Institutional Change and Elite Persistence: The 19th Century Caribbean Colonies*

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Abstract

This paper studies a series of constitutional changes in which elected parliaments voluntarily abolished themselves or curtailed their own powers in a sample of fourteen 19th century British Caribbean colonies. It shows that these cessions of de jure legislative powers were local elites' response to rising political competition from freed slaves after Abolition. In panel regressions, the timing of constitutional changes is explained by increases in electoral turnover inside local parliaments and increases in the number of registered voters. Evidence on mechanisms is provided at the parish level. Constitutional changes are shown to have tilted public expenditure in the elites' favor and entrenched established politicians as appointed bureaucrats, suggesting that Caribbean elites more than offset their cessions of de jure powers with increased de facto collective action.

Keywords: Economic Development, Elite Persistence, Political Inequality, Institutions, Franchise Extension.

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1 Introduction

Using historical colonialism as a natural experiment to identify the causal effect of institutions on long run development, several seminal papers have argued that inclusive institutions were set up in the "Neo-Europes" of Australasia and North America because they had low indigenous population densities, moderate levels of settler mortality and a geography suitable for smallholding crops, while extractive institutions were set up in the Caribbean islands because they had large indigenous populations, high European settler mortality and a geography suitable for plantation crops (Acemoglu et al. (2001), Acemoglu et al. (2002), Engerman and Sokoloff (2002)). Plotting present-day incomes against initial conditions in the Neo-European and Caribbean colonies in the core samples of Acemoglu et al. (2001, 2002), Figures 1 and 2 support this narrative in which economic and institutional differences today can be traced back to Europeans setting up different institutions upon their arrival because of different initial conditions. It is therefore surprising that representative institutions in the British Caribbean colonies were practically identical to those of the Neo-Europes for over 200 years after they were founded. Both sets of colonies had representative systems in which locally elected parliaments put firm checks and balances on the executive branch of government representing the English Crown (Wight (1952)). A true institutional divergence occurred only in the second half of the 19th century when democratic institutions in the Caribbean went into decline while those in the Neo-Europes prospered.

In total, 14 British Caribbean colonies were founded under the representative system in the 1600s and 1700s. By 1838, when slavery was abolished across the British Empire, all 14 had retained this system. However, between 1854 and 1877, local parliaments in 11 of the 14 voted to either abolish themselves completely or significantly curtail their own powers by allowing a majority of legislators to be appointed by the colonial administration.[1] These self-imposed limitations on the power of local parliaments were supported by local elites although they seriously curtailed their de jure powers relative to the colonial government. This series of constitutional changes, depicted in Figure 3, therefore constitutes a puzzle as well as a stark contrast to the trend of expanding 19th century democratic institutions (Engerman and Sokoloff (2005)). Yet, to my best knowledge, it has not been studied in either the economics or political science literature.

[1] All 14 remained colonies until after WW 2.

This paper tests whether the voluntary cession of de jure representative institutions can be explained as elites' response to increasing political competition from an expanding post-Abolition electorate of freed slaves. It then asks what the economic and political consequences of these constitutional changes were. Lastly, it provides evidence that Caribbean elites were able to offset the voluntary cession of their de jure powers with increases in de facto collective action, enabling them to maintain political control over the other 95 percent of the population.

To ask whether the abolition of representative institutions can be explained as a response to increasing political competition, a measure of political competition is needed. The main data source for this paper are the *British Colonial Blue Books*, annual statistical reports issued by each British colony, which included the names and election dates of all local politicians.[2] Ideally, I could directly measure the share of non-plantation politicians or politicians representing freedmen. Unfortunately, this is not possible with the existing data. Based on the information in the Blue Books, I calculate electoral turnover as the share of parliamentary seats occupied by a non-incumbent after each general election.[3] While electoral turnover is not the ideal measure of political competition, two additional data-sources that are available only for Jamaica lend it credence: First, data on Jamaica's parliament going back to the 1700s shows that electoral turnover correlates closely with the entry of new politicians. Second, the post-Abolition expansion of smallholding in Jamaican parishes correlates positively with electoral turnover. [4] I find that an increase in electoral turnover of 10 percentage points increases the probability of a constitutional change abolishing parliament by about 1 percent in a given year. As well, a 10 percent increase in the number of registered voters increases this probability by 5 percent. My favored way to organize the data is to think of these to relationships as a second stage (2S) and a reduced form (RF) relationship and to think of the relationship between electoral turnover and the number of registered voters as the first stage (FS). The main motivation for this organization of the data is that both electoral turnover and the number of registered voters are noisy measures of political competition - turnover may well capture one elite-backed candidate being replaced by another and the number of registered voters may deviate significantly from the number of actual voters - and that instrumenting for electoral

[2]The first Blue Books were in the mid-1820s but contained very little data. The main data on local politicians starts in 1836 at the earliest. The Blue Books became a publication in the 1880s. For years before that, only two copies exist of each Blue Book, one in the issuing colony's archives and one the British National Archives in London.

[3]If every incumbents retained his seat at the last election, electoral turnover is 0.

[4]Detailed discussion of this data in Section 3.

turnover with the number of registered voters should reduce attenuation bias. In the first stage, a 10 percent increase in the number of registered voters increases electoral turnover by 5 percentage points.[5] In the second stage, the IV results are much larger: a 10 percentage point increase in instrumented electoral turnover increases the probability of constitutional change in a given year by 10 percent. The main omitted variable concern surrounds differential pressure for constitutional changes. I address this in three ways: I control for network effects by including the number of already transitioned colonies as a control. Second, I control for increased pressure by the colonial administration with a post-1857 indicator that captures the Crown's increased desire for direct control after the Indian Mutiny. Third, I control for a more differentiated increase in pressure by the colonial administration with year and decadal dummies. The results are robust to controlling for all three measures. Constitutional changes are restricted to occur at the level of the colony, restricting the panel to a cross-section of 14. However, the number of voters and politicians' names are reported at the parish-level, which allows me to study the first-stage relationship between the number of registered voters and electoral turnover in a panel with a cross-section of over 100. This also allows me to include electoral cycle fixed effects at the colony level, controlling for any time varying unobservables that shifted the political balance for the colony as a whole. The first stage relationship is strongly confirmed at the parish level, including both parish and electoral cycle fixed effects.

Next, I study the consequences of constitutional changes. Existing literature suggests two predictions: First, the constitutional changes should have led to less constrained spending behavior by the colonial executive, because the main source of parliamentary power both in England and in the colonies was control over taxation and public finance (North and Weingast (1989), Taylor (2002, p 288)). Second, the constitutional changes towards direct colonial rule should have been beneficial for the rural poor based on general agreement by historians that indirect colonial rule empowered and corrupted local elites at the expense of the common people (Lange (2004), Iyer (2010)). When I estimate the effect of constitutional changes on different elements of local public expenditure, I strongly reject both predictions: Constitutional changes significantly reduced overall local tax revenue and spending but reduced educational expenditure, the best proxy for

[5]This finding is consistent with the U.S. evidence in Dal Bó et al. (2009, Table.8) that political competition reduces the perpetuation of political dynasties

pro-poor spending, significantly more. A possible explanation is that local elites' cession of de jure powers actually strengthened their de facto control over local politics, maybe because they had exclusive access to the colonial administration but were ostensibly no longer responsible for its political decisions. I provide supporting evidence for this view by looking at the identity of the appointed legislators after the constitutional changes and comparing them to the stock of elected legislators before. I find a very high degree of persistence in the identity of legislators across the constitutional changes: As late as 20 years after the constitutional changes, more than 80 percent of appointed legislators came from families that had been represented in the elected parliaments before. This finding highlights the fact that institutions can have very different effects, depending whether they are exogenous or endogenously evolved. This also suggests that formal institutions need to be studied in their political economy context, i.e. conditioning on the distribution of wealth, power and interests.

This paper adds to the empirical literature on historical colonialism (Acemoglu et al. (2001), Acemoglu et al. (2002), Engerman and Sokoloff (2002)). It does not challenge the view that institutions persist or that initial conditions matter but it does suggest that initial geographic conditions continued to influence institutional development long after settlement through their impact on the local political economy: The Caribbean's suitability for plantation agriculture created a very unequal distribution of wealth and racial disparities but this did not lead to different de jure institutions until Abolition put the planter elites on the defensive against their former slaves. I view this as suggesting the need for more research into the causal chain linking initial conditions to present day institutions, which relates this paper to several recent studies that "add a more variable factor to the theory of institutions":[6] Acemoglu et al. (2005) document how the 16th century Atlantic trade empowered merchant classes against the monarchy in some European countries which set the stage for important 17th century institutional innovations. Jha (2010) shows how pro-trade economic interests motivated many of the parliamentarians challenging the king's absolutist power in the political struggle that preceded England's Glorious Revolution of 1688. Puga and Trefler (2011) document how Medieval Venice's merchant class allowed traveling merchants entry into their ranks to take advantage of the opportunities from Arab trade but how this initial upward social mobility was self-limiting once the newcomers became entrenched themselves,

[6]This phrase is taken from Rajan and Zingales (2003)

leading to a period of institutional and economic decline. Perhaps the paper most closely related is Trebbi et al. (2008) who show that municipal governments in black-dominated cities in the US systematically changed their electoral rules to in response to the Civil Rights Act in order to mitigate the impact of the newly enfranchised black voters.

This paper also speaks to a literature on the expansion of the franchise. It provides a stark contrast to the general trend of 19th century franchise expansion and can therefore provide a "falsification test" for explanations of franchise expansion elsewhere. In Bourguignon and Verdier (2000), the franchise is tied to education and elites are willing to extend the franchise if they reap sufficient economic gains from broad-based education. In Acemoglu and Robinson (2000), elites extend the franchise in response to a threat of revolt by the disenfranchised poor. Economic growth increases the cost of revolts which increases the bargaining power of the poor to obtain enfranchisement. In Lizzeri and Persico (2004), the elite is non-monolithic and enfranchisement is initiated by wealthy capitalists sharing common ground with workers against the landed gentry. In the Caribbean, two of these three mechanisms were not at play as elites had no shared economic interests with the poor and did not stand to benefit from broad-based education. The threat of revolt, by contrast, did matter and had it not been for the option of Crown Colony rule, it may well have made Caribbean elites to accept the expansion of the franchise.[7]

Lastly, this paper provides an empirical illustration for a formal literature on the "simultaneous change and persistence in institutions" (Acemoglu and Robinson (2006, 2008)). When Abolition came to the Caribbean in 1838, it freed more than 95 percent of its population from slavery, far more than in the US South. Yet, somehow, "not much changed in these islands from 1838 to 1900" (Galloway (2005, p. 154)) and throughout the 19th century, "each major inquiry [by English Parliament] into the British West Indies noted with amazement that nothing had been changed since the last report" (Craton (1988, p. 165)). This paper provides an explanation for the post-Abolition persistence of the Caribbean equilibrium and illustrates how elites can offset reductions in their de jure power with increased collective action.

In the following, Section 2 provides additional historical background, Section 3 discusses data and presents descriptive statistics, Section 4 presents the research design and results and Section 5 concludes.

[7] Section 2 provides evidence that Crown Colony rule mitigated the threat of revolt.

2 Background

There were 17 British colonies in the Caribbean, founded in three waves: The early ones - Antigua, the Bahamas, Bermuda, Barbados, Honduras, Jamaica, Montserrat, Nevis, St. Kitts and the Virgin Islands - were formed in the 1600s by European smallhold farmers and obtained a representative system in much the same way as the original American colonies, through local elites demanding representation with the main aim of controlling local taxes (Taylor (2002, p. 246)). The second wave - Dominica, Tobago, St. Vincent and Grenada - were annexed from France at the end of the Seven Year War in 1765. They were mostly settled by planters from other Caribbean islands and from the start were endowed with the same representative institutions (Ragatz (1928, p. 112)). The last three colonies - Trinidad, St Lucia and Guyana - were ceded by Napoleon between 1797 and 1803. By then, the Crown had started to assert more authority over its colonies so that these were formed under Crown Colony rule (Will (1970)). They are therefore not part of this paper. Under the representative system, locally elected assemblies held wide-ranging powers relative to the colonial administrators (Wight (1952)). The "assemblies seriously curtailed the powers of the governors in the colonies" as they controlled taxation and could veto the governor by blocking the budget (Morrell and Parker (1969)).

The franchise in the Caribbean as elsewhere in the British colonies was obtained through either land ownership or income. The legacy of the Caribbean's smallhold origins meant that the amount of land required for the franchise was relatively small, a land holding of 10 acres sufficient for the right to vote in most cases. The introduction of sugar in the mid 1600s meant large-scale sugar plantations had completely displaced the smaller tobacco freeholds by 1700 (Dunn and Parker (1972)). Most common white planters left for the American colonies (Taylor (2002, ch. 11)). As a result of white out-migration and large slave imports throughout the 17th and 18th centuries, the franchise in the Caribbean had become heavily concentrated by the time of Abolition. "It was distinctly the exception for a member of the legislature to be returned by more than 10 votes" (Wrong (1923)). However, land holdings required to vote typically remained at a low 10 acres to ensure that rural interests' continued dominance in the assemblies over urban merchant interests, whose franchise was typically tied to income qualifications (Wrong (1923)).[8]

[8] Franchise rules are reported in the Colonial Blue Books.

With abolition, many freedmen left the plantations and took up smallholding through purchases of Crown land and marginal plantation lands or by squatting on unalienated Crown land or abandoned plantations. With land ownership entailing the right to vote, smallhold expansion meant franchise expansion and the emergence of the freedmen as a new force in Caribbean politics.[9] In Jamaica for example, "Baptist ministers tried to mobilize the dormant black electorate. They encouraged their members to purchase freeholds and register to vote" (Holt (1991)). This created a situation in which the franchise was expanding without any change to the de jure rules that regulated the right to vote. In response, "assemblies brought into law an umbrella of coercive acts with the purpose of creating a landless peasantry" (McLewin (1987, p 189)). "Throughout the Caribbean, there were organized efforts to evict peasants from the land" (Craton (1997, p 392)): "Crown land was priced to encourage labor for wages and was chiefly in remote locations and of poor quality" (Bolland (1981)) and "parochial land taxes pressed hard on small proprietors" (McLewin (1987, p 184)). Nonetheless, Caribbean elites were unable to effectively stop the "spectacular growth in the extent of smallholding after 1838" (Higman (2001)). While post-Abolition Caribbean planter elites were in a similar position to planter elites in the US South after Reconstruction, they were more constrained in their ability to respond to this challenge. They lacked the coercive capacity and manpower of common whites to violently suppress the ambitions of the freedmen. With the black share of the population everywhere above 95 %, there was no equivalent to the US South post-Reconstruction "white terror" or militias like the Ku Klux Klan.[10] There were also obstacles to the ability to manipulate the legal system because they lacked the political clout in the Center that southern planters maintained in post-Reconstruction federal politics. When a local act looked overtly discriminatory, the Crown would overrule it with an order-in-council (Craig-James (2000, p 65)). Lowes (1994, ch. 5) writes that "because of pressures from the Colonial Office, a comfortable translation of pre-emancipation legal distinctions into distinctions of skin color was not possible." Where planters acted too coercively, they also ran the risk of riots and revolt (Morrell and Parker (1969, p 396), Dookhan (1977, p 114)). No systematic data on Caribbean riots exists but it was clearly viewed as a real danger, particularly as the sugar crop that was vulnerable to

[9]Squatting, pervasive throughout the Caribbean, gave legal title after 12 years on private land and 60 years on Crown lands (Craton (1997, p. 390)).

[10]See Kousser (1999) and Naidu (2009) for a discussion of disenfranchisement in the post-Reconstruction US South.

arson (Craton (1988)).[11]

As a result, "the planters steadily lost their political dominance. As disputatious Assemblies were infiltrated by men of color independent of the plantation economy, the planters recognized their predicament" (Burroughs (1999)). Caribbean planters did have one option that was unique to the colonial institutional template: They could abolish their elected parliaments and switch to direct or *Crown Colony* rule, a system of governance under which all functions of government were controlled by the colonial administration, with the governor appointing the local legislature and judiciary. By doing this, planter elites were giving up their main source of de jure powers but could pre-empt the threat of the freedmen gaining a parliamentary majority. While they had long "jealously guarded their privileges against interference by the colonial adminstration" (Wrong (1923)), they "knew they faced [...] the demand of an increasingly restive nonwhite middle class for a voice in island affairs. In the end, this proved the greater fear and they voted themselves out of office" (Lowes (1994, p. 35)) This trade-off is also apparent in Ashdown (1979, p. 34): "The colonies gave up their elected assemblies voluntarily, for in most cases the white, privileged classes preferred direct imperial government to the government of the colored classes who were slowly obtaining greater representation in the legislative councils." If Crown Colony Rule was seen as the lesser of two evils by planter elites, it raises the question why the nonwhite electorate accepted it if it ended their aspirations towards obtaining an electoral majority. The historical record suggests that the freedmen may have genuinely believed that Crown rule to be preferable to a protruded political conflict and stalemate. This was not unreasonable given that it was the Crown that had imposed Abolition on the Caribbean. Looking towards the three Caribbean colonies that were founded under Crown colony rule seemed to confirm this view: There was a perception that "conditions [there] were much better as planters never enjoyed the same influence over local government" (Laurence (1971, p. 16,23,53)). The provision of public goods was also seen as superior (Dookhan (1977, p. 70)). Further, the colonial administration signalled an intent to improve the lot of the rural poor. Its stated aim was to improve public good provision, for education in particular, and to develop an independent smallholders society (Wrong (1923, p. 78-79)). Pushing for more colonial control to achieve this, Henry Taylor, the colonial office's supervisor of West Indian affairs, pub-

[11] The Morant Bay Rebellion of 1865 was caused by the imprisonment of a squatter on a long-abandoned plantation and apparently led directly to Jamaica's switch towards Crown Colony Rule (Dookhan (1977, p 65)).

licly said that the local parliaments were "eminently disqualified for the great task of educating and improving a people newly born to freedom" (Wrong (1923)).

Whatever the intentions of the colonial administration, it was vulnerable to capture by local elites. Lewis (2004, p. 104) writes of the governors's incentives: "To join with local white society meant a pleasant tour of duty, to fight them meant political conflict and social ostracism. Inevitably, [the governor] passed smoothly into the union, political and social, of government and vested interests." Craig-James (2000, p. 252) recounts a confrontation between Tobago' governor and its appointed legislators over land tax reform with the legislators forcing a salary cut to the governor instead of higher land taxes. If the threat of revolt played heavily on planters' minds before the constitutional changes, why was there no revolt against elite capture of the appointed legislature after the constitutional changes? While I cannot bring any evidence to bear on this, the economics and political science literature does suggest that political mobilizations requires a degree of coordination and that the mere absence of positive action is unlikely to provide the necessary coordinating focal points (Schelling (1980), Hacker and Pierson (2011), Acemoglu and Jackson (2011)).

3 Data Sources and Empirical Setup

3.1 Data

The main data source for this paper are the *British Colonial Blue Books*, annual statistical reports issued by each British colony. The first Blue Books were in the mid-1820s but contained very little data. The main data on local politicians starts in 1836 at the earliest. The Blue Books became a publication in the 1880s. For years before that, at most two copies exist of each Blue Book, one in the British National Archives in London and possibly one in the issuing colony's archives. For this project, large parts of the Blue Books had to be photographed and the data then manually processed. The main sections from the Blue Books are the *Comparative Tables of Revenue and Expenditure*, the *Political Franchise*, which reports the number of registered voters starting in 1854, and the *Councils and Assemblies*, which includes the names and election dates of all local politicians, reported by parish.

My measure of political competition is electoral turnover, calculate as the share of parliamen-

tary seats occupied by a non-incumbent after each general election. A preferred measure would be the entry of political newcomers. However, to accurately measure the flow of political newcomers, I need a stock of past politicians, something I cannot get from the Blue Books because this data source only starts in 1838.[12] For Jamaica, Roby (1831) compiled a list of all parliamentarians going back to the 17th century. This allows me to measure a stock of politicians and to calculate the flow of entrants into Jamaica's parliament at every election. Encouragingly, Figure 4 shows that political entry correlates strongly with my measure of political turnover. Additional evidence can be gleaned from secondary sources: For Jamaica, Hall (1959) compiled data on the expansion of smallholding from 1838 to 1848 for 19 Jamaican parishes. Plotting this against my measure of electoral turnover in Jamaica's 1849 election in Figure 5, I find a positive, albeit marginally insignificant, relationship.

Table 1 provides an overview of the data. It provides dates for both types of constitutional changes: Of the eleven colonies that switched towards Crown colony rule, only one colony, Jamaica, switched to full Crown colony rule directly. The other ten first switched to a semi-representative system and then, on average 6 years later, to full Crown colonial status.[13] Caribbean historians have argued pervasively that semi-representative government was seen by elites as an intermediate step meant to secure a majority for the full switch towards Crown Colony rule (Craig-James (2000, p 256), Brizan (1984, p 204)). There is very little data in the semi-representative state, making it difficult to exploit it separately. My approach is to treat the *first* constitutional change as the event of interest. In the Appendix, I explore both types of constitutional changes separately but find no evidence that Crown Colony status either changed things or needs a separate explanation relative to the semi-representative system.

The main data on constitutional changes is set up as duration data: For Bahamas, Bermuda and Barbados, which never transition, the constitutional change data is a series of zeros only. For the eleven colonies, that do switch, a series of zeros is ended by a single one, with which that colony's data ends. The main panel is set up as annual data because a constitutional change can occur in

[12] Without a stock, a constant rate of electoral turnover will mechanically show up as a higher share of political newcomers in the early years of the data, so long as some politicians rotate in and out of parliament, a prevalent pattern in the data.

[13] This process was quite heterogenous: four colonies switched to full Crown colony rule within thee years. The six-year average excludes Antigua and Dominica that retained the semi-representative system for several decades and switched after my data ends in 1895.

any year including in between elections. However, the political data on electoral turnover and the number of registered voters only changes with each electoral cycle. When the data is annual, I cluster all standard errors two ways at the electoral-cycle level as well as at the colony level. I also include specifications, in which I compress the data so that an electoral cycle is an observation. Because a constitutional change does not happen suddenly but needs to be proposed and voted on in the parliaments and then still enacted, I consider the main explanatory variables of electoral turnover and the number of voters with a one-period lag. Both of these features of the data are illustrated in Table 2 for Antigua's 1853, 1860 and 1867 elections.

3.2 Identification Strategy

The main hypothesis is that constitutional changes were initiated in response to the threat of increased political competition

$$\mathbf{CC}_{it} = \beta \mathbf{PC}_{it} + \phi_i + \varphi_t + \quad _{it} \tag{1}$$

where the dependant $\mathbf{CC}_{it}$ is an indicator that takes value 0 in all years except when the constitutional change occurs after which that colony's time series ends and $\mathbf{PC}_{it}$ is a measure of political competition. I can measure $\mathbf{PC}_{it}$ in two ways, with electoral turnover $\mathbf{ET}_{it}$ or with an expanding electorate as measured by the log of registered voters. My preferred way to organize the data is to think of these two regressions as a second stage (2S) and a reduced form (RF) relationship and to pursue an instrumental variable strategy in which I instrument electoral turnover with the log of registered voters in the first stage (FS):

$$\mathbf{ET}_{it} = \gamma \log(\text{reg. voters})_{it} + \phi_i + \varphi_t + \quad _{it} \tag{2}$$

the first reason for this way of organizing the data is that an expanding electorate should arguably lead to increased political competition though electoral turnover. The second reason for this framework is that both electoral turnover and the number of registered voters are noisy measures of political competition because turnover may well capture one elite-backed candidate being replaced by another and the because the number of registered voters may deviate significantly from the number of actual voters. As long as the noise in the two measures is i.i.d., I can mitigate the resulting attenuation bias in an IV setting. However, the log of voters is an invalid instrument

if the exclusion restriction is violated because, say, an increasing franchise signalled a future threat to elites even without immediately leading to increased electoral turnover. The IV set-up should therefore be viewed as an efficient way to organize the data more than anything and the IV results should be viewed in combination with the 2S, RF and FS regressions as one set of results that are together strongly supportive of the postulated channel. If the exclusion restriction on the instrument is not satisfied, this would not imply a bias in the 2S, RF and FS results.

The main threat to the validity of the results comes from unobservable pressure for constitutional changes that is correlated with either measure of $\mathbf{PC}_{it}$. Figure 3 suggests that network effects could be a source of bias if the idea of constitutional change simply perculated through the Caribbean. Another possibility is that over time, there was differential pressure for more direct control by the colonial administration. In particular, pressure may have increased after the Indian Mutiny of 1857. Increases in pressure for more direct control by the colonial administration may also have been more differentiated than that and increased in several waves. I control for these possibilities by sequentially including the number of already transitioned colonies, a post-1857 indicator and decadal dummies in the regressions as the control φ_t in (1).

When $\mathbf{PC}_{it}$ in (1) is measured by electoral turnover $\mathbf{ET}_{it}$, my preferred specification is to exclude colony fixed effects. One reason for this is that colony fixed effects would completely explain the data for the three colonies without constitutional changes, further reducing the cross-sectional sample from 14 to 11. A second reason is that electoral turnover as a share lies between 0 and 1 and is therefore comparable across colonies: A colony with lower electoral turnover should be less likely to have a constitutional change and this variation should not be discarded. The second regressor of interest is the log of registered voters. Unlike electoral turnover, the log of registered voters is not comparable across colonies and I therefore include colony fixed effects in my preferred RF and FS specifications.

Because constitutional changes are absorbing in that there is no reversal, I can study the effect of constitutional changes simply by testing for an effect of being in the changed regime on various aspects of public expenditure:

$$\mathrm{Exp}_{it} = \beta \mathbf{CC}_{it} + \gamma X_{it} + \varphi_t + \theta_i + \varepsilon_{it} \qquad (3)$$

Here I include colony fixed effects, some colony-time-varying controls like population size that should impact public expenditure, and time trends or year fixed effects φ_t. I focus on two aspects of public expenditure: One, I focus on total public expenditure to test whether relinquishing local control over taxation relaxed the colonial executive's spending . Two, I focus on educational expenditure, controlling for overall expenditure in X_{it}, to test whether pro-poor expenditure increased its budget share after the colonial administration took over.

4 Results

The discussion of the results is very incomplete.

4.1 Main Results

Table 3 provides the main results. Columns 1-4 are the 2nd stage (2S) results. Columns 1-2 have no colony fixed effects, my preferred specification because this does not disregard the three colonies without constitutional changes from the data. Columns 3-4 include colony fixed effects as a robustness check. Column 5 is the reduced form (RF), which has to include fixed effects because the log of registered is not a comparable measure in the cross-section. Column 6 is the first stage (RF), which also has to include fixed effects for the same reason. Unlike the reduced form, in the first stage the inclusion of fixed effects does not discard the three colonies without constitutional changes from the data because the fixed effects do not perfectly explain the variation in electoral turnover for any colonies. Columns 7-8 are the instrumental variable (IV) results. To account for the fact that there is no variation in the data within an electoral cycle, I cluster the standard errors in two dimensions: at the colony and the electoral cycle level. An alternative approach is to treat the electoral cycle as an observation. I do this in Panel B. In Table 4, I check for the robustness of these results to network effects, the number of already transitioned colonies, and to added colonial pressure, with an indicator that turns on after the Indian mutiny. Because both of these control variables vary within electoral cycle, I can add them only for the annual data set.

Table 5 explores the first-stage relationship at the parish-level, in a panel with a cross-section of over 100. This also allows me to include electoral cycle fixed effects at the colony level, controlling for any time varying unobservables that shifted the political balance for the colony as a whole.

The first stage relationship is strongly confirmed at the parish level, including both parish and electoral cycle fixed effects.

4.2 Effect of Constitutional Changes

Table 6 reports results of estimating equation (3). In columns 1 - 4, I run regressions on total public expenditure. In columns 5 - 8, I run regressions on public good expenditure on education specifically. Columns 1 and 5 include no time trends, columns 2-3 and 6-7 introduce a linear and then a quadratic time trend and columns 4 and 8 control for all time trends non-parametrically with year fixed effects. The estimates change with the the different time trend specifications. For total public good expenditure, column 1 seems to confirm the idea that Crown Colony status leads to increases in public expenditure. However, columns 2 and 3 show that this is likely entirely explained by a positive correlation with time trends of increasing public expenditure. When these are controlled for, the effect first disappears and is then even reversed. In column 4, the most flexible specification, the effect disappear. Overall, there is no convincing evidence that total public expenditure increased with regime switches towards Crown Colony rule. The results on educational spending are more clear-cut. Educational spending decreased and coercive spending increased with switches towards Crown Colony rule. This is completely contrary to the conventional wisdom that Crown Colony government shielded the people against elite policies. In combination with the previous results, this suggests that elites retained and possibly even strengthened their influence over the political decision making process.

4.3 Evidence for Elite Persistence

Given the results in Table 6, I look for direct evidence of elite access to the colonial administration after the constitutional changes. I calculate the share of appointed legislators whose families used to have representatives under the representative system and normalize time to the year of the switch towards direct colonial rule. Pooling these shares across the eleven colonies that switched, the blue line in Figure 6 shows that more than 80 percent of appointed legislators came from established political dynasties that had been present in the old legislatures. Next, I calculate for each appointed chamber a measure of the degree to which it represents the plantation economy. I take the 1834 slave-density of each parish from Higman (1995) and calculate an appointed chamber's

implicit "slave-density". In particular, I average over all parishes that a family had represented in parliament before constitutional changes to obtain a political dynasty's implied "slave-density" as a measure of the degree to which it represented the plantation interest. I take the average of this measure for every appointed chamber. Lastly, I normalize the resulting intensity by a colony's average slave density to get a measure of the degree to which the plantation interest is *disproportionably* represented. The resulting red line in Figure 6 depicts the degree of over-representation of the plantation-interest. This is striking: The implicit "slave-density" of the appointed legislatures is between twice and three times as high as it would be if former legislators had been appointed from a representative cross-section of each colony's voting parishes.

5 Discussion and Conclusion

This paper documents a unique series of 19th century constitutional changes in which parliaments voluntary limited or ceded their representative status. This historical episode provides an important counterexample to the broad trends of franchise expansion and increases in parliamentary powers during the 19th century. It provides a unique opportunity to study the political economy of colonial institutions, often thought to be an important determinant of long run economic development. I endogenize the constitutional changes and explain them as the response by local planter elites to the emergence of a new political class of freed slaves whose objectives ran counter to the plantation economy. I further provide evidence on public expenditure which suggests that local elites were able to continue their influence over policy after they gave up de jure powers. A possible explanation is increased de facto collective action and insider access to the colonial government. I study the identity of all elected and appointed politicians in the elective chambers before and after the constitutional changes to provide direct evidence on elite persistence. In combination, these finding illuminate the economic and political motivations behind a unique and important series of 19th constitutional changes. They illustrate the workings of colonial institutions provide an important illustration of a small minority's ability to use legal means and collective action to control economic and political resources against the remaining 95 percent of the population.

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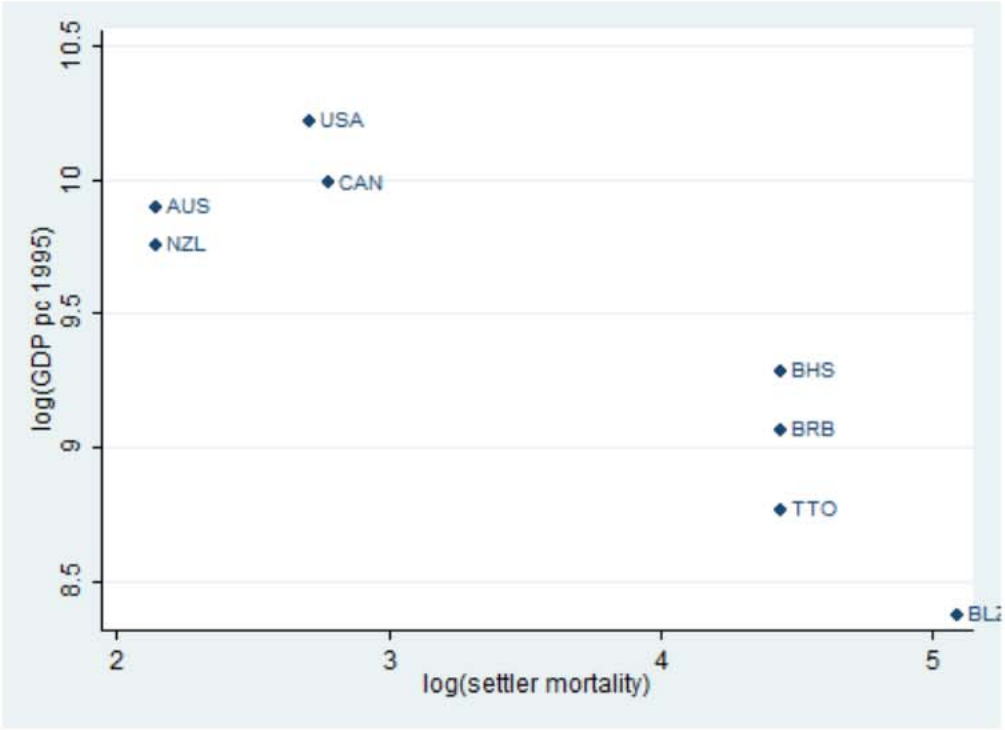


Figure 1: The Neo-Europes and the Caribbean in AJR 2001



Figure 2: The Neo-Europes and the Caribbean in AJR 2002

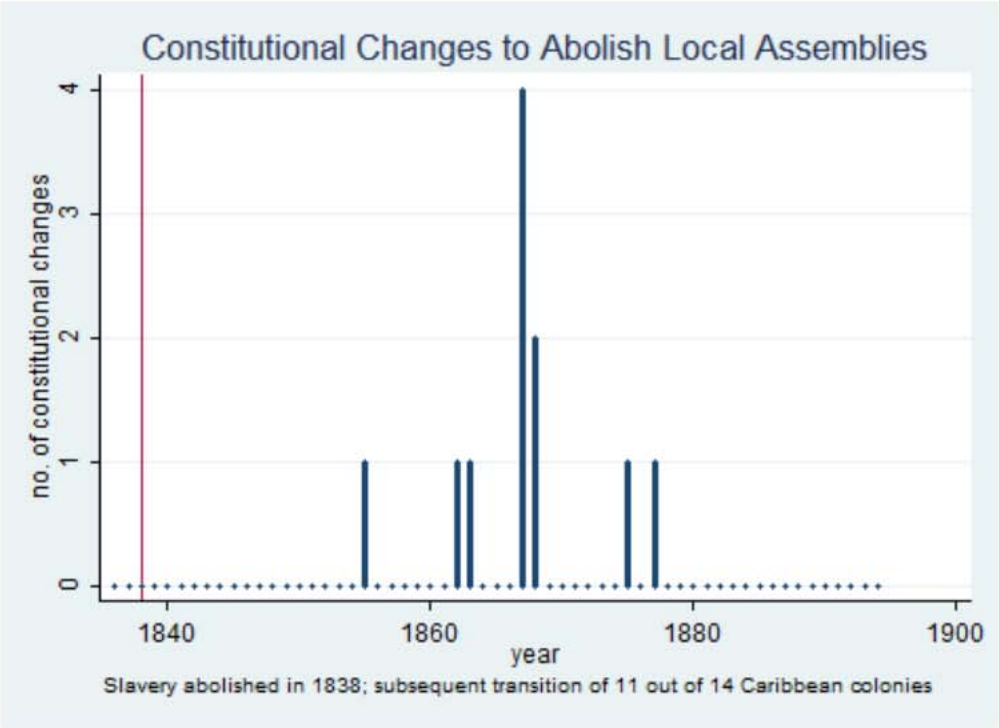


Figure 3: Timing of First Constitutional Changes

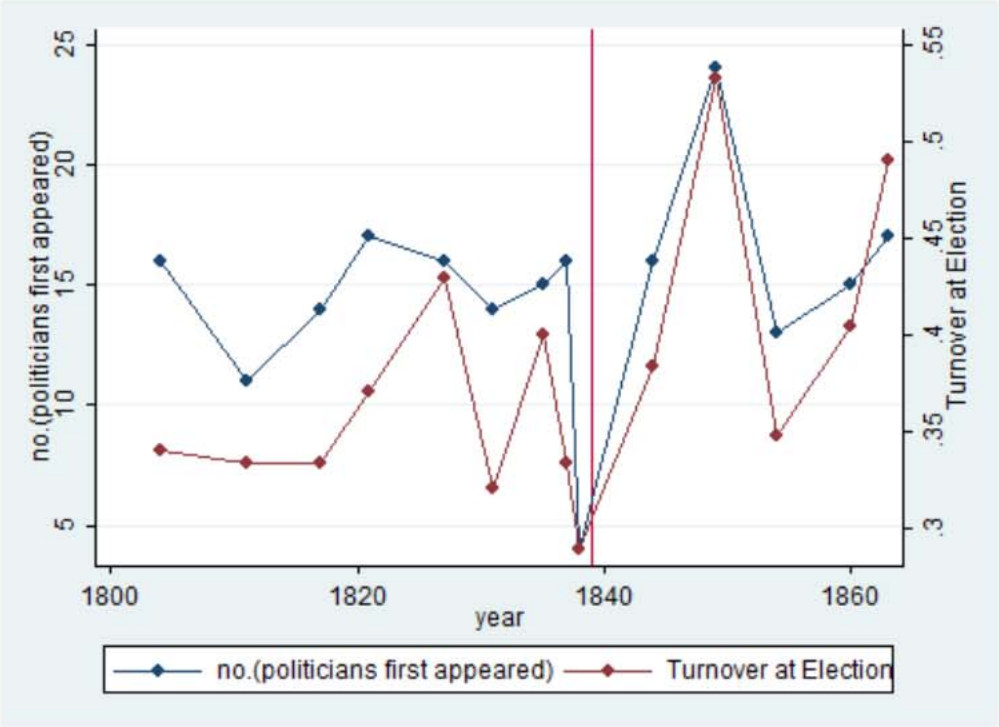


Figure 4: Electoral Turnover & Political Entry

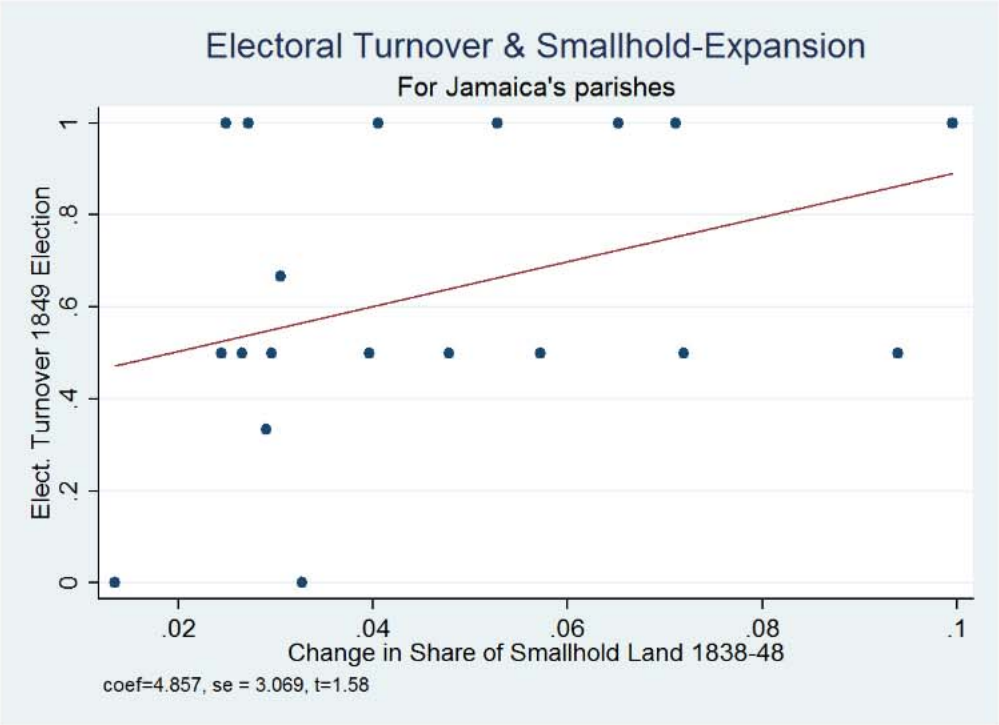


Figure 5: Electoral Turnover 1849 vs Smallhold-Expansion 1838-1848

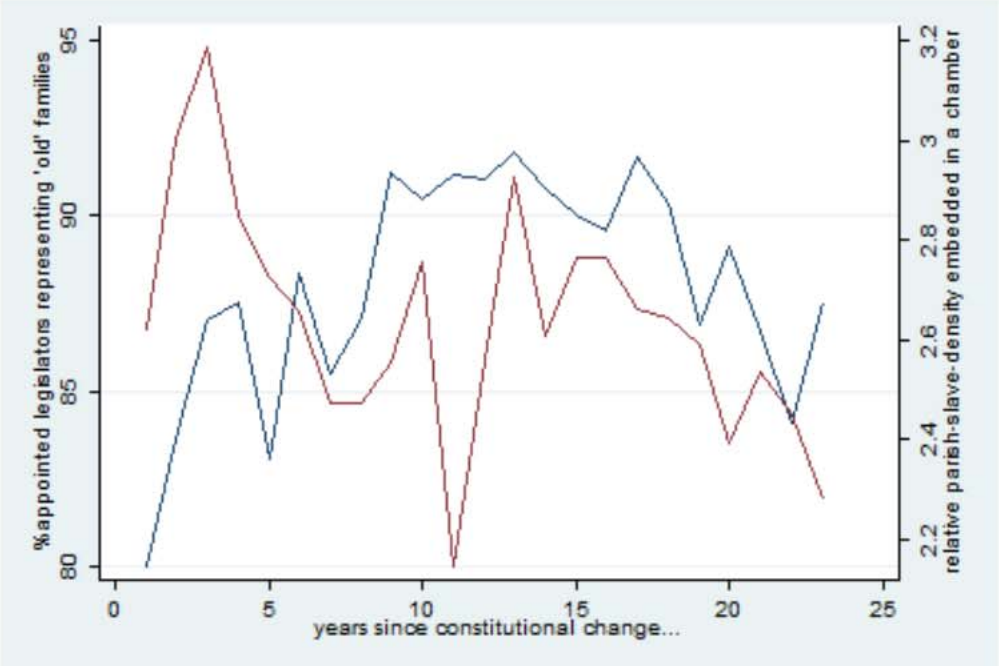


Figure 6: The identity of appointed legislators

Table 1: Comparison Table

Colony	Year Founded	Year since Semi-repr	Year since Crown Colony	Year since First Change	1838 Population	Area (sqkm)	Initial Density	1838 Sugar % of Exports
Antigua	1632	1867	1898	1867	35188	281	125	93
Bermuda	1612				8862	53	167	0
Bahamas	1650				20203	13461	2	10
Barbados	1629				105812	431	246	94
Dominica	1763	1867	1898	1867	16207	754	21	81
Grenada	1763	1877	1879	1877	17751	344	52	96
Br Guyana	1803	1803			66561	10750	6	80
Honduras	1638	1862	1871	1862	8235	22966	0	0
Jamaica	1655		1867	1867	381951	11100	34	74
Montserrat	1634	1863	1868	1863	6647	102	65	96
Nevis	1623	1867	1879	1867	7434	93	80	95
St Lucia	1803		1803		17005	620	27	79
St Kitts	1628	1867	1879	1867	21578	191	113	99
St Vincent	1763	1868	1876	1868	26659	389	69	96
Tobago	1763	1875	1878	1875	11456	300	38	100
Trinidad	1797		1797		34650	4787	7	88
Virgin Islands	1672	1855	1868	1855	7471	153	49	95

2 transitions in the Table fall outside of the present sample: Antigua and Dominica 1898. The 3 initial Crown colonies Br Guyana, St Lucia and Trinidad play almost no role in any of the empirics in this paper. Source of Transition Timing: Wrong (1923) Source of Other Data: *Colonial Blue Books*

Table 2: Illustrating Panel-Construction

Colony	Year	Const. Change	CC	Election	Electoral Turnover	ln(voters)	Electoral Turnover	ln(voters)
Antigua	1852		0				0.25	.
Antigua	1853		0	Yes	0.3	6.109	0.3	6.109
Antigua	1854		0				0.3	6.109
Antigua	1855		0				0.3	6.109
Antigua	1856		0				0.3	6.109
Antigua	1857		0				0.3	6.109
Antigua	1858		0				0.3	6.109
Antigua	1859		0				0.3	6.109
Antigua	1860		0	Yes	0.35	6.238	0.35	6.238
Antigua	1861		0				0.35	6.238
Antigua	1862		0				0.35	6.238
Antigua	1863		0				0.35	6.238
Antigua	1864		0				0.35	6.238
Antigua	1865		0				0.35	6.238
Antigua	1866		0				0.35	6.238
Antigua	1867	Yes	1	Yes	0.43	6.386	0.43	6.386

Table 3: Explaining Constitutional Changes

	2nd Stage				RF	FS	IV	
Panel A: Annual Data								
Dependent:	CC	CC	CC	CC	CC	Elect. Turnover	CC	CC
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Elect. Turnover	0.143***	0.312***	0.175**	0.319**			0.323***	1.099***
	(3.218)	(2.962)	(2.382)	(2.121)			(4.201)	(2.823)
log(registered voters)					0.097**	0.098***		
					(1.989)	(4.236)		
N	437	238	437	238	238	238	238	238
R^2	0.025	0.059	0.038	0.123	0.119	0.442		
Panel B: N = Electoral Cycles								
Elect. Turnover	0.356***	0.907***	0.427**	0.721***			1.089***	0.787
	(2.928)	(5.119)	(2.374)	(2.862)			(5.375)	(1.105)
log(registered voters)					0.087	0.111***		
					(0.867)	(2.853)		
N	168	86	168	86	86	86	86	86
R^2	0.077	0.221	0.141	0.313	0.247	0.516		
colony-fe 2nd Stage			fe	fe				fe
colony fe 1st Stage					fe	fe	fe	fe
Sample	Full		Full					

N = 437 is the data-set for which I observe Electoral Turnover. N = 238 is the data for which I observe the number of registered voters In Panel A, s.e. are two-way clustered at colony and electoral-cycle level. In Panel P, s.e. are clustered at colony level.

http://www.anderson.ucla.edu/faculty/christian.dippel/BWI_cc_paper.pdf

Table 4: Explaining Constitutional Changes

	Panel A: Controlling for Network Effects							
	2nd Stage				RF	FS	IV	
Dependent:	CC	CC	CC	CC	CC	Elect. Turnover	CC	CC
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Elect. Turnover	0.173***	0.355***	0.202***	0.294*			0.385***	0.527
	(3.276)	(2.970)	(2.579)	(1.816)			(3.099)	(0.858)
log(registered voters)					0.056	0.108***		
					(0.824)	(5.148)		
#(Colonies Transitioned)	0.005*	0.004	0.008**	0.012**	0.010	-0.003	0.004	0.012**
	(1.767)	(1.399)	(2.274)	(2.374)	(1.340)	(-0.526)	(1.280)	(1.975)
N	437	238	437	238	238	238	238	238
R^2	0.039	0.068	0.069	0.158	0.134	0.445		
	Panel B: Controlling for Added Colonial Pressure							
Elect. Turnover	0.176***	0.320***	0.188***	0.283*			0.341***	1.131
	(3.961)	(3.080)	(2.662)	(1.787)			(4.588)	(1.314)
log(registered voters)					0.076	0.078***		
					(1.124)	(3.523)		
post-1857	0.054***	0.053***	0.066***	0.073**	0.044	0.040	0.050**	-0.006
	(3.675)	(2.791)	(4.079)	(2.185)	(0.781)	(1.442)	(2.505)	(-0.057)
N	437	238	437	238	238	238	238	238
R^2	0.054	0.070	0.076	0.137	0.122	0.448		
colony-fe 2nd Stage			fe	fe				fe
colony fe 1st Stage					fe	fe	fe	fe
Sample	Full		Full					

N = 437 is the data-set for which I observe Electoral Turnover. N = 238 is the data for which I observe the number of registered voters s.e. are two-way clustered at colony and electoral-cycle level.

http://www.anderson.ucla.edu/faculty/christian.dippel/BWI_cc_paper.pdf

Table 5: First Stage at Parish-Level

Dependent:	Electoral Turnover	
	(1)	(2)
log(registered voters)	0.096***	0.107**
	(3.604)	(2.229)
parish-FE	Y	Y
election-colony-FE		Y
Observations	2,230	2,230
R2	0.369	0.469

Standard errors are two-way clustered at parish and colony-electoral-cycle level.

Table 6: Public Good Provision Around Constitutional Changes

	Dep: log(Total Exp)				Dep: log(Education-Exp.)			
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
D(Changed Constitution)	0.471***	0.087	-0.139**	-0.04	0.068	-0.388***	-0.258***	-0.232**
	(0.053)	(0.058)	(0.054)	(0.058)	(0.081)	(0.084)	(0.086)	(0.094)
log(Population)	1.918***	1.051***	1.190***	1.139***				
	(0.162)	(0.162)	(0.141)	(0.138)				
Year		0.026***	4.661***			0.037***	-3.306***	
		(0.002)	(0.386)			(0.004)	(0.709)	
Year squared			-0.001***				0.001***	
			0.000				0.000	
log(Total Other Exp.)					0.908***	0.420***	0.532***	0.547***
					(0.072)	(0.080)	(0.081)	(0.086)
Year-FE	No	No	No	Yes	No	No	No	Yes
Colony-FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Observations	448	448	448	448	448	448	448	448
R-squared	0.96	0.97	0.97	0.98	0.91	0.93	0.93	0.94

A Appendix

In the main part of the paper, I analyze only the first constitutional change, which means I treat Jamaica's direct switch to Crown colony rule the same as the other ten colonies switch to semi-representative government and I disregard the eight later switches from semi-representative to Crown colony rule. Here I explore both types of constitutional changes separately using Hazard rate models that can incorporate these different switches. Figure 7 displays the two waves of constitutional changes corresponding to the information in Table 1. Table 7 reports results from different duration models. Table 8 estimates equation (3) with two separate indicators for semi-representative and full Crown Colony rule.

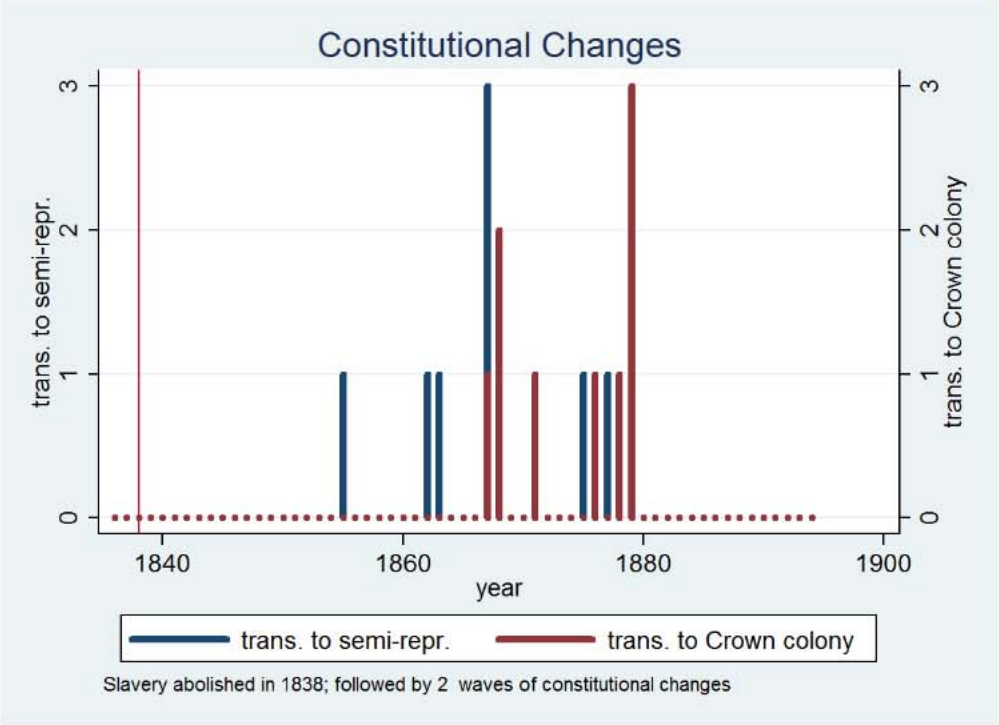


Figure 7: All Constitutional Changes

Table 7: Duration Analysis

	Cox Prop Haz		Anderson-Gilles		MRM	
L.Incumbent-Share	-3.929***	-4.158***	-3.997***	-4.504***	-3.847**	-2.887**
	(1.239)	(1.207)	(1.532)	(1.626)	(1.713)	(1.447)
year		0.207**		0.147**		-0.331***
		(0.105)		(0.063)		(0.090)
Observations	446	446	554	554	2202	2202
No(Transitions)	11	11	19	19	19	19
Types(Transition)	1	1	1	1	3	3

All s.e. are clusterd at colony-level, * significant at 10%; ** significant at 5%; *** significant at 1%.
In the Cox Proportional Hazard, only one transition can be modeled. This method therefore uses the same data as the linear probability one in the mina body of the text. In the Anderson-Gilles model, several transitions can be modeled so that switches from semi-representative to Crown rul can be incorpoarted together with switches to semi-representative rule. However, each transition is treated as the same. Anderson-Gilles is agnostic on a colony transitioning twice. In th Marginal Risk Model (MRM), several transitions can be incorporated and each type of transition is treated as different.

Table 8: Public Good Provision Around Constituional Changes

	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Separate Indicators for Semi-Representative and Crown Colonial Status			Dep: log(Total Exp)			Dep: log(Education-Exp.)		
D(Semi-Representative)	0.431***	0.099*	-0.134**	-0.03	-0.002	-0.374***	-0.229**	-0.199**
	-0.059	-0.06	-0.056	-0.058	-0.09	-0.088	-0.091	-0.098
D(Crown Colony)	0.528***	0.055	-0.153**	-0.075	0.141	-0.415***	-0.303***	-0.288***
	-0.064	-0.071	-0.064	-0.069	-0.091	-0.097	-0.097	-0.106
log(Population)	1.846***	1.068***	1.198***	1.162***				
	-0.168	-0.164	-0.142	-0.141				
Year		0.026***	4.654***			0.037***	-3.374***	
		-0.002	-0.386			-0.004	-0.713	
Year squared			-0.001***				0.001***	
			0				0	
log(Total Other Exp.)					0.897***	0.417***	0.528***	0.537***
					-0.073	-0.08	-0.081	-0.086
Year-FE	No	No	No	Yes	No	No	No	Yes
Colony-FE	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Observations	448	448	448	448	448	448	448	448
R-squared	0.96	0.97	0.97	0.98	0.92	0.93	0.94	0.94