

STATE CAPACITY AS POWER: A CONCEPTUAL FRAMEWORK

Johannes Lindvall and Jan Teorell

Lund University

April 7, 2017

Abstract: In reviewing existing definitions and theories of state capacity, we find most to be too teleological, too inductive, and too closely tailored to explaining particular outcomes. We argue that this limits the concept's applicability arbitrarily and impedes theory development. This paper proposes a new conceptualization of state capacity, defined as the strength of the causal relationship between the policies that states adopt and the outcomes they intend to achieve. We show that under this definition, a state's capacity can be conceptually distinguished from its autonomy (i.e., its regime). We then develop a theoretical argument about the relationship between the resources that states deploy when they implement policies – especially financial resources, human capital, and information – and the three main instruments that states rely on when they control territories and populations: coercion, economic incentives, and propaganda. We end by outlining the contours of a new research agenda on the state and its making that follows from this theory.

We are grateful to Jens Bartelson, Michael Bernhard, John Gerring, Anna Grzymala-Busse, Sören Henn, Jane Mansbridge, Jørgen Møller, Pippa Norris, and seminar participants at Boston University, Harvard University, Lund University, and the University of Gothenburg for their thoughtful comments on earlier drafts of this paper.

I. Introduction

State capacity has become a major research topic in the social sciences. A large and growing literature now argues that if we wish to explain long-run political changes and enduring differences in economic and political development among countries, we first need to understand how states become able to control their territories, raise revenue, establish effective bureaucracies, and deliver public services.¹

We argue that the existing literature on state capacity suffers from three related weaknesses. First of all, it typically treats the development of states in a particular region (Western Europe) and period (the modern era) as the benchmark of high state capacity. This inductive strategy makes sense if we merely wish to describe the most important empirical variation in the development of states, but it is not sufficient if we wish to build a theory of the origins and effects of state capacity. Second, individual studies of state capacity are typically concerned with how to explain particular economic, social, and political outcomes, and, relatedly, with the state's ability to perform particular functions. At times, this type of reasoning leads to the tautological conclusion that states achieving those outcomes, or performing those functions, are high-capacity states, which renders the concept of state capacity void of explanatory value. Third, and finally, the boundaries of the concept of state capacity are often blurred, resulting in confusion with related concepts such as the level of state autonomy, the nature of the political regime, and the quality of government.

We then argue that all of these weaknesses can be overcome by conceptualizing state capacity as a form of political power, and by developing a theoretical argument about the resources that states use to project such power. Our conceptualization is related to Michael Mann's concept of "infrastructural power" (1984), but we believe that our version is more precise (Mann never explicitly defines the concept of power; indeed, in the first volume of his magnum opus *The Sources of Social Power*, the closest that he comes to a definition of power is a brief referen-

¹ See, for example, World Bank (1997); Evans and Rauch (1999); Bockstette, Chanda and Putterman (2002); Fearon and Laitin (2003); Sobek (2010); Fukuyama (2011, 2014); and Besley and Persson (2011).

ce to Weber; see Mann 1986, 6). We also integrate the concept of state capacity in a broader theory of how states use administrative resources to enhance the effectiveness of the policy instruments they have at their disposal.

Our concept of “state capacity as power” is a narrow one, since it is exclusively concerned with the ability of states to coerce, bribe, or persuade members of society who would not otherwise comply with political decisions. Many sociologists and political scientists have argued, following Max Weber (1978 [1921]), that political authority does not only rely on raw power, but also on political “legitimacy,” which can be defined as an *internalized* motivation to comply.² We agree with this view. But we believe that legitimacy and state capacity should be treated as separate concepts. There is a complicated relationship between these two phenomena – both with respect to their historical co-evolution and with respect to their combined effects at any given moment – and if we include legitimacy in the *definition* of state capacity, that relationship becomes impossible to analyze.

Consider, for example, the dimension of political legitimacy that Margaret Levi (1988, 53) calls “quasi-voluntary compliance” – a disposition to comply with authority as long as the ruler can convince its subjects that a policy is “fair” in the sense that all citizens – or at least most of them – are expected to do their part. This plausible account of how political authority works depends on an analytical distinction between legitimacy and capacity (or power). “Quasi-voluntary compliance,” Levi writes, “rests on the effectiveness of sanctions when enough constituents are already cooperating. Rulers can then focus scarce resources on those constituents most likely to be noncompliant” (1988, 54). Legitimacy and power combine; they are not the same thing.³

II. Three Problems With the Literature on State Capacity

The first problem with the existing literature on state capacity is that it tends to treat the development of states in a particular region (Western Europe) during a

² On the larger importance of not losing the ideational or cultural dimensions of the state, see Mitchell (1991), Bourdieu (1994), Migdal (1997) and Vu (2010).

³ As Levi, Saks, and Tyler (2009) put it, “legitimacy reduces the transaction costs of governing by reducing reliance on coercion and monitoring.”

particular period (from the sixteenth century to the present) as an explicit or implicit benchmark of high state capacity. Francis Fukuyama's often-cited suggestion (2011, 2014) that we need to understand how to "get to Denmark" is one prominent example of this tendency. The drawback of this approach is that it encourages us to think teleologically ("How do you get to Denmark?") and inductively ("What have the Danes been up to?"). We believe that the way forward for the state-capacity research agenda is a different one – we wish to begin by reasoning conceptually and theoretically about what state capacity is, and what it requires.

The second problem with the existing literature is that it is typically concerned with explaining how states achieve particular economic, social, and political outcomes by performing particular functions. Economists are typically interested in the contribution of state capacity to sustained economic growth (Bockstette, Chanda, and Putterman 2002; Besley and Persson 2011). Scholars of war and civil war are typically interested in peace and conflict (Fearon and Laitin 2003; Sobek 2010). Scholars of environmental policy are typically interested in pollution and natural resource management (Schwartz 2003). Since different studies have examined different outcomes, they have also concentrated on different state functions, such as the ability to raise revenue ("fiscal" capacity) or to control territory ("coercive" capacity), not on state capacity in general.

The main drawback of this approach is that the research findings often become tautological. If we infer our measures of state capacity from observed outcomes, we cannot use the concept of state capacity to *explain* those outcomes. Moreover, when individual studies only emphasize those dimensions of state capacity that contribute to the particular outcome of interest, the development of more general theories of state capacity is inhibited. Finally, as we discuss further below, the outcome-by-outcome approach tends to understate the importance of one of the most consequential political developments in the past two hundred years: the widening *range* of government capacities, and therefore also of government activities, since the early nineteenth century.

We can illustrate these problems with reference to of the few studies that have attempted to develop a formal theory of state capacity: Besley's and Persson's *Pil-*

lars of Prosperity (2011). Besley and Persson introduce several important ideas, notably the key idea that we need to understand when and why political agents *invest* in state capacity. But their theory remains outcome-oriented and function-specific. The authors concentrate on two forms of state capacity, “fiscal” and “legal” capacity, since they are interested in is the capacity of states to “raise taxes” and “support markets,” and what they wish to understand, ultimately, is when states make investments in state capacity that are conducive to economic growth.⁴ For us, as for Besley and Persson, state capacity is about “capabilities that allow the state to take action.” But many of the actions that states take to promote economic growth are neither about “raising taxes” (fiscal capacity) nor about “providing regulation and legal services” (legal capacity). And states have many reasons to “take action” – promoting growth is an important reason, but it is not the only one.

The third problem with the existing literature is that the concept of state capacity is often poorly distinguished from other, related concepts. In the worst instances, the term state capacity becomes shorthand for *any* attributes of states that perform some explanatory function by predicting desirable outcomes (such as a high level of national income). One prominent example is the World Bank’s *World Development Report* from 1997, which should be credited for bringing the issue of state capacity onto the development agenda, but which lapsed into conceptual imprecision by equating state capacity with low levels of corruption and the adoption of specific policies that the World Bank approved of.

There are other, more subtle examples of the same tendency to blur concepts. Francis Fukuyama, for one, defines state (or “institutional”) capacity as “the abilities of states to plan and execute policies and to enforce laws cleanly and transparently” (2004, 7). Why “cleanly and transparently”? This part of Fukuyama’s definition brings to the fore another key element of state development, namely what Rothstein and Teorell (2008) call “quality of government.” In our view, the con-

⁴ Besley and Persson (2011, 6) also discuss, in passing, a third form of state capacity, which is related to “legal” capacity: “Is [the state] capable of raising private-sector productivity via physical services such as road transport or the provision of power?” But this “productive capability” of the state is not examined further the book.

cept of quality of government denotes procedural constraints on how state power is exercised; the concept of state capacity, by contrast, denotes the extent to which states *exercise power in the first place*. Using “state capacity” as an umbrella term for both concepts, as Fukuyama does, is analytically imprecise.

In response to these shortcomings in the literature, we wish to contribute to a theory of state capacity that does not start from the assumption that political institutions in a particular region – or during a particular period – represent the high point of state-capacity development. We also wish to avoid tailoring the theory to explaining how states perform particular functions or achieve particular objectives. Our argument, instead, is that a theory of state capacity should account for how state authorities deploy *resources* to use policy *instruments* to effectively exercise *power* over the population that resides in a given territory.

III. State Capacity as Power

At its most general level, the term state capacity refers to the state’s ability to “get things done.” There are several broad definitions in the literature that convey this general meaning: “the capacity of the state ... to implement logistically political decisions throughout the realm” (Mann 1984, 189); “the ability of state leaders to use the agencies of the state to get people in the society to do what they want them to do” (Migdal 1988, xiii); “the capacity to implement state-initiated policies” (Geddes 1994, 14); “the degree of control that state agents exercise over persons, activities, and resources within their government’s territorial jurisdiction” (McAdam, Tarrow, and Tilly 2001, 78); and “the ability of the state to effectively implement its chosen policies” (Soifer 2013, 2 n. 2).

We will in this paper have little to say about earlier efforts to conceptualize the state *as such*. We essentially agree with Weber (1978 [1921]), who defines the ideal type of a state as an organization that successfully claims monopoly over the legitimate use of force within a given territory.⁵ Our contribution, instead, is to

⁵ Levi (2002, 40) argues that monopoly over violence is a “variable,” not an element of a definition, and instead adds “formal international recognition” as a definitional requirement for the state in order to “exclude statelike organizations such as the mafia.” Following Nettl (1968), we argue that state power can, at least in principle, vary independently in different dimensions, where con-

focus attention on a premise that is rarely spelled out in other accounts of state capacity – namely that in politics, “getting things done” almost always involves the projection and exercise of power.

Following Dahl (1957), we define power in the following manner: “A has power over *B* to the extent that he can get *B* to do something that *B* would not otherwise do,” where *A* is the state (or agents of the state) and *B* is society (or members of society).⁶

Since we wish to conceptualize state capacity as a *causal* relationship between public policies on the one hand and economic, political, and social outcomes on the other, we rely on Dahl’s conception of power for a particular reason: it fits neatly with the most widely supported theory of causality in the social sciences today – the “counterfactual theory of causality” (Collins et al. 2004; Woodward 2003) or, as it is sometimes (and perhaps more accurately) called, the “unobserved-outcomes model of causal inference” (Pearl 2000; Morgan and Winship 2007; Imbens and Rubin 2015). According to this theory of causality, the defining feature of a causal process is that if the cause had been absent, the effect would also be absent. It is a probabilistic theory of causality, treating deterministic relationships (in which an effect always follows from a cause) as a limiting and unusual case. It is also a potentially singular theory of causality, which can, in principle, be applied to discrete, or even unique, events – it does not necessarily invoke claims to universality (or even generality).

trol over the means of violence is only one, and one that many statelike organizations are not very successful at. Yet we still agree with Weber that, in combination with territoriality, the *claim* for monopoly of violence is the one dimension of state power that distinguishes states from other power-wielding organizations. What the lack of “formal international recognition” does to the mafia is in effect to challenge its monopoly over the legitimate use of force within its claimed territory.

⁶ Dahl’s original formulation, and even more importantly his way of operationalizing this concept by determining whose preferences prevailed in instances of open conflict (Dahl 1961), gave rise to a huge literature on the “faces of power” (see especially Bachrach and Baratz 1970, Lukes 1974, and Gaventa 1979). In our reading, this literature is mainly concerned with how power should be *measured*, and with how the choice of measurement influences the results of empirical studies of the distribution of power in a particular country (the United States). We will therefore have little to say about the problems raised by that literature here (for reviews of the broad similarities between the “three faces”, see Isaac 1987, chapter 1, and Pierson 2015, 125–131).

The connection to Dahl's (1957) concept of power should be obvious: Dahl's concept relies directly on counterfactual claims (what "B would not otherwise do"); is probabilistic rather than deterministic ("to the extent that"); and involves relationships among a specific combination of actors (in the simplest model, A and B).

Although it is expressed in relational terms, this concept of power does not depend on the sort of behaviorist empiricism that is criticized by Isaac (1987). Moreover, there is no inherent conflict between this concept of power and the idea that power should be seen as "an enduring capacity to act" (Isaac 1987, 72). Power, as Dahl defines it, cannot be directly observed, only *inferred* from instances where it is exercised, which has important implications for our discussion of state capacity.⁷

As Hillel Soifer has argued (2008, 239), the sort of concept of power that we rely on also lends itself naturally to an analysis of intentionality. A state's capacity to do something has little explanatory value if the state does not in some sense desire or hold a "positive attitude" toward that something (White 1971). We therefore restrict our analysis to *intended* outcomes of state actions. This has some important ramifications. It becomes inherently difficult, for example, to compare the level of state capacity across states that are governed by leaders with vastly different ideological dispositions. We return to this problem in our concluding discussion.

Power is the first building block of our analysis; the second is the concept of *policy instruments*. When states try to "get things done" – that is, when they try to make members of society do things that they would not otherwise do – they use one or more policy instruments, or tools. Those instruments come in three basic varieties, which Mann (1984, 193) calls "military," "economic," and "ideological" power, and which Bemelmans-Videc et al. (1998) refer to as "sticks" (coercion), "carrots" (economic incentives), and "sermons" (propaganda).

⁷ This leads us to question the common distinction between "power over" and "power to" (Isaac 1987; Morriss 1987). Essentially, we believe that making "power to" completely distinct from "power over" only makes sense, if ever, in the context of man's relationship with nature. In politics, all forms of power are, in some sense, "power over."

To see the distinction between these three types of policy instruments, imagine that the state would like to make sure that as many citizens as possible do y (pay their taxes, say), although many citizens in fact prefer to do $\sim y$ (evade their taxes). The state can achieve this outcome in three different ways.

The state can punish citizens that do $\sim y$, so that the benefit of doing y is greater than the benefit of doing $\sim y$ minus the cost of being punished – or in other words, so that:

$$u(y) > u(\sim y) - u(\text{punishment}),$$

where u is a utility function. This is the type of policy instrument that Mann (1984) calls “military power” and that Bemelmans-Videc et al. (1998) call “sticks” (and that Weber calls “violence”).

Alternatively, the state can reward citizens that do y , so that the benefit of doing y plus the reward makes citizens better off than doing $\sim y$, or, in other words, so that:

$$u(y) + u(\text{reward}) > u(\sim y).$$

This is the policy instrument that Mann (1984) calls “economic power” and that Bemelmans-Videc et al. (1998) call “carrots.”

The third option is to use persuasion or propaganda to change the preferences of the citizens, so that the (subjective) benefit of doing y becomes greater than the benefit of doing $\sim y$.⁸ In formal terms, this means that the utility functions of the citizens change from u to u^* , ensuring that:

$$u^*(y) > u^*(\sim y).$$

⁸ We distinguish between persuasion and propaganda: persuasion is non-manipulative; propaganda is manipulative. Both are instruments that the state can use, but they have very different normative connotations. We are grateful to Jane Mansbridge for pointing this out.

This is the policy instrument that Mann (1994) calls “ideological power” and that Bemelmans-Videc et al. (1998) call “sermons” (and that Lukes 1974 calls the “third face of power”).⁹

It is important to note the distinction between political legitimacy (an internalized motivation to obey) and ideological power (“sermons”). In our analysis, an internalized motivation to obey is represented by the form of the utility function u , which we take as given, since we keep the problem of legitimacy separate from the problem of state capacity: if the government is seen as legitimate, the distance between what members of society are intrinsically motivated to do and what the agents of the state try to make them do is smaller, reducing the need for the exercise of power. The use of ideological power, by contrast, is a deliberate attempt to change the preferences of the citizens in order to increase compliance. The effect is the same – the “distance” between what the government wants and what the citizens are disposed to do decreases – but the causes are very different.¹⁰

To sum up the argument so far, we want to think of state capacity as the power of the state’s agents to get members of society to do things that they would not otherwise do, and we think of policy instruments as the means, or tools, that states use to exercise such power. More formally, we think of a state as an organization that implements a vector of policies (bundles of policy instruments), \mathbf{p} , in order to achieve a vector of outcomes \mathbf{y} , and we think of state capacity as the strength of the causal relationship between \mathbf{p} and \mathbf{y} . When the government of a high-capacity state decides to adopt the policy p in order to achieve the outcome y , it is more likely to be successful than the government of a low-capacity state would be, if it adopted the same policy.¹¹

⁹ It is in principle possible to think of other ways for A to make B do y . For example, A can sometimes make it impossible for B to achieve $\sim y$, removing $\sim y$ from the menu of options that B chooses from. But it should be possible, nevertheless, to sort all such possibilities under the three main headings of coercion, incentives, or propaganda. (The example we just mentioned, for instance, can be seen as a form of coercion; see Moe 2005, 227.)

¹⁰ If citizens change their preferences ($u \rightarrow u^*$) as the result of a process of democratic deliberation, we do *not* treat that event as an exercise of state capacity. But if citizens change their preferences as the result of a government program that is design to promote certain ideas and values, we do treat that event as an exercise of state capacity.

¹¹ Using standard notation, we use boldface to denote vectors: \mathbf{p} are all the policies that the state seeks to implement; p is an individual policy.

IV. Capacity and Autonomy

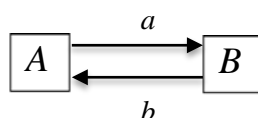
Our definition of state capacity helps to clarify the commonly blurred distinction between state *capacity* and state *autonomy*. As Soifer and vom Hau point out in their work on the state's infrastructural power (2008, 200), there is a long-standing, mostly post-Marxist, research program that inquires into "the relative autonomy of the state from societal actors." According to classical Marxism, the state is merely a superstructure that reflects the underlying economic structure and its patterns of ownership; it is not autonomous from economic elites (such as the bourgeoisie under capitalism). According to a series of influential studies from the 1970s and 1980s that sought to "bring the state back in," however, the state has enough autonomy to set its own priorities (Skocpol 1979, 1985; Evans 1995). The thrust of these state-centric arguments was to show that the state as such mattered for key societal outcomes such as economic development and public policy. In other words, state autonomy was seen as a prerequisite for state capacity.

In our view, the analytical categories of autonomy and capacity need to be kept separate. In order to distinguish the two, we would like to draw an analogy with the concept of judicial independence. On the one hand, judicial independence is a form of autonomy. Following Ríos-Figueroa and Staton (2014, 107), judicial independence can be defined as "a causal relationship between judicial preferences and outcomes" (so that "what judges think sincerely about the record controls the outcomes of their cases"). But judicial independence also requires *influence*, or, in other words, "that there is a causal relationship between how judges think the underlying conflict they are adjudicating should be resolved and how it is resolved in practice." The autonomy criterion requires that judges are not *controlled*, the influence criterion that they *themselves are in control* (so that their decisions are not "routinely ignored or poorly implemented").

The state apparatus can be subjected to the same twin criteria: its *autonomy* reflects the extent to which it is not controlled by external forces; its *capacity* reflects the extent to which it controls the outcomes it attempts to achieve. These relationships can be pictured in a bidirectional causal diagram (Figure 1). Let the

state be A , and let B be some combination of individuals or groups in civil society. State capacity then implies a causal arrow pointing from A to B ($a > 0$). State autonomy, by contrast, implies the *absence* of a causal arrow point from B to A ($b = 0$).

FIGURE 1. Capacity vs. Autonomy



We have already alluded to the close correspondence between the concept of state capacity that we propose and what Mann calls “infrastructural power.” There is however also a close correspondence between our conception of state “autonomy” and what Michael Mann (1984) calls the “despotic power” of the state (if the state is autonomous, its despotic power is high; if the state is not autonomous, so that $b > 0$, despotic power is low). In the words of Soifer and vom Hau (2008, 223), “[t]he state’s despotic power refers to the range of policies that it can order: in Mann’s analogy from *Alice in Wonderland*, the despotic power of the Red Queen refers to her ability to *order* one’s head to be cut off.” Infrastructural power, by contrast, “captures the ability of the Red Queen to hunt down Alice.”

One of the points of this argument is that despotic power and infrastructural power are not different *kinds* of power. Both despotic and infrastructural power are powers in the counterfactual-causal sense defined by Dahl. The difference is in the *direction* of the power relationship, not in the nature of power. In the figure above, despotic power is low when B (society) can get A (the state) to do something that A would not otherwise do; infrastructural power – or state capacity – is high when A (the state) can get B (society, or, in any event, members of society) to do what B would not otherwise do. In other words, the reason that most of us think of infrastructural power as a “nicer” form of power is not that infrastructural power does not involve coercion or other forms of control (“carrots” and “ser-

mons”); the reason is that most of us have a strong preference for political systems with low levels of despotic power.

Another implication of our argument is that what defines a free society – with a democratic, constitutional government – is not necessarily that infrastructural power or state capacity are constrained (in other words, that a is low); what democratic, constitutional government requires is that the exercise of infrastructural power is matched and controlled by a flow of power in the other direction ($a \approx b$) (see also Pettit 2012). Habermas (1996, 150) puts it well: “We can ... interpret the idea of the constitutional state in general as the requirement that the administrative system, which is steered through the power code, be tied to the lawmaking communicative power ... Administrative power should not reproduce itself on its own terms but should only be permitted to regenerate from the conversion of communicative power.” Another way of expressing the same idea is this (using the terms in Figure 1): What turns us from subjects to citizens is not that a is low, but that b is high.

Mann’s concept of despotic power and the concept of state autonomy are both intimately related to the concept of a political “regime.” Following O’Donnell (2001, 14), we can define a regime as “the patterns, formal or informal and explicit or implicit, that determine the channels of access to principal governmental positions.” If we for the sake of argument use O’Donnell’s concept of “government” interchangeably with the concept of a “state,” a “regime” is primarily defined by who controls the state. In other words, the regime question is a question of state autonomy.¹²

Consider a democratic regime, for example. At its most general level, “rule by the people” must imply that at least a minimal amount of control over the state is exercised by the citizens. In a direct democracy, that control is more or less perfect: what the state “wants” is directly determined by the collective decision of the citizens. In a representative democracy, control over the state is more indirect. As

¹² This is not to say that all regime typologies exclusively refer to the pathways determining access to power. Linz (2000) for example defined an authoritarian state also in terms of how power was exercised. Many regime conceptions, moreover, also takes the social identity of the “ruling elite” into account.

a minimum, however, representative democracy implies that citizens exercise some amount of control over the personnel occupying key state positions, which may or may not imply control over the actual *policies* that are pursued (Hadenius 1992, 14).

The political regime (and, more generally, the manner in which states and societies interact) also affects the degree of legitimacy that political leaders and states enjoy. Since legitimacy is an internalized motivation to obey, the ability of states to make citizens comply depends, at least indirectly, on the political regime and the state's autonomy, not only on state capacity narrowly defined. As we argued in the introduction, however, it is best to treat legitimacy and state capacity as distinct concepts. Only then will we be able to examine the interactive effect of legitimacy and state capacity on political outcomes, and their historical co-evolution.¹³

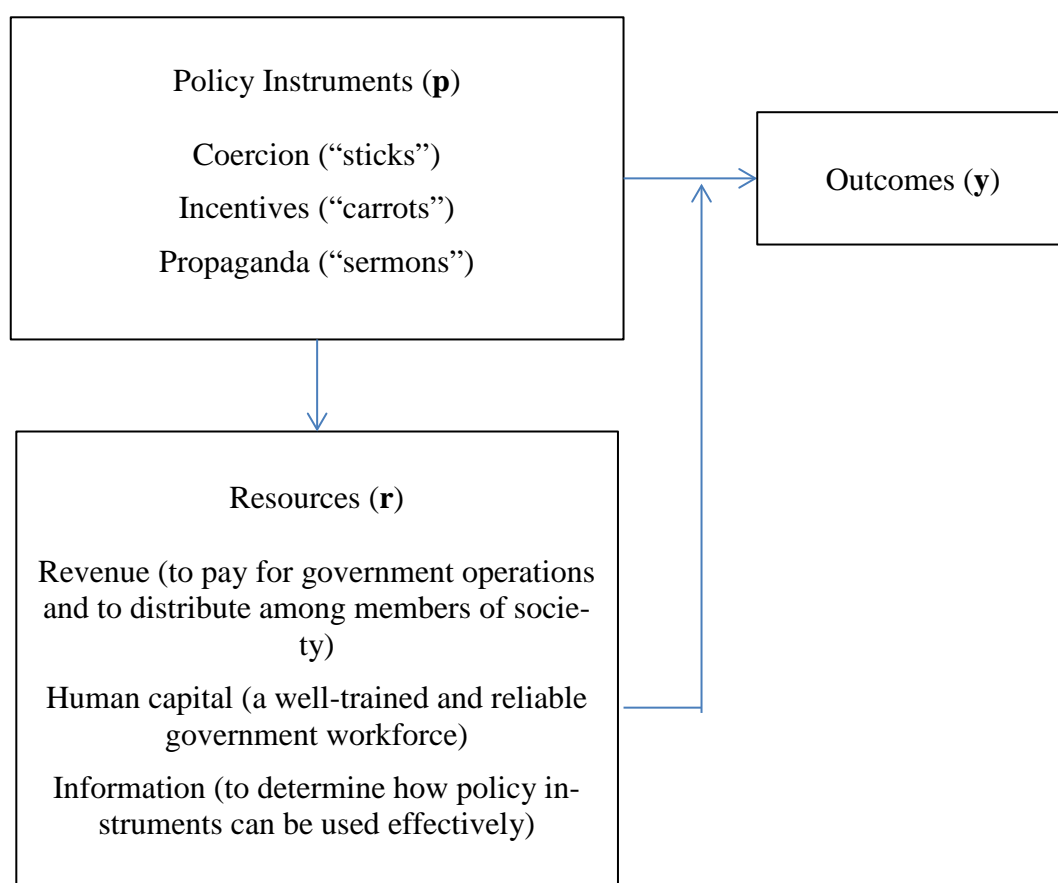
V. Toward a Theory of State Capacity

We have argued that state capacity should be conceptualized as a form of political power. Specifically, we have defined state capacity as the strength of the causal relationship between policy instruments (**p**) and the intended outcomes of public policies (**y**). We now introduce the third building block in our analysis: the *resources* that states deploy to increase the effect of **p** on **y**. We denote those resources **r**. In other words, the causal relationship between **p** and **y** – which, again, is how we define state capacity – is *conditioned* by **r**. In theory, **r** represents all the assets that the state can deploy in order to use policy instruments more effectively – or, in other words, all resources that the state can employ in order to improve the way it coerces (“sticks”), bribes (“carrots”), or persuades

¹³ We believe that our narrow focus on the power of (agents of) the state over (members of) society is justified even if the ability of governments and state agencies to foster cooperative relationships with civil society is essential for the implementation of many types of public policies (this is a point that is made strongly by Joel S. Migdal in his book *Strong Societies and Weak States*, 1988, which observes that states that seem strong at first sight are often ineffective due to the nature of state-society relationships). The ability of governments and state agencies to foster cooperative relationships is not independent of state capacity. Scholars of neocorporatism in Western Europe have shown, for instance, that corporatist bargains between states and interest organizations depend on the power of the state for their formulation and enforcement (Hemerijck and Vail 2005).

(“sermons”). The most important types of resources are *revenue* (the level of government income), *human capital* (the quality of the government’s workforce), and *information* (to determine how policy instrument can be used most effectively). This argument is summarized in Figure 2.

FIGURE 2: Resources, Policy Instruments, and Policy Outcomes



Revenue (in money or equivalent resources) is important since implementing policies is costly. The more financial resources a state controls, the more policemen and judges it can hire to enforce the laws (sticks), the more it can spend on transfers and services (carrots), and the more propaganda it can produce (sermons). Since this factor is so important, “fiscal capacity,” the state’s ability to raise revenue, is often taken to be a particularly important dimension of state capacity.

But revenue is not all. Agents of the state need specialized knowledge to perform their functions well, especially in modern, functionally differentiated states. The human capital inherent in a modern, professionalized bureaucracy is therefore necessary for the effectiveness of government operations, putting a premium on administrative institutions in which officials are selected on the basis of education and training and rewarded for loyalty and effectiveness. High-quality administrative institutions cannot be created from scratch within a short period of time, which is why this second factor cannot be reduced to the first factor (revenue) – human capital is an asset that states need to accumulate over time.¹⁴

Just as a firm does not only depend on capital and labor but also on ideas, a state needs more than revenue and a well-trained workforce: it also needs up-to-date information about the society, the territory, and the population that it governs. Without information, the agents of the state cannot determine how to use policy instruments effectively. This is why social-science classics such as James Scott's *Seeing Like a State* (1998) – a study of how states make societies “legible” – have emphasized the importance of information-gathering institutions for the development of the modern state (on this point, see also Lee and Zhang 2016 and Brambor et al. 2016).

To theorize state capacity is therefore to examine the relationship between these sorts of resources that states use to increase their capacity to implement policies (**r**) and the policy instruments that states rely on (**p**). The sorts of resources that are required to use “carrots” and “sermons” effectively are different from the sorts of resources that are required to use “sticks” effectively, which tells us something important about the specific nature of power in modern societies. Fol-

¹⁴ Defining the state as an organization implies that we do not assume that the state is a unitary actor. Sometimes the state is better viewed as an arena where a range of actors struggles for mastery (Skocpol 1985). The most important relationship that we would need to account for, if we opened up the black box of the “state,” is arguably the relationship between the government (the “rulers” or “politicians”) and the bureaucracy (the “state administrators”). A more elaborate analysis of state capacity would require a theory of the *tripartite* relationship between the government, the bureaucracy and society (instead of the *binary* relationship described in Figure 2). We leave that for another day, however. In this paper, we do not examine the *intra-state* power relationship between the government and the bureaucracy. Instead, we treat the bureaucracy as a resource that “the state” can employ in order to achieve its goals.

lowing Weber (1978[1921]), the most basic instrument of power is violence, or coercion. But modern states rarely use large-scale violence (Pinker 2011). We need to explain why states have become able to govern their populations *without* resorting to the open display of force.

To use *sticks* effectively, the state needs to control the means of violence (police forces, prisons, etc.) and, returning to our earlier formalization, it needs to be able to separate those who do y from those who do $\sim y$ (in order to punish the latter). Coercion is the crudest way of exercising state power. It is relatively simple to do – once a state controls the means of violence – but it is also a method that has many limitations. Most importantly, it is not possible to use coercion when the outcome is difficult to observe (when it is difficult to separate those who comply from those who do not comply).

To use *carrots* effectively, the state needs detailed information about the motivations and incomes of individual citizens (it needs to know *how* to incentivize individuals), it needs to have access to policy instruments that can be used to provide incentives (tax-and-transfer systems and services that are sufficiently sophisticated to reward those who comply), and, most importantly, it needs material resources (revenue) that can be distributed to this end. But once incentives *are* structured effectively, it may not be necessary to monitor each individual case (which is necessary to do when using coercion). The best incentive systems are self-sustaining, in the sense that citizens who do y are rewarded *automatically* (in other words, it is not necessary for an agent of the state to make a discrete decision). Using carrots thus requires a more complex set of resources than using sticks, but it is a much more flexible instrument than coercive power.

To use *sermons* effectively, the state needs to have access to the means of communication and knowledge transfer.¹⁵ It also needs to have a good model of the population's psychological dispositions (state agents need to know which “buttons to push”). Sermons have the advantage over carrots and sticks that they require no information at all about which citizens actually do y and which citizens actually

¹⁵ Historically, the school system was of crucial importance in this respect, which is why the political control of primary education was one of the most salient political issues in domestic politics in the nineteenth and early twentieth centuries (see Ansell and Lindvall 2013).

do ~y. On the other hand, there are good reasons to believe that it is a difficult instrument to use – especially in a pluralistic society where the state does not enjoy a monopoly on the means of communication.

State capacity is often understood, explicitly or implicitly, as a single variable that is strictly increasing in the resources that states have at their disposal. Our argument suggests, however, that the most significant change in state capacity in the world’s most developed regions during the past two hundred years is not that the state does *more*, in a quantitative sense – it is that the state does *many different things*. In particular – as we have already mentioned – the late-modern state relies much less on “sticks” than states have historically, and much more on “carrots” and “sermons.” We argue that the great increase in the power resources that states control – both in terms of the volume of their combined resources and the diversity of those resources – has made it possible for the state to use non-coercive means of control more effectively. In a recent paper, d’Arcy and Nistotskaya (2016) argue that states need both “teeth” (coercion, an instrument) and “eyes” (information, a resource). That is absolutely correct – but we would add as an important qualification that high-capacity modern states command such a wide range of resources that they rarely need to bare their teeth at all.

This type of analysis reveals, in our view, what is distinctive about the development of state power in industrial, high-growth societies. “Industrial society,” Gellner argues in *Nations and Nationalism* (2008, 22), “is the only society ever to live by and rely on sustained and perpetual growth, on an expected and continuous improvement. ... Its favored mode of social control is universal Danegeld, buying off social aggression with material enhancement.” Our take on this important point is that the increase in the economic strength of the state in the modern economy, combined with the emergence of professional bureaucracies capable of administering tax systems, social insurance systems, and other public programs, has encouraged the widespread use of “carrots” rather than “sticks” as the main method of achieving desired political outcomes.

Figure 2 also illustrates Besleys and Perssons fundamental insight (2011) that state capacity today is a result of investments made by past governments – the re-

sources that states use to increase the effectiveness of government policies *today* (strengthening the causal relationship between **p** and **y** in the present) are the results of policy choices made *yesterday*. Following the logic of Besley's and Persson's argument, we can think of a government as making a choice, at each point in time, between using resources and policy instruments to achieve the policy outcomes that the government desires at time t or to invest in *new* resources that can be used at time $t + 1$ to improve the effectiveness of the policies that the government adopts then. As Pierson (2015, 130) argues, "The exercise of authority is not just an exercise of power; it is potentially a way of generating power." This is one reason why the development of state capacity tends to be path-dependent: early gains can be reinvested to further improve state capacity in the future.

What we add to Besley's and Persson's general account of investments in state capacity is the idea that there are three basic types of political resources that can be used to enhance the effectiveness of the three basic types of policy instruments that are available to governments. Investments in state capacity are investments in *specific resources*. Since there is an intimate relationship between resources and instruments – the resources are not neutral, but more useful for the exercise of some forms of power than others – this means that we should not think of political leaders as investing in state capacity in general, but as investing in certain aspects, or dimensions, of state capacity.

VI. Conclusion

We have argued in this paper that the main weaknesses and inconsistencies in the existing literature on state capacity can be overcome by conceptualizing state capacity as a form of political power, and by developing a theory about the resources and instruments that are required to project such power. By way of conclusion, we propose three areas of future study where we believe our argument will feel its deepest impact.

The first concerns the conceptualization of the state and its constituent dimensions. The most effective type of state is one that is able to select among a broad range of policies (**p**), which it can implement equally well, to attain a broad

range of outcomes (**y**). But the strength of the relationship between **p** and **y** is likely to vary across policy instruments and outcomes – no state implements all kinds of policies equally effectively, or achieves all outcomes equally effectively. As Fukuyama (2004) has noted, some states are highly effective in some areas, but not in others. This opens up the questions of whether there are different dimensions of state capacity. Or in other words, whether there are different bundles of policies and outcomes that tend to share certain attributes or sources of variation.

One distinction that is commonly made in the literature is that between *coercive*, *extractive* and *administrative* capacity (Soifer 2012; Hanson and Sigman 2013). Coercive capacity typically includes the “Weberian core”: the monopoly of violence within a given territory. Extractive capacity is similar to what we have called “fiscal” capacity (the ability to raise revenue). Administrative capacity is somewhat more loosely defined, but could perhaps be thought of as the “productivity” of the state’s personnel. From our perspective, this way of differentiating between different dimensions of state capacity rests on a category mistake: we count “coercive” capacity as a *policy instrument*, “administrative” capacity as a *resource* that states use to improve the effectiveness of policy instruments, and “extractive” capacity as a way of *generating new resources*.

More generally, we believe that many of the existing typologies of capacities fail to differentiate between *means* and *ends*, and we believe that our concept of state capacity as power helps to organize the analysis in more fruitful ways. In fact, existing typologies do not only fail to differentiate between instruments, resources, and capacity – even more damagingly, they fail to differentiate between these phenomena and the *outcomes* that states seek to achieve. We recognize that it is not always simple to maintain this distinction. We also acknowledge that defining state capacity as the state’s ability to achieve its *intended* outcomes makes it inherently difficult to compare the level of state capacity of, say, North Korea with that of Sweden (the North Korean state clearly wishes to implement policies that are vastly different from those adopted in Sweden). However, these difficulties are empirical and practical rather than conceptual and theoretical (suggesting

that they are in principle possible to overcome), and we maintain that the distinction between capacity and outcomes is essential: the concept of state capacity has no clear meaning without it.

Our approach should also facilitate more nuanced accounts of state-making, state-building or state formation (e.g., Fukuyama 2004; Vu 2010). It should go without saying that it can never be clarified what it means to “make”, “build” or “form” a state without a conceptualization of the “state” or the dimensions in which degrees of “stateness” (Nettl 1968) can be distinguished. Yet the literatures on the state on one hand and on its making on the other appear loosely connected. We wish to reintegrate the two by arguing that states can vary in terms of their policy instruments, resources and the strength of the relationship between their policies and outcomes. In this sense one cannot argue that there is more or less of a “state” without at the same time arguing that there is more or less state capacity. The study of the evolution of state capacity, or its variations across time and space, is thus the study the evolution and variation of the state itself.

A second and related point on the agenda for future research into the state concerns what has recently been termed the “state-democracy nexus” (Andersen et al. 2014; Mazzuca and Munck 2014). We have argued that state capacity must be distinguished conceptually from state autonomy, and that the latter is a question of the “regime”: the rules that determines who can access government positions and influence what policies are pursued. A key implication of this conceptual move is to open up the possibility of an inquiry into the relationship between the two.

There is no denying the complexity of this relationship, not is this the place for an extensive review of the vast literature on the topic. Suffice it to say that although some have argued for a negative relationship – either in the form of democracy impeding state capacity by overburdening the government with popular demands (Huntington 1968), or of state capacity impeding democracy by satisficing popular demands through bureaucratic authoritarianism (O’Donnell 1979) – the dominant view seems to be one of seeing state capacity as a favorable, perhaps even necessary, condition for democracy. The basic argument is fairly

simple: democratic governments come into existence and survive on account of being able to credibly commit to being able to deliver on certain promises (Acemoglu and Robinson 2006), a commitment that hinges on the capacity to make policies deliver on preferable outcomes (Soifer 2013). Our approach to conceptualizing state capacity as power also opens up for another possibility: that a democratic regime positively impacts on state capacity, both by incentivizing governments to invest in key state resources in order to deliver on a broader set of public goods, and indirectly by lower the costs of exercising power through increases in the legitimacy of the regime.

A third and final topic of mounting concern to social scientists, that we also think our account can contribute to, is how state capacity should be measured.¹⁶ Since conceptualization must necessarily precede measurement (Sartori 1970; Adcock and Collier 2001), we have had less to say about measurement in this paper. Yet the main implication of our argument is that state capacity as such cannot be observed directly, only inferred indirectly. State capacity is defined as the strength of the causal relationship between the policies that governments adopt and the (intended) effects of those policies, and by definition, causal relationships cannot be observed. One potential escape from this impasse, however, is to rely on something that *can* be observed: the resources that states deploy to increase the strength of the effect of policies on outcomes – resources such as revenue, human capital, and information. Instead of trying to measure state capacity *as such*, then, the solution that we propose is to measure the resources that are known to *increase* state capacity.¹⁷ Since a high-capacity state is a state that has access to many resources (**r**) that can be deployed to increase the strength of the causal relationship between **p** and **y**, the way forward for the state-capacity research agenda is to *theorize and estimate* the relationships between **r**, **p**, and **y**, and to *measure r*.

¹⁶ See especially Soifer (2008, 2012), Hendrix (2010), Hanson and Sigman (2013), D’Arcy and Nistotskaya (2015), and Lee and Zhang (2016).

¹⁷ For a recent attempt to develop a measure of “information capacity,” see Brambor, Goenaga, Lindvall and Teorell (2016). One needs to be aware, however, that the strategy that we are proposing here is only an indirect strategy, since the possession of resources cannot be equated with the effective *use* of those resources (Soifer and vom Hau 2008, 228).

References

- Acemoglu, Daron and James Robinson (2006), *The Economic Origins of Dictatorship and Democracy*. Cambridge: Cambridge University Press.
- Acemoglu, Daron, Davide Ticchi and Andrea Vindigni (2011), “Emergence and Persistence of Inefficient States”, *Journal of European Economic Association* 9(2): 177–208.
- Adcock, Robert, and David Collier (2001), “Measurement Validity: A Shared Standard for Qualitative and Quantitative Research,” *American Political Science Review* 95(3), 529–547.
- Andersen, David, Jørgen Møller, and Svend-Erik Skaaning (2014), “The state-democracy nexus: conceptual distinctions, theoretical perspectives, and comparative approaches”, *Democratization* 21(7): 1203-1220.
- Ansell, Ben, and Johannes Lindvall (2013), “The Political Origins of Primary Education Systems: Ideology, Institutions, and Interdenominational Conflict in an Era of Nation-Building.” *American Political Science Review* 107:3, 505–522.
- Associated Press (2015), “AP Explains: Is It IS, ISIS or ISIL, and What’s a Daesh?,” *New York Times*, December 2, 2015.
- Bachrach, Peter, and Morton S. Baratz (1970), *Power and Poverty*, Oxford University Press, New York.
- Ball, Terence (1975), “Power, Causation & Explanation”, *Polity* 2: 189-214.
- Bartelson, Jens (2014), “From Empire to Sovereignty – and Back?”. *Ethics & International Affairs* 28(2): 251–162.
- Besley, Tim, and Torsten Persson (2009), “The Origins of State Capacity,” *American Economic Review* 99(4), 1218–1244.
- Besley, Tim, and Torsten Persson (2010), “State Capacity, Conflict, and Development,” *Econometrica* 78(1), 1–34.
- Besley, Tim, and Torsten Persson (2011), *Pillars of Prosperity*. Princeton: Princeton University Press.

- Bockstette, Valerie, Areendam Chanda, and Louis Putterman (2002), “States and Markets: The Advantage of an Early Start”. *Journal of Economic Growth* 7: 347-369.
- Bourdieu, Pierre (1994), “Rethinking the State: Genesis and Structure of the Bureaucratic Field”, *Sociological Theory* 12(1): 1–18.
- Brambor, Thomas, Agustín Goenaga, Johannes Lindvall, and Jan Teorell (2016). “The Lay of the Land. Information Capacity and the Modern State.” Unpublished manuscript, Lund University.
- Collins, John, Ned Hall, and L. A. Paul, eds. (2004), *Causation and Counterfactuals*. Cambridge, MA: The MIT Press.
- Dahl, Robert (1957), “The Concept of Power”, *Behavioral Science* 2(3): 201–215.
- D’Arcy, Michelle and Marina Nistotskaya (2015) “State First, Then Democracy: Using Cadastral Records to Explain Governmental Performance”, *QoG Working Paper Series* 2015:11. Gothenburg: Quality of Government Institute.
- Doyle, Michael (1986), *Empires*. Ithaca: Cornell University Press.
- Evans, Peter (1995), *Embedded Autonomy: States and Industrial Transformation*. Princeton: Princeton University Press.
- Evans, Peter and James Rauc. (1999), “Bureaucracy and Growth”. *American Sociological Review* 60(5): 748-765.
- Fearon, James and David Laitin (2003), “Ethnicity, insurgency, and civil war.” *American Political Science Review* 97(1): 75-90.
- Fukuyama, Francis (2004), *State-Building*. Ithaca: Cornell University Press.
- Fukuyama, Francis (2011), *The Origins of Political Order*. New York: Farrar, Straus and Giroux.
- Fukuyama, Francis (2013), “What Is Governance?”, *Governance* 26(3): 347–368.
- Fukuyama, Francis (2014), *Political Order and Political Decay*. New York: Farrar, Straus and Giroux.
- Gaventa, J. (1979), *Power and Powerlessness*, Clarendon Press, Oxford.
- Geddes, Barbara (1994), *Politician’s Dilemma: Building State Capacity in Latin America*. Berkeley: University of California Press.

- Gellner, Ernest (2008 [1983]), *Nations and Nationalism*. Ithaca: Cornell University Press.
- Hanson, Jonathan and Rachel Sigman (2013), “Leviathan’s Latent Dimensions: Measuring State Capacity for Comparative Political Research”, unpublished paper.
- Hemerijck, Anton C., and Mark I. Vail (2005). “The Forgotten Center. State Activism and Corporatist Adjustment.” In Jonah D. Levy, ed., *The State After Statism*. Cambridge, Mass.: Harvard University Press.
- Hendrix, Cullen (2010), “Measuring State Capacity: Theoretical and Empirical Implications For the Study of Civil Conflict”, *Journal of Peace Research* 47(3): 273–285.
- Hinsley, F. H. (1986), *Sovereignty*. Second edition. Cambridge: Cambridge University Press.
- Huntington, Samule (1968), *Political Order in Changing Societies*. New Haven & London: Yale University Press.
- Imbens, Guido W., and Donald B. Rubin. *Causal inference in Statistics, Social, and Biomedical Sciences*. Cambridge: Cambridge University Press
- Isaac, Jeffrey C. (1987), *Power and Marxist Theory: A Realist View*. Ithaca: Cornell University Press.
- Krasner, Stephen (1999), *Sovereignty: Organized Hypocrisy*. Princeton: Princeton University Press.
- Lee, Melissa and Nan Zhang (2016), “Bringing Legibility Back In: The Informational Foundations of State Capacity”, unpublished paper.
- Levi, Margareth (1988), *Of Rule and Revenue*. Berkeley: University of California Press.
- Levi, Margareth (2002), “The State of the Study of the State”, in Katznelson, I. and H. Milner, eds. *Political Science: The State of the Discipline*. New York: Norton & Co.
- Levi, Margareth, Audrey Sacks, and Tom Tyler (2009), “Conceptualizing Legitimacy: Measuring Legitimizing Beliefs”, *American Behavioral Scientist* 53(3), 354-375.

- Linz, Juan (2000), *Totalitarian and Authoritarian Regimes*. Boulder: Lynne Rienner.
- Lukes, Steven (1974), *Power: A Radical View*, Macmillan, London.
- Malik, Shiv (2015), “The Isis Papers: Leaked Documents Show How Isis is Building its State,” *The Guardian*, December 7, 2015.
- Mann, Michael (1984), “The Autonomous Power of the State: Its Origins, Mechanisms and Results”, *Archives européennes de sociologie* 25: 185–213.
- Mann, Michael (1986) *The Sources of Social Power. Volume 1: A History of Power from the Beginning to AD 1760*. Cambridge: Cambridge University Press.
- Mansbridge, Jane (2012), “On the Importance of Getting Things Done”, *PS: Political Science & Politics* 45(1), 1–8.
- Mazucca, Sebastián and Gerardo Munck (2014), “State or democracy first? Alternative perspectives on the state-democracy nexus”, *Democratization* 21(7): 1221-1243.
- McAdam, Doug, Sidney Tarrow, and Charles Tilly (2001), *Dynamics of Contention*, Cambridge University Press, Cambridge.
- Migdal, Joel (1988), *Strong Societies and Weak States*. Princeton: Princeton University Press.
- Migdal, Joel (1997), “Studying the State”, in Lichbach, Marki Irving and Alan S. Zuckerman (eds.), *Comparative Politics: Rationality, Culture, and Structure*. Cambridge: Cambridge University Press.
- Mitchell, Timothy (1991), “The Limits of the State: Beyond Statist Approaches”, *American Political Science Review* 85(1): 77-96.
- Moe, Terry. (2005), “Power and Political Institutions”, *Perspectives on Politics* 3: 215-233.
- Morgan, Stephen and Christopher Winship (2007), *Counterfactuals and Causal Inference*. Cambridge: Cambridge University Press.
- Morriss, Peter (1987), *Power: A Philosophical Analysis*. Manchester: Manchester University Press.
- Napoleoni, Loretta (2014), *The Islamist Phoenix*. New York: Seven Stories Press.

- Nettl, J. P. (1968), "The State as a Conceptual Variable", *World Politics* 20(4): 559–592.
- O'Donnell, Guillermo (1979), *Modernization and Bureaucratic-Authoritarianism: Studies in South American Politics*. Berkeley: Institute of International Studies.
- O'Donnell, Guillermo (2001), "Democracy, Law, and Comparative Politics." *Studies in Comparative International Development* 36 (1): 7–26.
- Pearl, Judea. (2000), *Causality: Models, Reasoning, and Inference*. Cambridge: Cambridge University Press.
- Pettit, Philip (2012), *On the People's Terms: A Republican Theory and Model of Democracy*. Cambridge: Cambridge University Press.
- Pierson, Paul (2015), "Power and Path Dependence," in Mahoney, James and Kathleen Thelen, eds. *Advances in Comparative-Historical Analysis*. Cambridge: Cambridge University Press.
- Pinker, Steven (2011). *The Better Angels of Our Nature*. Viking Books.
- Ríos-Figueroa, Julio and Jeffrey Staton (2014), "An Evaluation of Cross-National Measures of Judicial Independence", *Journal of Law, Economics and Organization* 30(1): 104–137.
- Rothstein, Bo and Jan Teorell (2008), "What is Quality of government? A theory of impartial government institutions," *Governance* 21(2): 165-190.
- Sartori, Giovanni (1970), "Concept Misformation in Comparative Politics", *American Political Science Review* 54(4): 1033-1053.
- Schwartz, Jonathan (2003), "The Impact of State Capacity on Enforcement of Environmental Policies," *Journal of Environment & Development* 12(1), 50–81.
- Scott, James (1998), *Seeing Like a State: How Certain Schemes to Improve the Human Condition Have Failed*. New Haven: Yale University Press.
- Sobek, David (2010), "Masters of Their Domains: The Role of State Capacity in Civil Wars," *Journal of Peace Research* 47(3), 267–271.
- Soifer, Hillel (2008), "State Infrastructural Power: Approaches to Conceptualization and Measurement", *Studies in Comparative International Development* 43: 231–251.

- Soifer, Hillel (2012), “Measuring State Capacity in Contemporary Latin America”, *Revista de Ciencia Política* 32(3): 585–598.
- Soifer, Hillel (2013), “State Power and the Economic Origins of Democracy”, *Studies in Comparative International Development* 48(1): 1–22.
- Soifer, Hillel, and Mathias vom Hau (2008), “Unlocking the *Strength* of the State: The Utility of State Infrastructural Power”, *Studies in Comparative International Development* 43: 219–230.
- Vu, Tuong (2010), “Studying the State Through State Formation”, *World Politics* 61(1): 148-175.
- Weber, Max (1978 [1921]), *Economy and Society: An Outline of Interpretive Sociology*. Berkley: University of California Press.
- White, D. M. (1971), “Power and Intention”, *American Political Science Review* 65: 749-759.
- Woodward, James. (2003), *Making Things Happen: A Theory of Causal Explanation*. Oxford: Oxford University Press.
- World Bank. (1997), *World Development Report 1997: The State in a Changing World*. Washington: The World Bank.