizing and growth-promoting reforms, but these came about more than a decade before the SEZ. For SEZs to be tools for liberalizing reforms there must be a local demand for liberalization. In Ghana’s case, the demand for SEZs came from the top.

Due to the Ghana’s fiscal centralization, local SEZ demand did not have the potential to materialize. The government oversaw substantial transfers between districts to reduce regional inequalities. Sub-national entities generated only 12% of their total revenues internally by 1999. By 2000, around 81% of district assembly revenues came from government transfers. Sub-national authorities were therefore more dependent on transfers from the central government than on their own local tax base (Inanga and Osei-Wusu, 2004, pp. 85-94). Local officials did therefore hardly see any profit opportunity from liberalization in their region. Due to Ghana’s fiscal centralization, the government’s actions were not reflections of local initiatives. Ghana also lacked a federal system of political centralization, which would have given local leaders the discretion to adjust their policies towards more taxation versus rent-seeking. The allegedly elected district assemblies had only limited power, and the central government appointed many of its members (Ribot, 2002, p. 6). Much SEZ planning stemmed from a central regulatory board that enjoyed discretion over SEZ policies (Farole, 2010b, pp. 12 and 14). Local politicians did thus neither have a stake in local development, nor the power to influence it. The central government wanted SEZs, but apparently not for the sake of economic liberalization. Policies at Tema were actually no freer than the rest of the country, not least due to a cumbersome registration process for SEZ firms (Farole, 2010b, pp. 16 and 18). This lack of liberalization in the zone can explain much of its underwhelming performance.

The Ghana case does not only exemplify how an SEZ scheme introduced for other reasons than economic liberalization fails to benefit the economy. It also shows how standard benchmarks for SEZ success say little about their benefits. Ghana’s zone scheme as a whole now hosts a lot of FDI, a benchmark often cited to determine SEZ success. As a result, it is described in a World Bank report as a relative success in the African context (Farole, 2011, p. 70). However, by 2009, around 98% of that FDI originated in single factory zones, which are single companies that enjoy SEZ privileges. In 2010, they accounted for 36% of the country’s exports, while Tema stood for only 8% (Farole, 2010b, pp. 9 and 11). Single factory zones are primarily reflections of companies’ opportunities to obtain fiscal favors from the government. They are hardly harbingers of national reform.

6 Conclusion

Special economic zones play an unusual role in economic development. They constitute a government policy that can bring about economic reforms even when a majority of the political elites is against liberalization. It is often assumed that reform is

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6 A 1974 law to give more budget responsibilities to local government was yet to be implemented in 2010 (Gilbert et al., 2013, p. 111).
dependent on a unified leadership that is committed to reform. Centralized power under a benevolent despot, not a fragmented leadership, is also seen as a condition for more reliable economic reforms. We have argued that such conditions are neither necessary nor favorable for a reform process. Not only can SEZs contribute to economic reform in the absence of such conditions. They are only useful when there is political disagreement over policy.

Decentralization is also a key factor in explaining why different countries see very different results from SEZ programs that on the surface look very similar. In centralized systems, local elites in politics and business do not have an incentive to pursue economic liberalization by means of SEZs. Any zones are therefore either misguided or tools for rent-extraction by the government, rather than growth-promoting institutions.

The problem with SEZs is seldom that they fail to live up to the goals of its initiators. It is that under the wrong circumstances, these goals are not economic liberalization and growth, but political favors and rent-seeking. The centralization and absence of disagreement in Ghana's government meant that their SEZs served as vehicles for rent-extraction, and did not contribute to the country's liberalization.

The Chinese SEZs, by contrast, formed in the right institutional and political context. The prospect of higher tax revenues led local officials to push for their creation. Because of the political dynamics within the fractionalized government, the Chinese SEZs could expand despite attempts by powerful government officials to prevent the spread of liberalization. It was thus not by happenstance that the Chinese SEZ expansion coincided with the country's economic liberalization.

The criteria that matter for SEZ success are institutional and political, which means that macroeconomic data cannot predict an SEZ regime's prospects. Whether SEZs serve as "tools" for development depends on the incentives faced by the policymakers who choose to use them.

Acknowledgments

We thank Peter Boettke, Tyler Cowen, Peter Leeson, Mark Lutter, Deborah Martinez-Villareal, Ryan Safner, Solomon Stein and Virgil Storr for useful suggestions. An earlier version of the paper was presented at the Mercatus Center Graduate Student Paper Workshop, and we thank all participants for their comments. Yong Yoon, Georg Vanberg and two anonymous reviewers have also provided useful suggestions.
References


World Politics 47(4), 467-494.


Figures

Figure 1a: Liberalized system, $\lambda$ is large (thick line: demand function for rent-seeking; thin line: demand function for taxation)

Figure 1b: Low liberalization, $\lambda$ is small (thick line: demand function for rent-seeking; thin line: demand function for taxation)
Figure 2a: Incentive compatibility: supporters of SEZ prefer further liberalization, rather than a reversal of reform
Figure 2b: Appeasement of opponents: some opponents of SEZs change their mind
Figure 3: GDP per capita in 2005 USD, PPP adjusted