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# Democracy as a middle ground: A unified theory of development and political regimes[☆]

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ABSTRACT

Although many of the worst performing countries over the post-World War II period were autocracies, many of the best were likewise autocratic. At the same time, no long-lived autocracy currently is rich whereas every long-lived democracy is. This paper proposes a theory to account for these observations that rests on the ideas that autocrats are heterogeneous and that elites experience lower land rents with industrialization. In a model calibrated to Britain's development, we show that elites democratize society only after the economy has accumulated enough wealth, and that the democratization date depends importantly on the history of rulers and distribution of land.



## 1. Introduction

A complicated picture of the relation between economic development and political development has emerged out of a vast and growing body of empirical work initiated in the 1990s. One puzzle turned up by this literature is the seemingly at odds relation between autocratic regimes and economic performance over the post-World War II period versus the past two centuries. Although many of the world's worst performing economies in terms of average annual growth rates over the postwar period were autocracies, many of the best likewise belonged to this set. Data spanning longer periods, in contrast, fail to show that autocracy is compatible with strong economic growth; whereas in 2000, every long-lived democracy had a living standard 50% or more of the US level, no long-lived autocracy (outside the oil exporters) achieved this feat. This finding reinforces the early research of Lipset (1959) documenting a strong, positive association between income levels and democracy in the very long run.

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How is it that autocracy can be associated with some of the largest increases in living standards in the postwar period, but with lower income in the very long run? This paper offers a theory to account for this puzzle. The theory combines two ideas that have been emphasized separately by others. The first idea, which is prevalent in the work of Sokoloff and Engerman (2000), is that land owners may seek to inhibit an economy's industrialization on account that it is accompanied by a decline in land rents. The second idea, which is prevalent in the work of Reynolds (1985), Delong and Shleifer (1993) and Jones and Olken (2005), is that autocrats are not all alike in their objectives and policies, with some more open to growth than others. When combined, these elements imply that democracy is a middle ground in terms of economic development as both faster and slower economic industrialization are possible in an autocracy. Importantly, these combined elements also imply that a nation will eventually democratize once it has become sufficiently wealthy. Thus, currently rich democracies are former autocracies that did not implement policy to slow down industrialization and capital accumulation.

In our model there are three possible types of autocratic rulers who differ in their preferences, and hence policy choices: a laissez-faire autocrat who does not allow for any government intervention in the economy; an elite autocrat who only cares about the welfare of the landed class and so purposely retards the nation's industrialization; and a selfish autocrat who expropriates as much capital as possible for his own personal use. The laissez-faire and selfish autocrats represent extremes in terms of development paths. A democracy, in contrast, will neither grow as fast as the laissez-faire autocracy nor as slow as the kleptocracy. It will not grow as fast as the laissez-faire autocracy because the median voter will want to redistribute capital and land, which have distortionary effects, and it will not grow as slow as the kleptocracy because the redistributive policies favored by the median-voter reduce a nation's inputs by less than the expropriated policy of a kleptocrat. Democracy, thus, represents a sort of middle ground.

The elite, who controls the nation's polity in our model, eventually democratize society because they expect a higher income net of taxes under a democracy than autocracy once the economy becomes sufficiently industrialized. This is not the case pre-industrialization when land rents represent the major component of the elites' income. More specifically, at early stages of development, democracy is particularly costly to the elite as the median voter always prefers to tax land at the highest rate possible. Autocracy, in contrast, is far less costly because only the kleptocracy reduces elite income, and this it does by confiscating capital, which is not an important source of income to the elite at this stage of development. Thus, at early stages of development, elite fare better under an autocracy, whether it be the laissez-faire type, elite type, or kleptocratic type.

This relationship changes with the economy's industrialization and accumulation of capital. As land rents decrease with industrialization, they become a smaller component of elite income relative to capital income. For this reason, the effect of the land reform implemented in a democracy on elite income diminishes. Moreover, although a democracy also reduces elite income by transferring some of their capital to peasant households, it is less effective in doing so than the kleptocrat. Thus, capital income and total elite income net of taxes are lower under a kleptocracy than democracy once the economy becomes sufficiently developed. Provided that the probability of drawing a bad autocrat is not too small, the expected income of the elite under autocracy will eventually fall below their expected income under democracy, at which point the elite will democratize society. Thus, according to the model, every currently rich country is a democracy whereas every long-lived autocracy is poor.

We illustrate our theory in a version of the Hansen and Prescott (2002) unified growth model, to which we add the political layer described above.[2] The Hansen and Prescott model gives rise to a Malthusian era with stagnant living standards and rising population, followed by an industrial revolution with slowly rising living standards, followed by a modern growth era with robust and constant increases in living standards: the Malthusian era corresponds to the use of a traditional technology that requires land as well as capital and labor inputs; the industrial revolution corresponds to the switch to the modern technology that requires only capital and labor inputs by some firms in the economy; and the modern growth era corresponds to the widespread use of the modern technology. The model is well suited for studying the issues at hand because it implies that landowners experience a decline in land rents as the economy industrializes.

We calibrate our unified model of growth and polity to the economic development path of Britain and demonstrate that the model matches its political development path reasonably well. In particular, we assign parameter values so that the model matches pre-1700 development observations, post-1900 modern growth observations and the starting date of the *Industrial Revolution*, and then examine the choice of the landed class to democratize society. We find that the landed class democratize society in 1920, which is roughly the year the franchise, was extended to all British citizens above the age of 21. Additionally, as our model predicts that a country's history of autocratic draws matters for the date it democratizes, we interpret Britain's pre-1920 history as one of being under the rule of laissez-faire autocrats and use the calibrated model to answer the question how much later Britain would have democratized if it had been instead ruled by kleptocrats. We find that a history of bad autocratic rulers would have delayed democratization in Britain by at least 60 years.

We also explore how industrialization and democratization dates are affected by a number of factors emphasized by other researchers, such as the distribution of land. We find that land distribution has significant implications for democratization, with a more equal distribution implying an earlier democratization date. The intuition for this is rather straightforward: with a more equitable distribution, land rents are a smaller component of each elite's income.

[2] Our paper clearly relates the unified growth literature that includes important papers such as Galor and Weil (2000), and Galor and Moav (2002).