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**The Policy Choices of Bureaucrats: An institutional analysis**

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Een institutionele analyse

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# Chapter 1

## Introduction

### 1.1 Motivation

Modern states are characterized by the delegation of policymaking responsibilities. The citizens elect politicians and pay taxes and in return they expect an efficient provision of public goods and services. On many occasions, the politicians delegate the policymaking responsibilities to the bureaucrats based on the belief that bureaucrats have access to more reliable information about the consequences of policy choices, a point on which legal, economics, and political science scholarships converge (McCubbins, Noll, and Weingast 1987, 1989). The reliance on bureaucrats to formulate and implement public policies is advantageous to politicians as it allows the latter to draw on the expertise of bureaucrats without having to invest time and resources to acquire such expertise (Shepsle 1979; Rochefort and Cobb 1991; Carpenter 2004).

However, bureaucrats don't always produce results in line with the policy guidelines of politicians. In a seminal contribution, "Law and Economics of Procedure", Mathew McCubbins, Roger Noll, and Barry Weingast (1987) defined the theory of bureaucratic drift in policy delegation, according to which the bureaucrats pursue policies that subvert or diverge from the goals of the politician (Gailmard 2002; Bueno de Mesquita and Stephenson 2007; Horn and Shepsle 1989; Shepsle 1992).

As an illustration of bureaucratic drift, consider, for example, how a policy decision would be made about whether or not to ban a toxic substance called asbestos. This decision may be delegated to the Environmental Protection Agency (EPA) that is charged with protecting human health and the environment by writing and enforcing regulation based on laws passed by the Parliament. The policy may be delegated by the politicians on the premise that the agency possesses the relevant expertise about the potential impact of the proposed ban including information on potential costs and benefits of the policy. However, delegation carries the risk that bureaucrats may use their policy discretion to follow their own preferences rather than those of the politicians. For example, the bureaucrats in Environmental Protection Agency (EPA) may be more inclined than the politicians to ban hazardous substances and may therefore choose to ban asbestos in circumstances where fully informed politicians may not have done so.

Also policy delegation that is justified on the basis of information asymmetry makes it difficult to monitor the bureaucracy. As the above example illustrates, a politician may know exactly which policy outcomes should be achieved – such as banning a toxic substance – but the politician may be uncertain about the specific policy, which will achieve the desired objective. The bureaucrats may be better informed about specific policies to reach a certain policy goal (and hence the choice of policy may be in the hands of the bureaucrats). For example, a bureaucrat may know all the relevant information about the appropriate technology available at the implementation level. This gives a sort of advantage to the bureaucrat, and hence the latter's policy stance becomes crucial for the politician. The bureaucrat may even exploit his informational advantage in order to leverage his agenda setting power to constrain the choices of the politician.

Within this line of enquiry, a voluminous body of legal, economics, and political science literature has explored different institutional mechanisms and administrative procedures that politicians or courts may employ to induce better-informed bureaucrats to make decisions that more closely track the politician's policy preferences. However, most of the policy studies of bureaucratic drift establish the standard economic relationship between policy choices of rational bureaucrats and their economic incentives (material self-interest). The material self-interest may include pay job security and prospects for promotion (Niskanen 1975). Besides material self-interest, the bureaucrat's policy choices may also be influenced by non-material self-interest such as utility gain from pursuing a specific policy, recognition from others and relationship with co-workers (Alchian and Demsetz 1972).

The bureaucrat may also derive utility from performing his tasks and this may be the key reason for a bureaucrat to join a particular department – the so-called “selection effect” (Derthick 1979; Goodsell 1981). For example, a police officer may join a police department because arresting criminals is his passion. Given his preference, the police officer will always get utility from performing this task. Similarly, a district management officer who has intrinsic motivation towards the public service activities will always derive utility from his efforts to ensure efficient public service delivery. Also, agents working in an Environment Protection Agency (EPA) are sometimes already the ones who care about air pollution.

Despite the importance of non-material self-interest, the standard models of bureaucratic policy drift pay scant attention to the relationship between policy choices of bureaucrats and the non-material self-interest (non-economic



incentives) that directly stem from their membership in the organisation (Simon 1947; Perrow 1986; West 1997). That is, neither the institutional nor social determinants of an organisation, as direct constraints on public policy choices of bureaucrats, have become an explicit topic in the literature on bureaucratic policy drift so far.

However, a deeper understanding of the policy choices of bureaucrats requires due consideration of institutional and social factors prevalent in an organization. As an example, on September 15, 2015, former US President Barack Obama issued an Executive Order 13707 that directed the Social and Behavioural Sciences Team (SBST) to provide research insights on the behaviour of bureaucrats working in Federal Government agencies. The objective was to properly understand the constraints and choices of bureaucrats in the course of formulating and implementing public policy. The team's annual report (2016) highlighted that the preferences of bureaucrats towards specific public policy operations do not depend on the maximization calculus of individual bureaucrats as neatly as predicted by standard economic models. Rather the institutional and social factors matter in determining public policy preferences of bureaucrats (Executive Office of the President 2015).

The earlier studies on bureaucratic choice of public policies have emphasized the agency structure, intrinsic motivations, the agency's organizational mission, and the functional activities of an agency based on its production processes and outcomes (Wilson 1989; Prendergast 2007; Carpenter and Krause 2011). These studies pay scant attention to provide institutionally embedded explanations for bureaucratic preferences towards certain public policies. However, the bureaucrats may be inclined to pursue a certain policy stance simply because it becomes a

shared belief in the organization and leads individuals to consider other policy options as improper. For instance, Meyer and Rowan (1991) argue that organizational policies and strategies tend to be highly institutionalized and hence are considered as legitimate regardless of their impact on outcomes. Furthermore, organizational strategies persist due to their taken-for-granted characteristics, which make the former self-sustaining. Hence, organizational context can have long-term impacts if it contributes to a persistence of bureaucrat's policy preferences (Meyer and Rowan 1991; Zucker 1991; Marquis and Tilcsik 2013).

Another way, the organizational context can have a significant impact on public policy preferences, if pursuing organizational policy stances becomes a goal for a bureaucrat (Akerlof and Kranton 2000). He may learn of what is seen in-house as a "good public policy" and how this translates into certain budgetary allocations. In this sense his budgetary preferences are based on narratives, norms and identities prevalent in an organization. Subsequently, he may choose specific budget allocations through the lens of his organizational social context (Arrow 1994; Davis, 2003, 2006, 2007).

The objective of this dissertation is to analyse the policy choices of the bureaucrats duly taking into account the institutional and social factors that can influence their policy choices. More specifically, the institutional and social determinants are analytically seized and conceptually integrated into economic research on bureaucratic drift.

Furthermore, the institutional and social factors not only provide a context in which individual actions interact but also significantly constraint the policy choices of bureaucrats. That is, the organizational context can have significant

impacts if it affects the maximization calculus of individual bureaucrats through (non) economic factors.

Hence, a new pendulum swing of analysis with an emphasis on “institutional and social” considerations in the public policy choices of the bureaucrats can provide the context of persistent, institutionalized, and inertial public policies and can add value to the legal, economic and political science literature on bureaucratic policy drift.

Before the specific research questions of the study are spelled out, it is important to define some key terms for ease of exposition.

## **1.2 Key terms**

The term “bureaucrats” in this dissertation refers to permanent government employees organized hierarchically and working in the administrative departments of the government. Apart from pure administrative functions, bureaucrats perform many policy-making functions that are delegated to administrative agency by the legislature.

The discretionary powers conferred on the administrative agency are of different types: the agency may perform simple functions such as maintenance of birth and death registers, or it may exercise its power to regulate the economy.

It is important to distinguish whether the institutional context influences outcomes through shaping individual incentives or through influencing individual preferences. From a neo-classical perspective, institutional factors influence behaviour through determining the incentives faced by individuals. On the other hand, the institutional context may directly impact individual preferences as expounded by the behavioural approach. In this dissertation, the institutional

context is assumed to influence individual behaviour at the level of incentives, which define their opportunity sets. Furthermore, these incentives may indirectly shape individual preferences through shared thoughts and beliefs (Hodgson, 2006) as, for example, a certain preference for public policy by the bureaucrats.

In order to illustrate the principal argument of the dissertation and to conceptualize institutional determinants in a bureaucratic organization, the bureaucracy in Pakistan is specially discussed. This provides the means for an in-depth examination of the processes and mechanisms fundamental to institutional persistence. The study's focus on a single country case allows for a detailed investigation of the historical mechanisms and socio-legal conditions to propose relevant policy recommendations.

The following paragraphs will describe the functions, which can be delegated to administrative agencies (bureaucracy) in Pakistan constitutional law.

In the "Principles of Administrative Law", Mahmood (2011) documents the areas of permissible delegation under the constitution of Pakistan. According to "The Supreme Court order 572", if public policy is formulated by the legislature, the function of supplying details may be delegated to the administrative agency for giving effect to the policy. According to "The Supreme Court order 560", the legislature can empower the administrative agencies to extend the latter's jurisdiction to different locations, persons or commodities. For instance, according to section 183 of the Railways Act 1989, the administrative agencies were authorized to apply the provisions to other transport areas. Some statues, for example "The Supreme Court order 714", state that the framing of rules and regulations by an administrative agency is constitutional provided that these are

presented to the legislature before their enforcement with the proviso that the legislature retains the power to amend, modify or rescind them.

The institutional devices for the transparency of the delegated budgetary policies fall under the category of Fiscal Responsibility Laws (FRLs). The Fiscal Responsibility Act, 2005 was introduced to eliminate mismanagement of budgets and introduce greater transparency in fiscal operations. According to Act No. VI of FRA 2005, the government should take all suitable measures to accomplish policy goals with respect to budgetary allocations. In practice, however, actual budgetary allocations by the bureaucrats can often diverge from these targets. For instance, the budgetary allocation to education and health as percent of GDP was aimed to double from FY05 to FY15. However, this expenditure shows no significant increase in terms of their share of GDP since 2005-06. On the other hand, social security and development projects showed remarkable budgetary increase despite the fact that such increases were not the policy target (The Economics Survey of Pakistan 2016).

This illustration highlights the important role of bureaucrats in the choice of budgetary allocation policy as well as the potential for policy drift. It is precisely for this reason that the budgetary allocation policy has been chosen as a focus of the analysis. Simply put, the budgetary policy plays a significant role in the provision of public goods and services and the bureaucracy holds considerable discretionary power in the choice of budgetary allocations. But the models which we have developed are flexible enough to allow for applications in more general settings where bureaucrats' choices are influenced by a combination of pecuniary and non-pecuniary incentives such as maximization of perks (pecuniary) and other possible motives such as public service ethos and career concerns (non-pecuniary).

After discussing the key terms of this dissertation, the next highlight is on the research questions of this study.

### **1.3 Research questions**

The two main research questions investigated in this dissertation are: First, how are the policy choices of bureaucrats shaped by the institutional and social context of the organisation. Second, what are its implications for public policy outcomes in terms of allocation of public budgets?

As an illustration, consider the case of bureaucracy in Pakistan, an administrative organization inherited from the British rule. The structure of bureaucracy, its power and administrative outreach were dictated by the institutional and social contexts prevalent during the British rule. For example, weak political and legislative institutions resulted in a powerful organization that was meant to provide legal and administrative apparatus to govern a vast and diverse country. On the other hand, the social class structure was mirrored in the bureaucracy with bureaucrats in higher ranks enjoying a high social status and taking pride in their identity. This inherited institution failed to adapt itself to meet the new challenges of development after independence. As a matter of fact, this set up has continued to this day and bureaucracy in Pakistan retains the status of a ruling class and a symbol of power and social status geared more towards consolidation of its power, perks and privileges rather than effective public service delivery (Kardar 2006).

This illustration serves to highlight a key point of this dissertation; that the behaviour of bureaucrats is shaped by the institutional and social environment that determines the organizational attributes. Consequently, in order to develop a proper understanding of the complexity of a bureaucrat's policy choice beyond the

conventional individual self-interest paradigm, it is essential to bring into focus the organizational context that shapes and rationalizes certain preferences of bureaucrats. The illustration also highlights the fact that in order to understand institutional determinants, the key historical mechanism and processes have to be investigated. Simply put, it is necessary to examine the formative history of an organization to understand the institutional factors.

In order to answer the two main research questions, the study focuses on a number of sub-questions, which are stated in detail below.

In the first part (chapter 2) the study seeks to answer two questions with respect to the specific role of the institutional context in the policy choice of bureaucrats.

- How do the historical and institutional contexts influence the structure and mode of governance of the organisation?
- What phenomenon explains the stickiness of inefficient bureaucratic features concentrating on particular bureaucratic control on public expenditure and corruption?

In the second part of the dissertation (chapters 3 and chapter 4) a number of sub questions are addressed to see how the preferences/policy choices of bureaucrats are shaped by institutional and social context.

- How does imprinting lead to bureaucratic inertia and policy rigidity?
- How does bureaucratic inertia affect the policy choice of bureaucrats?
- What are the implications of inertia in terms of economic efficiency?

The social determinants referred to are the factors not attached to particular individuals but instead to social groups such as identities, norms, public sector ethos etc. These social determinants become pivotal, following experience of and

exposure to an organization, for example a sense of collective identity enhances altruism towards group members. Thus, in the presence of those social determinants, the decisions of agents not only depend on calculation maximising their individual utility functions but also on the degree of identification with organizational goals. In this context, the following questions are addressed in chapter 4:

- What role does a bureaucrat's identity (social context) play in the policy outcome?
- Do all agents identify alike with the goals of the bureaucracy?
- What are the trade-offs between individual and organizational goals faced by a bureaucrat who identifies with the organization?

After discussing the research questions of this dissertation, the next highlight is on the relevance of this study to administrative law and economics literature.

## **1.4 Relevance of the study to administrative law and economics**

The administrative law and economics literature draws insights from the public choice theory that takes the discretionary powers of the bureaucrats as given and assumes that bureaucrats are self-interested individuals who maximize their budgets. This self-interested behaviour of the bureaucrats can explain the corrupt practices and inefficiency of the bureaucrats. In administrative law and economics, studies have investigated the mechanisms to reduce inefficiency and control bureaucratic opportunistic behaviour so as to prevent and punish deviation of a bureaucrat's policy choices from those of a politician (Rose-Ackerman 1986, 2007; Stephenson 2006, 2008). In particular, researchers have widely studied the



role of statutory instruments such as judicial control, legislative control, political control and an extensive set of rules and administrative procedures in ensuring the efficiency, responsibility and accountability of the decision-making by administrative agencies (Posner and Vermeule, 2002).

Many scholars in the field have pointed out the need to properly understand the constraints and choices of bureaucrats in order to enhance understanding of the (non) opportunistic motivation of bureaucrats. As Schuck, (1994) mentions that the law and economics literature about administrative agencies is highly concentrated around the cumbersome procedures, judicial reviews and audits to guide the course of action and to control administrative discretion, but however very scant attention is paid to exploring the underlying factors that influence agency policy choices. Weigel (2006) also stresses that general administrative issues such as policy drift, discretion over budget, goal conflict and choices of bureaucrats are rarely addressed through the lens of bureaucrats' incentives; the focus has been more in terms of how to minimize distortions through complex rules.

This dissertation adds value to the field of administrative law and economics in that it extends the earlier literature to incorporate both the pecuniary and non-pecuniary incentives of the bureaucrats that could affect their choices in ways that are not yet fully understood. In particular, there has been less attention paid to the complexity of organizational structure and the interplay of material and non-material interests of bureaucrats in determining public policy outcomes. As Coglianese (2002) suggests, research along these lines could provide insights that can help in evaluating and ultimately improving administrative law and procedures in ways that contribute to more effective governance and better policy outcomes.

The following section will briefly sketch out the works of pioneering scholars on the study of bureaucracy with a focus on traditional approaches. The modern advent of the scientific study of bureaucracy is documented in the next chapters of the dissertation.

## **1.5 Scientific studies on bureaucracy: a (brief) review of the literature**

In the early scientific study of bureaucracy efforts were made to discover the structures and principles of administration. German sociologist Max Weber's (1947) normative theory put forward the idea of "rational-legal authority" as a governance mechanism. His theory provided insights on the design of bureaucratic institutions focusing in particular on the development of trained professionals having specialized knowledge and training to conduct the administrative functions. He also advocated a hierarchical organizational structure with clearly defined responsibilities and accountability mechanisms. Similarly, Wilson (1887) established a dichotomy between the role of politicians and bureaucrats in public policy such that the politicians carry the task of policymaking and bureaucrats implement these policies. He called for an administrative apparatus that should be devoid of any role in politics with an independent administrative status.

Though Taylor (1911) also advocated the division of tasks between politicians and bureaucrats his work focused more on structural designs and incentives in order to find the optimal methods to increase the work efforts of public agents. He introduced the pecuniary motivations in his motivation theory, where he advocated the reliance on material incentives such as piecework, incentive pay, and other pure economic incentives to increase production. Simon (1947) stressed that the

unit of analysis should be individuals to understand the performance of administrative organizations. The two key components of his theory of administration included efficiency considerations and cognitive limitations of human rationality that can hinder the efficiency of bureaucrats. The intellectual roots of the behavioural revolution in the study of public organizations started with Barnard's (1938) "The functions of the executive", in which he analysed the issues related to boss-subordinate relationships. This work emphasized the normative questions such as how administrative agencies function under the constraints of formal rights and organizational environment. On the other side, March and Simon's (1958) account introduced a behavioural challenge to the scientific inquiry of public agencies. The study documented that the rationality in the neo-classical paradigm is unfounded and problematic to study the behaviour of the public agents. It also suggested that standard operating procedures should be employed by the organizations to control the individual cognitive limitations that allow them to behave in a more efficient manner.

As the administrative science literature focused on management and organizational questions, a parallel movement 'public choice approach' documented the problems that the material interests of administrative agents may create and focused on its implications for the performance of the organization. More specifically, pioneering scholars including Buchanan (1949), Tullock (1965), Downs (1967) and Niskanen (1968) used economic tools to handle the problems of control and responsiveness in bureaucrats. The scholars in this field drew insights about administrative agency, from among others, C. Northcote Parkinson's book "Parkinson's law and other studies in administration". Parkinson (1957) quoted the example of the British navy to argue that bureaucrats should not

be seen as agents with altruistic motivations who would selflessly work in the public interest. The bureaucrats leverage their discretion in order to increase the size of the budget, which results in private benefits for them such as perks, privileges, and salaries etc.

Tullock's (1965) work highlighted the effects of disinformation channels stemming from the hierarchical distortions in public organizations. His work established that agents in public organizations are not easy to control since these agents do not face the risk of losing their jobs due to the lack of market based sanction mechanisms in public organizations. Michel Crosier's "Bureaucratic Phenomenon" (1964) arrived at a conclusion similar to Tullock's. Rather than focusing on information channels he focused on the internal structure and power dynamics of public organizations. His work established a novel account of how bureaucracies actually function and how the power interests of different stakeholders such as interest groups and politicians shape organizations. Both Crosier and Tullock concluded that bureaucracies are inefficient organizational forms and the problems inherent in these organizations are inevitable.

One notable departure from these negative accounts of bureaucracy is Downs (1967) famous work "Inside Bureaucracy" that studied bureaucrats at a micro level and maintained that agents in public organizations have diverse ideologies and preferences. He described bureaucrats in certain groups such as zealots, advocates, statesmen, conservers, and climbers. He argued that due to the different personalities of bureaucrats the performance distortion in the system is unavoidable. However, he contended that performance distortions could be corrected by different means such as collecting feedback from outside agencies, creating innovation and encouraging competition. Perrow (1972) emphasized the

importance of organizational sociology in understanding organizations. He maintained that the focus should be on correcting the system rather than individuals. Mosher (1968) focused on questions of organizational behaviour especially in relation to the political dimension of the bureaucracy and argues for strong checks on bureaucratic autonomy.

The literature on bureaucracy that focuses on identifying different mechanisms to control bureaucratic discretionary power through ex-post and ex-ante methods is well developed. A number of studies have investigated how budgets, appointments, and oversight mechanisms influence bureaucratic discretion. In administrative law, research on the politics of procedural choice has provided insights on how to control the behaviour of bureaucrats through administrative rules. Whereas the organization theory emphasizes institutional design, staff relationships, hierarchical structures, and procedures of public administration, political science concentrates on questions of the political control of bureaucracies and the conjunctions between legislature and bureaucracy. The literature on public bureaucracy in the field of economics adopts a more rigorous approach to study bureaucratic behaviour by emphasizing the rational actor model. These classic accounts of bureaucrats' motivations that are widely based on the neo-classical self-interest axiom have their own significance. However, a theoretical framework that offers a mediated approach by taking individuals as the primary unit of analysis while situating them in their social and institutional contexts can help achieve a better understanding of policy choices of public bureaucrats.

## 1.4 Methodology

In broad terms, the dissertation uses multi-disciplinary approaches encapsulated with neo-classical analytical methodologies, to investigate individual behaviour within an organizational context. The approaches are individual-centred yet also institutional in that these bring into focus social and institutional factors as explicit constraints on individual behaviour.

The dissertation is composed of two parts. The first part (chapter 2) presents a case study of Pakistan's bureaucracy focusing in particular on historical processes to shed light on key organizational and institutional variables that impact behaviour of organizational actors. The second part of the dissertation (chapters 3 and chapter 4) applies the insights of the case study to develop a conceptual framework for analysing policy choices of bureaucrats duly taking into account social and institutional dimensions.

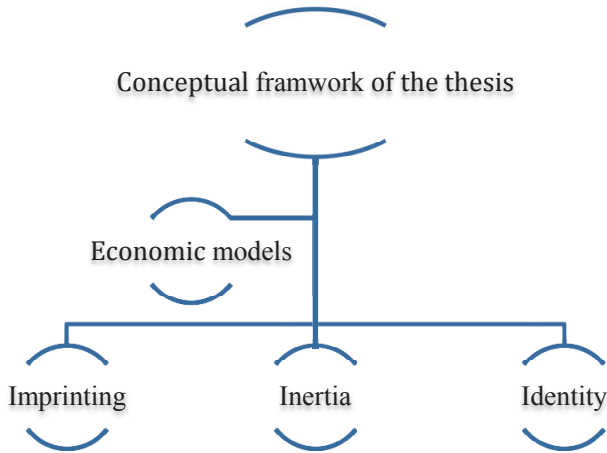
In the following there will be a brief discussion of the methodologies used in the two parts of the dissertation. The details are provided in the respective chapters.

The methodology adopted in chapter 2 is a historical case study based on a descriptive approach anchored in the theory of organizational imprinting. In this chapter, the bureaucracy in Pakistan is taken as a case study to explore the role of the historical and institutional context in shaping the key attributes of bureaucracy. The focus has been in particular on investigating the significant role of bureaucrats in public policy. Furthermore, the root causes of rampant corruption in bureaucracy from a historical perspective are explored. In the light of a historical narrative, we explain the deeper roots of corruption and power and inclination of bureaucrats towards certain public policies

The second part of the dissertation builds on insights gained from part one and uses a rational choice approach with status quo bias theory (chapter 3), and social identity theory (chapter 4).

In the proposed approach, there is recognition of the critical place of individual preferences in determining individual behaviour, as well as the role of historical, institutional and social factors in shaping the preferences. The individuals are central to the method throughout the analysis, but the approaches are more attentive to the role of social and institutional elements in seeking to understand the policy choices of bureaucrats.

Central to the methodology are three concepts that explain preference formation in historical, institutional and social contexts, namely imprinting (chapter 2), structural inertia (chapter 3), and identity (chapter 4). These concepts help to explain how policy choices of the bureaucrats stem from different contextual factors. Although these concepts/theories (Figure 1.1) have their own distinctions possibly with some overlap, the common denominator of these approaches is to provide more valid explanation of decision-making when historical and institutional aspects matter.



**Figure 1.1: Three concepts used in the dissertation to illustrate preference formation in organizational, institutional and social contexts.**

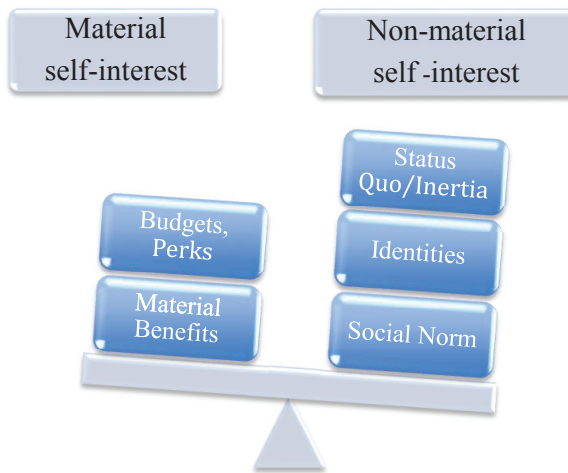
Chapter 3 develops a theoretical framework that incorporates the concept of inertia directly stemming from organizational imprinting (chapter 2). Simply put, we elaborate a “principal-agent model” with status quo bias and solve the bureaucrat’s policy choice problem. The framework specifies conditions under which institutional factors hinder the policy choice of the bureaucrat and hence could have economic implications. This approach helps in identifying the causal factors of policy rigidity especially in terms of the institutional context that influences the policymaking of bureaucrats.

Chapter 4 uses a social identity approach that incorporates multiple agents in bureaucracy in a game theoretic framework. More specifically, the chapter elaborates on a principal supervisor and agent (subordinate) (P-S-A) model of policy choice, where politicians and bureaucrats are motivated by different career concerns. The framework introduces multiple agents within the bureaucracy with



different functional tasks as well as different individual policy goals, making the overall goal conflict between legislature and bureaucracy less predictable.

Essentially, the individual choice theoretic approaches used in chapters 3 and 4 can be conceived in terms of cost benefit analysis between the material (pecuniary) and non-material (non-pecuniary) interests of bureaucrats (Figure 1.2).



**Figure 1.2: The potential trade-off a bureaucrat faces between his material and non-material self-interests.**

Figure 1.2 illustrates the potential trade-offs between material self-interest such as budgetary resources and non-material self-interest stemming from status quo bias in the form of adherence to past policies, and identities based on bureaucratic hierarchy or social norms. Interestingly, a bureaucrat may be willing to sacrifice material gains (i.e. budgetary resources) for non-material interests driven by their social and institutional context. This is because while a bureaucrat derives positive utility from budget maximization, he may experience a utility loss due to non-material factors. This calculus between material and non-material incentives

becomes critical in determining the policy choices of bureaucrats, as is elaborated in chapters 3 and 4.

To sum up, the main thrust of this dissertation is to unfold the organizational context in influencing the policy choices of bureaucracy. Within this framework, the role of non-material incentives such as status quo, inertia, social norms, identities, and public sector ethos in agent's choices, are investigated from an organisational perspective.

## **1.5 Structure of the dissertation**

The dissertation is organised as follows. Chapter 2 presents a historical explanation of specific bureaucratic attributes such as corruption and power dynamics in bureaucracy in Pakistan. The objective is twofold: first to set out the historical context including the economic environment and founders' preferences in creating structure and strategies of bureaucracy; and second to provide an account of how certain practices during the colonial era led to the unintended consequences in the form of bureaucratic power, corruption and control over economic policies after change in the external environment (post-independence). The chapter uses the framework of Organizational Imprinting (OI) and explains the implications and outcomes due to imprints on bureaucracy in Pakistan, a descendant of colonial era civil service. It is argued that bureaucracy in Pakistan shows significant imprints many of which tend to persist because of forces of inertia and institutionalization.

In addition to the historical and institutional approaches to bureaucratic behaviour discussed in chapter 2, the next two chapters of the dissertation carry out a rigorous analysis of how the institutional factors contribute in shaping the policy choices of the bureaucrats.

In Chapter 3, the insights of chapter 2 are applied to explore how the policy choices of bureaucrats are influenced by their past choices. More concretely, this chapter develops a formal theory of bureaucratic budget optimization in the presence of state-dependent alternatives. Drawing on a theory of “organizational imprinting,” (chapter 2) the model creates dependence between the alternatives at an initial state (say, when an agency was created) and the current state. The chapter discusses how the policy preferences of bureaucracy can be shaped by economic, social and institutional context factors that define the operational scope, policies and capabilities of bureaucratic organization. The chapter reveals how sub-optimal policy choices may arise due to imprinted policy preferences dictated by past organisational trajectories.

In chapter 4, a further step is taken for studying more deeply bureaucratic behaviour in an organizational hierarchy. The model discusses mission orientation in bureaucracies, taking into account the statutory distribution of power and functional responsibilities of agents across different layers of bureaucratic organization. In particular, a game-theoretic model is developed that emphasizes strategic interaction among bureaucratic actors and the legislator to determine public policies. In the model, it is assumed that bureaucrats aim at their individual advantage but have different identities. Bureaucrats may identify themselves with the goal of the bureaucracy and derive utility from this identity. Or, they may not identify with the goal of the bureaucracy and gain utility only from pursuing strategies to their own benefit. This model set-up highlights the possibility of trade-offs between individual and organizational goals and provides a more realistic approach for the analysis of bureaucracies.

In chapter 5, the major conclusions and policy implications of the dissertation are discussed. In addition, the areas for future research are spelled out.



# Chapter 2

## A Bureaucratic Organization with Imprinted Attributes<sup>1</sup>

### 2.1 Introduction

Since the advent of centralized administration, it has been observed that, despite several reform efforts, many bureaucracies continue to retain the inefficient characteristics, failing in most cases to provide an effective system of governance.

This chapter aims to address the persistence and rigidity of bureaucratic features over long time spans. The study provides a long-term temporal perspective on the persistence of organizational design. The long-term view on the matter allows us to better explore and explain why corruption and rent seeking continue in many bureaucracies although the founding characteristics have disappeared a long time ago and history has provided ample chances to change the course.

It is instructive to mention that the analysis in this chapter is exploratory. The investigation does not aim to offer specific policy solutions in this chapter; rather certain “insights” are distilled from the narrative developed here to facilitate

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<sup>1</sup> I gratefully acknowledge the comments and suggestions received during the EDLE seminars as well as from the participants in the panel on “History and Institutions” during The European Group of Organizational Studies Annual Meeting 2015 (Athens, Greece), and The Workshop on Organizational Behaviour and Legal Development 2014 (University of Bournemouth, UK), for helpful comments on earlier drafts. I gratefully acknowledge Pieter Desmet’s guidance and suggestions on the survey part of the chapter. The usual disclaimer applies.

understanding the choice problems of bureaucrats formalized in the third and fourth chapters of the dissertation.

To sharpen our focus, the bureaucracy in Pakistan has been chosen for a case study. The bureaucracy of Pakistan presents an interesting case study for at least two reasons. First, it has a long history with its roots going as far back as the British colonial regime in the sub-continent (Cheema and Sayeed 2006; Islam 1989). Second, due to weak democratic institutions<sup>2</sup> in the country, the bureaucracy has displayed a remarkable continuity of the features it acquired during the colonial era including its dominance in the axis of power, culture of rent seeking, cadre-based structure, and patron-client relationships, as well as the mode of governance and interventionist economic policies (Kardar 2006; Cheema and Sayeed 2006).

Furthermore, despite several reform efforts<sup>3</sup>, bureaucratic framework is following the same inefficient practices; hence the bureaucracy in Pakistan serves as an ideal laboratory to explore the role of historical and institutional context in the persistence and rigidity of bureaucratic features.

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<sup>2</sup> After independence in 1947, Pakistan was under military dictatorship in the 1960s, 1980s and 2000s and a democracy in between. Currently, the country has a democratic government, since the 2008 elections which were held after the Lawyers' Movement, which in March 2007 protested against General Pervez Musharraf's dictatorship, which had started in 1999. Both under dictatorship and democracy the government has relied more on the bureaucracy.

<sup>3</sup> General Ayub Khan (1958-69), introduced "Reform Commission 1962", General Yahya Khan (1969-1970) introduced reforms based on the Fulton Report which recommended ways of professionalizing British civil services, Zulfikar Ali Bhutto (1971-1977), introduced the famous "Civil Services Reforms 1973", General Zia Ul Haq (1977-88), established the, "Civil Services Commission 1978", General Musharraf regime (1999-2008) introduced "The Devolution of Power Plan". The ultimate loser in this political see-saw between civilian and military regimes has been the bureaucratic framework in the country, each successive government be it civilian or military scaled back the previous reforms or maintained the status quo without building upon these reforms.

The analysis argues that in order to understand the current rigidity and power structure in the bureaucratic framework in Pakistan it is imperative to review the historical context of organisation. In the process, we provide a detailed history of Pakistan bureaucracy to better understand the context and potential causes behind the inefficient bureaucratic set-up. It is expected that analysing the Pakistani experience will help shed light on the positive political economy question of why many bureaucracies continue to retain inefficient characteristics.

It is instructive to mention that providing a detailed account of current reforms is beyond the scope of this chapter, rather the objective is to explore aspects of history that may help in understanding the current bureaucratic structure. In this latter context, we examine the pre- and post-independence periods in the light of organisational theory that helps explain the persistence of bureaucratic attributes.

Due to limited case studies and systematic data, we conducted a perception-based survey<sup>4</sup> among bureaucrats in Pakistan, designed around the key matters relating to the organizational features discussed here. It needs to be emphasized that our objective was to get some insights into the perceptions of civil servants about the structure and features of the organization that they are part of. It focuses primarily on the links between bureaucratic hierarchy and bureaucratic performance, where hierarchy largely represents the same power structure as was prevalent in the

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<sup>4</sup> A perception-based survey, targeting 200 bureaucrats, was conducted to gather the bureaucrat's feedback about their perception of the organization they work in. The survey gave an opportunity to hear from the bureaucrats regarding the organizational identity, competitive psychological climate, public service motivation, performance pay, development experience, social justice, distinctness and turnover intention (see appendix 2). Although we collected extended data for 8 variables (comprised of 74 questions), we restrict our attention to our key variable of interest, which is the correlation between hierarchy and core institutional characteristics.



colonial era. Following the aggregate findings of the survey, we continue, as in the next chapters (chapters 3, 4), with a discussion of impact of organizational context on individual-centred choices and preferences. However, in this chapter, we restrict our attention to provide a macro-level long-term temporal perspective on the persistence of organizational design.

Overall, while we refrain from strong causality claims, our general findings are supportive of the view that public officials' (bureaucrats) perceptions about the rules and regulations governing the agency differ according to their position in the hierarchy that signifies distribution of power in the bureaucracy. The survey<sup>5</sup> provided an opportunity to investigate empirically a common assertion that the rigid organizational structure of colonial era has an impact on the performance of bureaucracy in Pakistan. The key findings of the survey are summarized as follows.

Firstly, the survey explained that the bureaucratic framework<sup>6</sup> is based on the outdated structures of cadre-based system of governance and vertical hierarchy that have serious effects on the motivation as well as performance of the civil servants.

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<sup>5</sup> A detailed account of survey design, method followed, measures used, results, correlations are mentioned in appendix 2.

<sup>6</sup> There are six officer cadre pay scales ranging from grades 17 to 22. According to 2015 censuses, the largest numbers of officers are in Basic Pay Scale (BPS) 17 (49%), BPS 18 (28.64%), BPS 19 (13.21%) and BPS 20-22 (10.15%) respectively. Furthermore, there are 12 occupational groups: The Office Management Group is the predominant one which is 5.10% of the total number of employees in BPS 17-22 followed by Income Tax 5.07%, Accounts 4.60%, Railways Commercial 4.41%, Secretariat 4.10%, District Management Group 3.68%, Foreign Services Group 3.20%, Customs & Excise 2.62%, Police Service of Pakistan 2.53%, Economists & Planners 1.81%, Information 1.24%, Postal 1.03%, Commerce & Trade 0.85%, Military Lands & Cantonment 0.38% and 59.37% are ex-cadre.

Secondly, the more senior bureaucrats in the hierarchy of bureaucracy showed strong organizational identity, which is taken here to mean the degree of the bureaucrats' identification with the goals of the organization (for a rigorous investigation of this see chapter 4). The bureaucrats in grade 17, which is the first grade in officer rank, showed a higher level of identity as compared to officers in grade 18. This could be due to the fact that at the start of their career bureaucrats are highly motivated and strongly identify with the bureaucracy, since being part of the highest government jobs in Pakistan gives them a level of pride. But after spending four to five years their motivation may weaken somewhat due to some adverse circumstances typically observed more frequently at this level of hierarchy. These may include postings to some remote areas, fewer development opportunities, discontent with the senior bureaucrats, and lower pay. All of these negatively affect the identity with the organization.

However, with promotion to grade 19, that on average requires ten to twelve years in the organization, there is an increase in identity. The promotions increase the power over resources, strong interlinks with the political coalition and hence the stake in the bureaucracy increases for the bureaucrats. From grade 19 to grade 20 the bureaucrats identify almost to same degree. However there is a very sharp increase in the identity after grade 20. That is the level in the hierarchy (grade 22) where bureaucrats identify most strongly with the organization and enjoy absolute power over resources with a direct role in policy making (for more on this, see chapter 4 where an economic explanation of identity and hierarchy is provided). Hence it is plausible to assume that bureaucrats identify differently with the organization according to their hierarchal level with an increase in their sense of belonging as they are promoted to the higher grades.

Thirdly, the overwhelming majority of civil servants agreed with the assessment that the civil service is characterized by a rigid power structure (hierarchical structure) which is emblematic of the colonial era power relations in the organization. Furthermore, patron client relationships persist as postings to big districts with a lot of revenue responsibilities that give more chances of rent seeking, and are based on political ties, patron client relationship and networking.

Finally, the perception of justice<sup>7</sup> among civil servants differs with the hierarchical level. The officers in grade 17 responded with the lowest score in terms of how much distributive and procedural justice they receive in postings and job-related evaluations. This is in contrast with the Weber conception of ideal bureaucracy that is aimed at ensuring equality of rights and is established on the legal certainty of procedural justice. An administration, where a rigid hierarchical system impedes distributive justice, would be more prone to corruption activities especially in lower ranks where officers do not receive fair treatment<sup>8</sup> in terms of distributive and procedural justice. The grade 17 officers showed the lowest level of satisfaction with procedural justice while there was a significant increase in justice perception after grade 18. However there is a significant fall in justice perception from grade 19 to grade 20, which could be due to politically driven

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<sup>7</sup> Clawson (1999) defines justice perception as an agent's perceptions of fairness in an organization. The distributive justice is defined as "fairness of outcome", while the procedural justice is related to "fairness of decision making used to evaluate a worker's performance".

<sup>8</sup> Conversely, a poor procedural justice climate has a negative impact on employees' perceptions of being treated fairly and valued by the organization, and hence they will be more prone to get involved in corrupt activities (Posthuma, Maertz, and Dworkin 2007; Siers 2007). According to Rawls (1971), justice is the first and foremost virtue of a social organization. It signals legitimacy of authority with fairness so that directives are perceived as legitimate (Lind et al. 1993). It is for this reason that workers listen to authority and when they perceive an overall fair justice climate in an organization, they consider higher authority as fair and carry out directives without questioning. Barnard (1938) defines Justice as the pillar on which the whole structure of an organization's success can be built (Clawson 1999).

promotions at this level of hierarchy, which create a sense of injustice among the peers. The bureaucrats who get promoted to grades 21 and 22 strongly feel the justice of the environment since they reach the highest echelon of bureaucracy.

To sum up, the general insights of the survey indicate that the bureaucracy in Pakistan follows a rigid hierarchical structure inherited from the past. The bureaucrat's responses show their dissatisfaction of the methods to evaluate their performances, promotions, and development opportunities and public service motivation. This suggests that past administrative practices and systems continue to be in vogue despite the fact that better options such as a new public management framework are available. This observation inspires us to dig deeper into why organizational structures and strategies endure even when these are inefficient and adversely impact the performance of the bureaucracy.

The chapter proceeds as follows. Section 2.2 elaborates how the inefficient organisational structure question is approached in this chapter. In this section, the methodological framework employed in the study is explained; emphasizing how imprinting theory can explain institutional persistence. Furthermore, this framework is critically evaluated against the theory of path dependence, which also stresses historical factors in the study of present organizational attributes. Finally, the section describes the selection of historical sources. Section 2.3 lays out the mechanisms and drivers of the imprinting process in the light of the literature on organizational imprinting. Sections 2.4 and 2.5 provide a historical analysis of the evolution of bureaucracy in Pakistan, focusing on the colonial roots as well as on the post-independence period. Section 2.6 addresses the implications of the relationship of imprinting with current organisational features. Section 2.7 discusses the main insights of the analysis.

## **2.2 The persistence of suboptimal forms of the organization**

An influential literature on organisational studies asserts that once an organizational form is entrenched, its survival depends less on its performance than on the “reassuring sense of order it conveys” (Brint and Karabel 1991). Following this line of enquiry, in this chapter, we argue that the weaknesses of the bureaucracy are linked to perverse incentives, power structure and the institutional environment within which successive cohorts of civil servants have functioned for over 150 years. These macro-level insights set the ground to investigate the behaviour of bureaucrats in the following chapters of the dissertation where public choice framework of utility-maximizing individuals acting strategically within the institutional contexts is used as an analytical approach.

Our investigation is related to the literature, which emphasizes that individual behaviour is conditioned by the institutional context, which exerts an almost deterministic effect on the actions taken by different actors. That is, institutions embody particular beliefs and norms that inform the preferences, interests and choices. This observation is line with the views of Powell (1991) who argues that institutional and social arrangements can persist even if they are sub-optimal because they involve sunk economic and/or psychological costs, which cannot be recovered. The persistence is further reinforced by the formation of shared expectations that contribute to a sense of psychological security and facilitate the flow of information and coordination of diverse activities. Change is often resisted because it threatens the sense of security of individuals, and disrupts the established procedures and routines. Furthermore, the structural features, routines

and strategies of an organization may persist simply because these are taken for granted as “the way things are done” and consequently they are neither questioned nor evaluated against available alternatives (Berger and Luckmann 1967; Powell 1991). Furthermore, public sector organizations can persist with their archaic procedures, work methods and routines not least because they are less subject to the ‘selection mechanisms’ as in the case of corporate organisations which face competitive pressures to adapt to changing circumstances (Friedland and Alford 1991).

These considerations have led researchers to study bureaucracy as an organization emphasizing the economic, historical and political context that determines the performance of the bureaucracy (Moe 1990; Williamson 1999).

Following this line of enquiry, in the next part of this chapter we aim to elicit exploratory insights on how organizations and their specific modes of operation become persistent over very long time frames. The idea is to provide historically informed theoretical narrative that can inform the theoretical models used in the following chapters.

A significant body of literature examines the nexus between historical mechanisms and present organizational forms (Acemoglu et al. 2001; Banerjee and Iyer 2005; Nunn 2008a). The historical accounts, in the tradition of Acemoglu et al (2001), show that past events play a significant role in shaping different features of organizations. Consequently, it is important to focus on institutional and historical factors to shed light on the persistence and dominance of certain features in a bureaucratic agency (Hall and Taylor 1996).

Organisational theories that emphasize historical aspects include path dependence and similar theories such as imprinting. Both concepts relate to historically or institutionally driven processes that can constrain individual choices. In the following, we explore, which theory offers a better frame to provide a historically informed theoretical narrative.

The concept of organizational imprinting encompasses two distinct features (Johnson 2007). First, it refers to the process through which economic, social and institutional factors, prevailing at the time of founding, shape organizational forms and attributes. The second feature embodied in the idea of imprinting is the reproduction of various organizational features acquired at the time of founding as a result of inertia and institutionalization of organizational forms and characteristics (Hannan and Freeman 1984; DiMaggio and Powell 1991a). While the concept of imprinting has diverse applicability depending on the context, the notion of organisational imprinting pertains to the case where organisations become imprinted in terms of management and administrative structures, organisational culture and values, and organisational identity.

The notion of path dependence has been popular in economics to explain how the interaction of initial conditions and chance events define a particular path in terms of rigid structures and strategies in an organization (Arthur 1989; David 1994; Liebowitz and Margolis 1995).

## **2.2.1 A comparison of organizational imprinting and path dependence**

According to Marquis and Tilcsik (2013), path dependence is distinct from imprinting as the latter is concerned with the stamping of the environment rather than historical events, “short sensitive periods rather than long-term event chains, and stability of the stamped-in-features rather than the increasing dominance of a pattern.”

They document three important differences between organizational imprinting and path dependence (see Table 2.1). The imprinting of organizational features takes place in a relatively short sensitive period, usually the time of founding. In contrast, path dependence is driven by a series of contingent events over a long period of time forming “institutional patterns or event chains that have deterministic properties” (Mahoney 2000, p. 507).

The organizational imprinting focuses on strong influence of the external environment at the time of founding on organizational features as opposed to triggers of path dependent processes.

The imprinting concept postulates that once specific organizational features are stamped in at the time of founding, these remain stable over time. On the other hand, path dependence focuses on the dynamic interplay of increasing returns and positive feedbacks that lend increasing prominence to organizational forms and practices (Sydow et al. 2009).



**Table 2.1: A comparison of organizational imprinting and path dependence**

	Organizational Imprinting	Path dependence
Influence of initial conditions	Very strong	Very weak
Source/triggering event	External environment at founding; founders' preferences	Contingent events
Sustaining mechanisms	Structural inertia; institutionalization	Self-reinforcement due to increasing returns to scale and positive feedbacks
Outcome	Persistence of structural properties; institutional stability	Lock-in on a specific path due to cumulative advantages that make alternative paths unviable

Source: Adapted from Vergne and Durand (2010)

Following Acemoglu (2012), a sharper distinction can be made between the notion of persistence as implied by organizational imprinting and path dependence in terms of dynamic processes. Formally, let  $X_t$  be a vector of some organizational attributes at time  $t$ . Then persistence can be modeled as a system of first order stochastic linear difference equations as follows:

$$X_t = \beta X_{t-1} + \varepsilon_t \quad (1)$$

According to equation (1), initial conditions would have a lasting impact as long as the stochastic process has a unit root. The path dependent processes, on the other hand, can be specified as:

$$X_t = f_t(X_{t-1}, \varepsilon_t) \quad (2)$$

In this formulation, how the dynamic path of  $X_t$  is shaped by initial conditions depends on random shocks  $\varepsilon_t$ . Path dependence would imply that the gradient  $\Delta f_t$  evaluated at a given  $X$  has eigenvalues close to 1 or in other words the dynamic stochastic process in (2) has a unit root. In mathematical parlance, equation 2 is also known as a Markov chain. In this characterization, a non-ergodic Markov chain would imply path dependence (Vergne and Durand 2010).

The non-ergodicity of the Markov chains implies that statistical properties of the process cannot be predicted on the basis of a single realization of the dynamic process. Whether or not a Markov chain is non-ergodic depends on the eigenvalues of the transition probability matrix.

From equations 1 and 2, it is clear that while initial conditions have a lasting effect in the case of persistence of imprints, path dependent processes are dominated by random shocks. In other words, the outcome of a path dependent process is

impossible to predict with certainty on the basis of initial conditions alone (Vergne and Durand 2010). This implies that the probability of any outcome of path dependent process conditional on initial conditions must be less than one, i.e.

$$P(\text{Outcome} \mid \text{Initial conditions}) < 1 \quad (3)$$

In essence, the imprinting theory is based on a causal relationship whereby the initial conditions and agents' choices, conditioned by contextual circumstances, create a dominating cause that influences structures and choices in the future. The initial conditions or choices are also important in path dependence but these conditions do not play a critical role in determining the final outcomes. That is, path dependence refers to a situation when institutional arrangements become sticky because of increasing returns and positive feedback mechanisms (Powell 1991). The above discussion shows that, though both concepts provide information about past patterns, there are significant differences between organizational imprinting and path dependence concepts.

## **2.2.2 The imprinting approach for the analysis of bureaucracy**

The concept of path dependence has its own significance yet it is not the favourite approach to explore the organizational features of the public bureaucracy for at least two reasons.

First, it focuses on chance events rather than the adoption of specific organizational features by design to achieve conformity with the prevailing environmental conditions (Marquis and Tilcsik 2013). The issue of adoption of organizational features by design is especially important in the context of public bureaucracy whose organizational structure reflects the inclinations of the founders such as

political actors towards particular bureaucratic forms, modes of governance and public policies. For example, Moe (1990) argues that political actors concentrate on expediency rather than efficiency considerations because of the need to make political compromises, which may design the bureaucracy.

Second, path dependence implies an increasing pattern of dominance of the organizational features and arrangements, as opposed to the stability of acquired organizational features (Marquis and Tilcsik 2013). The example of the persistence of the QWERTY keyboard is instructive here. Once the keyboard made its way into the market, more and more users adopted it and its production became increasingly profitable due to increasing returns to scale. As the keyboard proliferated and became a standard, it engendered positive feedback loops that further contributed to lower costs, increased profitability and still further adoption (David 1985). The theory of path dependence underscores random historical events that are exacerbated due to increasing returns to scale and positive feedback mechanisms. Consequently, organizational forms, strategies and products are dynamically locked-in and perpetuated owing to accumulated advantages (Powell 1991; Marquis and Tilcsik 2013).

Based on a comparative analysis of the two approaches, it is argued that the theory of organizational imprinting is a better approach to answer our research question.

First, organizational imprinting allows the study of how the bureaucracy is systematically shaped or imprinted by known initial conditions as well as the founders' preferences at the time of its founding.

Second, organizational imprinting provides a better explanation for the persistence of various organizational characteristics of the bureaucracy. For example,

according to organizational imprinting, bureaucratic methods and procedures can persist owing to the forces of structural inertia and institutionalization even without any positive feedback loops, which underlie path dependent processes.

Third, in contrast to the theory of path dependence, the theory of organizational imprinting allows the study of how economic conditions and founders' preferences towards bureaucratic forms and structure are embedded in the bureaucracy as an organization and hence are key determinants of bureaucratic performance especially in terms of economic policies and their outcomes.

Finally, the fact that the acquired features of the bureaucracy tend to remain fairly stable over time is better captured by the theory of organizational imprinting as against the theory of path dependence, which emphasizes an increasing dominance of organizational arrangements and practices. Furthermore, the theory of organizational imprinting uses the notion of inertia in a much broader sense including the presence of vested interest, tendency of practices to become normative standards, and threat of losing legitimacy in response to change.

Hence, the imprinting theory provides a coherent framework for understanding how economic and technological conditions, the political context, and individuals can leave lasting imprints on organizations which consequently affect their internal structures, capabilities and public policy decisions. Within this line of enquiry, the theory of organizational imprinting provides a frame of reference to underpin past patterns in an organization. Such a line of research can contribute in providing a temporal perspective on the persistence of organizational design such as powerful bureaucracy inherited at the time of founding (initial conditions) and its

unintended consequences in terms of corruption and rent seeking, which continued long after the founders were gone.

Following these observations, the rest of the analysis is primarily built on organizational imprinting insights. The assumption here is that organizations are initially shaped by the external environment prevailing at the time of their founding and then continue to retain their characteristics in the future because of the forces of inertia and institutionalization (Marquis and Tilcsik 2013).

In this context two research questions are especially investigated. First, in what way the historical and institutional context, predominantly the economic environment and founders' inclinations, shape the structure and mode of governance of the organization. Second, what phenomenon explains the stickiness of inefficient bureaucratic features emphasizing in particular bureaucratic control of public expenditure and corruption?

### **2.2.3 Selection of sources**

As noted by Pierson and Skocpol (2002), scholars interested in historical explanations traditionally rely on secondary sources of their data. Garud, Kumaraswamy and Karnoe (2010) underscore the importance of case study and narrative approach for providing historically entrenched explanations.

The qualitative information on the case study has been obtained from widely cited published historical accounts of the colonial bureaucracy in the Indian sub-continent as well as the post-independent bureaucratic set up in Pakistan.

Notable works that were cited for qualitative information include, Alavi (1973), Ali and Malik (2009), Braibanti (1963), Burki (1969), Cheema and Sayeed (2006), Dixit (2012), Ganguly and Fair (2013), Goodnow (1964), Gould (2013), Habib

(1973), Haque and Din (2006), Islam (1989), Kardar (2006), Kenny (2013), Maddison (1971), Washbrook (1999) and Wilder (2013).

The historical window analysed stretches right from the colonial roots of the bureaucracy during the British Raj (1858-1947) to the post-independence bureaucracy in Pakistan (1947-to present).

Within the methodological framework of qualitative case study, employing the concept of imprinting lays out how the relationship between the founder's preferences and current features of a bureaucratic agency has evolved.

It needs to be emphasized that the historical narrative covering pre- and post-independence periods has been deliberately kept succinct to focus more on implications that can be derived from organizational imprinting rather than a mere description of historical events. Based on the insights from the theory of organizational imprinting, it is argued that the colonial roots as well as the initial conditions at the time of independence have left a lasting imprint on Pakistan's bureaucracy particularly in terms of its powerful and ruling class status and corruption. Furthermore, it is shown that power relations as well as bureaucratic structure, work methods and routines are deeply entrenched in the bureaucracy through the forces of inertia and institutionalization.

## **2.3 The imprinting process: mechanisms and drivers**

The idea of imprinting can be traced to the seminal contribution of Stinchcombe (1965) who argued that organizations are shaped by their historical contexts. The organizations acquire specific attributes during their founding period that last long into the future due to economic, social and cultural factors that introduce inertia in business processes, behaviours, and norms. Focusing on employment patterns at the industry level, the study finds that industries established at a particular time exhibited similar employment patterns that were shaped by the socio-economic conditions prevailing at that time, implying a strong correlation between the formative years of the industries and their structures at present. Working along the same lines, Kimberly (1975) focuses on the organizational characteristics of sheltered workshops and demonstrates that the external environment and social philosophy prevailing at the time of their founding left a significant impact on the type and operational scope of these entities which lasted well into the future.

Following these early contributions, several studies have further developed these ideas and have explored how the external conditions including technological, economic, political, and social forces prevailing at the time of founding shape organizational forms, structures and attributes. The founding period is usually considered to be a particularly sensitive time during which an organization is more open, malleable and receptive to adopting specific structures in line with the demands of the external environment (Johnson 2007). DiMaggio and Powell (1991b, p. 73) argue that organizations exhibit a tendency to become ‘isomorphic’ with the external environment to avoid uncertainty and gain legitimacy (see also



Hannan and Freeman 1977). Reflecting further on this theme, Carroll and Hannan (2004) argue that the viability of particular organizational forms is dictated by the broader social and institutional context, which is 'mapped' onto the organization leaving a lasting imprint on key organizational features. Besides influencing the type of organization and its form at the macro level, the environment at the time of founding can also have deep influence on various micro level characteristics of an organization including management practices, staff composition, intra-organizational distribution of power, and other social attributes such as work ethics, and organizational norms and values (Marquis and Tilcsik 2013). In addition to the broader institutional context, founders of organizations also exert powerful influence on organizations by incorporating their strategic thrust and vision for managerial and operational aspects of the organizations (Mintzberg and Waters 1982; Eisenhardt and Schoonhoven 1990; Johnson 2007).

More specifically, a significant body of literature has analysed various aspects of organizational imprinting focusing in particular on how organizations are shaped by their founding environment and how various organizational attributes such as business methods and processes, norms, values, ethics, and behaviours are embedded in the organizational cultures through imprints of the past that persist over time.

In the following we will briefly sketch out some key features of the imprinting theory that can hint to the relevance of taking imprinting into account for a proper understanding of institutional factors prevailing in the bureaucracy.

## **2.3.1 The mechanisms of imprinting**

Marquis and Tilcsik (2013) consider three major mechanisms of imprinting including economic conditions, institutional conditions, and the imprints of individuals on organizations. Several studies have examined how organizations can carry imprints of the economic and technological conditions in terms of various outcomes and processes at the level of organization as well as at the levels of sub-processes and individuals working in the organization. For example, research has shown that organizations established during a favourable economic environment with better financing options tend to develop better business strategies and service delivery that persist well into the future (Boeker 1989a; Tucker et. al. 1990). Similarly, organizations tend to persistently follow the technological conditions prevailing at the time of their founding due mainly to standardization and high replacement costs (Zyglidopoulos 1999). A good example of how the broader economic system leaves lasting imprints on organizations is firms in eastern European countries which retained their 'socialist imprints' long after their transition to market oriented economies (Kriauciunas and Kale 2006). Similarly, research has shown that older firms in China that were steeped in the socialist tradition are still mired in socialist era business practices showing a strong influence of imprinting of the overall economic environment (Peng 2004; Marquis and Qian 2013).

Some studies have argued that the overall institutional environment including economic, social and political institutions play an important role in shaping organizations. Organizations found within a particular institutional context tend to imprint prevailing norms into their eco-systems, which are retained well into the future. For example, research on semi-conductor firms has shown that the

availability of financing options during their founding period produced a lasting impact on the firms' business strategies (Boeker 1989a; Tucker et. al. 1990).

Similarly, the bureaucratization of older finance agencies in the US has been traced to extensive legislation prevailing at that time (Meyer and Brown 1977). A study of the Paris Opera shows that the interplay of the institutional conditions prevailing at the time of its founding and the cultural entrepreneurship of its founder created a lasting impact on its strategic choices with far reaching implications for the organization (Johnson 2007).

Marquis and Huang (2010) examine firms established in different US states and show that firms established in states where the regulatory apparatus fostered intra-organizational coordination were more likely to acquire other firms to exploit their previous coordination experience. In a study of four US state governments' decisions to adopt generally accepted accounting principles, Carpenter and Feroz (2001, p. 592) attributed the resistance to adopt these principles to various factors including the imprinting of institutional context manifested in the persistence of their past accounting practices. Research has also highlighted different ways in which the institutional context can be imprinted on individuals. For example, the broader institutional environment and the organizational culture can leave an imprint on individuals in terms of their work habits, beliefs and values (Higgins 2005; Dokko 2009). Similarly, an unfavourable macro-economic environment during the formative years of an individual would tend to make the individual conservative in his approach and this attitude can persist in the later years of his career (Schoar and Zuo 2011; Malmendier and Nagel 2011). Research has also highlighted the role of internal economic conditions within an organization on individual level imprinting (Kacperczyk 2009; Tilcsik 2012). For example,

individuals whose careers are shaped during periods of strong finances in the organization develop different attitudes towards risk taking and financial decisions than those whose careers are formed during times of financial scarcity and such differences then tend to persist into the future.

Some studies have explored how individuals themselves can be a source of imprints both on organizational building blocks as well as on other individuals. For example, individuals, particularly the first incumbents, may imprint a particular position within an organization through their social and educational background, experience and skills, leaving a defining stamp that will continue to shape the behaviour of future entrants (Burton and Beckman 2007). Similarly, the behaviour of individuals themselves within an organization is shaped by their own experiences during their initial years that can persist well into the future. Finally, individuals within an organization can imprint other individuals as experienced incumbents can leave an imprint on the behaviour and attitudes of new entrants and such attributes tend to be retained by them in the long term (McEvily et. al. 2012).

### **2.3.2 The drivers of imprinting**

A key feature embodied in the idea of imprinting is the persistence of various organizational traits acquired at the time of founding. Hannan and Freeman (1984) argue that once organizations adopt specific strategies and practices, it is difficult to dismantle these due to the difficulty of reversing investments and structural inertia. Simply put, in order to secure reliability and accountability agents repeat the same decisions as were made in the past.

These ideas have been further developed by organizational ecologists who argue that the persistence of various organizational features can be attributed to three powerful and complementary forces (Marquis and Tilcsik 2013).

Forces of inertia play a major role in the persistence of organizational imprints by locking-in organizational traits.

The institutionalization of norms, beliefs and practices contributes to the persistence and reproduction of organizational imprints.

Other traditionalizing forces including vested interests may perpetuate the existing organizational structures and processes. Furthermore, these forces are not mutually exclusive and may either work alone or in tandem to induce persistence of various attributes of an organization.

“Structural inertia” is defined as the persistent resistance of an organization to change in response to a changing environment (Hannan and Freeman 1984). However, there is no fixed theory that explicitly explains the causes of structural inertia. Some of the main historical approaches employed to understand inertia include path dependence, imprinting, or commitment with an organization. According to Hannan and Freeman (1984), the forces that contribute to structural inertia may be internal and/or external to the organization. There are several internal factors that can lead to structural inertia in organizations. For example, an organization may have incurred sunk costs in its systems, work methods, and personnel training which may force the organization to adhere to its original structures and processes. Similarly, the dynamics of political coalitions within an organization may prevent change in business strategies and modes of operations. Another important force that is internal to an organization and contributes to

structural inertia is the tendency for established norms, processes and values to become normative standards and hence difficult to change. The external factors that can lead to structural inertia include regulations that govern the activities of an organization, inter-organizational relations, and the threat of losing legitimacy in response to radical change.

A multi-disciplinary literature under the rubric of 'new institutionalism in organizational analysis' draws on economic, social and cultural explanations for the institutionalization and hence persistence of various organizational norms, beliefs, strategies, attitudes and routines (Powell and DiMaggio 1991). Meyer and Rowan (1991) delineate the institutionalization processes through which organizational traits and behaviours assume a rule-like status and become embedded in social thought and action. Organizations tend to incorporate these institutionalized rules in their structures to acquire resources and legitimacy that could lead to better chances for their survival. Jepperson (1991, p. 145) views the process of institutionalization as a social pattern that has a built-in reproductive process that resists change. Seen in this light, institutions can reproduce themselves not by action but by 'self-activating social processes' that contribute to the persistence of organizational characteristics.

Powell (1991), on the other hand, takes a broader view of institutional reproduction and highlights four avenues of institutional reproduction including the exercise of power, complex inter-dependencies, taken-for-granted assumptions, and path-dependent development processes. To elaborate, organizational characteristics may persist through the deliberate efforts of individuals who have the power to control organizational processes and who have an interest in maintaining the system. Organizational routines and processes may also persist due to

organizational inter-dependencies that create complex linkages making it difficult to change one aspect without disturbing the whole chain. One example of such persistence of organizational forms is the reluctance of US automakers to revamp their assembly lines even in the face of declining demand for big cars (Powell 1991).

Similarly, organizational routines can persist as taken-for-granted rules, which become accepted practice. Finally institutional arrangements may become difficult to move due to path-dependence that makes such arrangements increasingly viable due to increasing returns and positive feedback mechanisms.

To sum up, a diverse body of literature has explored how the external environmental context imprints organizations and how such imprints tend to persist over time. Organizations are particularly sensitive to imprints of the external environment at the time of founding because they are not saddled by any historical baggage and hence are open to the adoption of new forms, practices and strategies. The social and institutional context prevailing at the time of founding dictates the viability of particular organizational forms and defines the constraints and resources that determine operational scope, strategies and capabilities of the organizations. As organizations strive to achieve a fit with their external environment, they acquire specific attributes that range from organizational hardware such as technological apparatus and routines, human resources and business methods, right up to the software of the organizations such as norms, values, attitudes and beliefs. With the passage of time, such organizational characteristics become embedded in the organizational culture and tend to persist because of the forces of structural inertia and institutionalization. These insights have been applied not only to understand the genesis of organizational forms,

structures and attributes in terms of their historical and institutional contexts but also to seek plausible explanations for why organizations exhibit a tendency to remain locked-in to their past structures, routines and practices despite the availability of better options. By using a multi-disciplinary approach that incorporates economic, sociological and organizational perspectives, the literature on organizational imprinting contributes to a broader understanding of the role of historical and institutional factors in shaping organizations.

## **2.4 Foundation of the powerful bureaucracy: the English leviathan**

Before applying the insights of the organizational imprinting theory to provide a factual account of how organizations are conditioned by their past, this section traces the colonial roots of the bureaucracy in Pakistan. In tracing the colonial origins of the bureaucracy, it is instructive first to explore the type of colonial settlement in the Indian sub-continent. The literature on the historical origins of institutions has argued that the type of institutions shaped by the colonial rulers critically hinged on the extent of European settlement in the colonies which in turn was determined by the mortality rates for the settler population (Acemoglu et al. 2001a; Nunn 2008a). In colonies with low settler mortality and resultantly a larger share of settler population, the colonizers had an incentive to establish institutions that promoted rule of law and property rights, which underpinned their economic development. On the other hand, colonies with high settler mortality and a consequently low share of the settlers in the population mainly saw the emergence of extractive institutions as the settlers had little incentive to establish growth-promoting institutions in these colonies. The contexts that led to the foundation of



a powerful elitist class of bureaucracy in Sub-Continent are summed up in the following.

India was not an attractive place for European settlers due mainly to the high population density and local disease environment such as malaria, which signified a high mortality rate for European settlers (Acemoglu et al. 2001b; Arnold 1983). Consequently, European settlement in the Indian sub-continent remained sparse (there were only 168,000 British in India in 1931, up from 31,000 in 1805 Maddison 1971) leaving little incentive for colonizers to establish institutions conducive to economic development and growth. Furthermore, during the reign of the British East India Company, land holdings out of towns were barred which effectively discouraged European settlers. As a matter of fact, the East India Company was not too keen to attract settlers as it feared that a greater number of European settlers would threaten its monopoly rights and other privileges including revenue collection (Marshall 1990). With a low degree of European settlement combined with its early experience of extraction by the East India Company, the Indian sub-continent became a colony of extraction (Acemoglu et al. 2001b). The company had monopoly rights in a wide range of products including opium, salt, woods, minerals, tobacco, alcohol and betel (Washbrook 1999). There is more to the story of extraction in the Indian sub-continent which then became embedded in the Indian bureaucracy as well. The East India Company controlled the land revenue system and had the right to collect revenues through direct taxation of the farmers which was frequently revised and raised to extract more and more from the poor peasants often pushing them into destitution (Washbrook 1999). The company's right to collect taxes in the states of Bengal, Bihar and Orissa alone gave it access to a tax base of 20 million people with annual

tax revenue of 3 million pounds (Marshall 1998). India being predominantly a rural economy, the extractive practices of the Company adversely impacted the Indian economy by squeezing agricultural output (Bayly 1988; Marshall 1998). The monopoly rights of the Company, which restricted competition and allowed the company to extract monopoly rents, further exacerbated this economic decline. With the economy in the doldrums, the local population became increasingly rebellious which consequently resulted in the armed struggle of 1857 that uprooted the reign of the East India Company and the Indian sub-continent came under the direct control of the British crown.

The British in the Indian sub-continent faced the challenge of governing a vast, ethnically diverse, multilingual, and multi-religious population that was often rebellious and not easily controlled. The administrative service introduced by the East India Company was rudimentary, fragmented and lacked the control mechanisms to govern a vast and diverse continent. The Company primarily had trade interests and thus showed little concern for broad-based administrative functions.

In order to meet the pressing governance challenges at the time, the British thus laid the foundations of a strong and powerful bureaucracy, the Indian Civil Service (ICS), which was supposed to provide administrative functions, serve as collector of revenues, and maintain law and order. All of this required the vesting of powers in the bureaucrats to allow them to effectively control a fractious population and extract revenues. Thus, bureaucrats used their absolute powers to collect revenues for the British crown and in the process the bureaucrats often indulged in corrupt practices to maximize their rents in collaboration with local elites that included big landlords and industrialists (Gould 2013; Wilder 2013). So the colonial rulers in

the sub-continent sowed the seeds of a powerful, extractive and corrupt bureaucracy. Corruption in bureaucracy was further amplified by the Official Secrets Act 1923 which aimed to restrict the flow of information between the government and the general public. The law was originally designed to protect sensitive security related secrets, but it was abused by corrupt officials to cover up their corrupt practices (Stocker 2011). The bureaucracy was a cadre based and strong hierarchical system dominated by British officers especially in higher echelons who wielded immense administrative power and enjoyed various perks and privileges, which included palatial bungalows, and membership of exclusive clubs. Being representatives of the British crown, the officers had an elitist mindset and maintained their exclusiveness by restricting entry of the locals into the civil service. The induction of Indians into the civil service was governed through a competitive examination, which meant that only people with good education and command over the English language were able to qualify. The examination was conducted in English and was designed to maintain significant entry barriers for the local population (Cheema and Sayeed 2006).

Consequently, the few Indians who managed to enter the civil service belonged to a small segment of local elites who were highly westernized and owed their allegiance to the colonial regime. Despite the induction of Indians into the bureaucracy, the civil service remained far from being indigenized and rather continued to be elitist and serving the interests of the colonial rule (Cheema and Sayeed 2006). These Indians together with their British counterparts constituted a powerful, exclusive and elitist class of civil servants, with its own “*esprit de corps*” which dominated the colonial administrative apparatus in the Indian sub-continent (Hussain 1979; Islam 1989).

The political control of the bureaucracy rested with the Viceroy who was the representative of the British Crown in India and who managed administrative affairs through provincial governors. The Viceroy and provincial governors functioned under the umbrella of an Executive Council. The Viceroy held sway over authority in the Council, which was just an endorsing body for decisions already taken by the Viceroy and governors (Tinker 1966).

While the bureaucracy implemented policy directives from the Viceroy, the bureaucrats tolerated no other outside influence. Within the vice-regal system, the bureaucracy held paramount importance while other domestic factors including local politicians were not consulted and thus had no role in administrative matters and policies. The civil servants were thus not attuned to working with local politicians and tended to govern authoritatively only under the command of the British Crown (Ahmad 1964). With Imperial control over politics, and weak local political and legislative institutions and interest groups, the bureaucracy faced no domestic pressure to uphold and promote the public interest (Kennedy 1987). The most important function of the bureaucracy was revenue collection, which required effective law and order to create a secure environment for revenue collectors who often faced resistance from the local population. Consequently, the British established a command system with strong local administrative apparatus – known as District Administration – that was meant to quickly and effectively deal with law and order situations (Goodnow 1964). This powerful administrative group was the *crème de la crème* of the colonial bureaucracy with the Collector/Deputy Commissioner at the helm of the district administrative affairs. Such was the power of the Collector that he was popularly dubbed as ‘the judge, jury and executioner’ (Kenny 2013, p. 11). These local administrators were given

absolute powers to deal effectively with local conflicts so that the extractive functions of the state were not disrupted (Braibanti 1963). Often these local administrators sought the support of local elites to maintain law and order in their districts and this resulted in the development of patron-client relationships at the local level.

As a matter of fact, these patron-client relationships were part of a much broader strategy of the British to forge alliances with local elites to stabilize and consolidate their rule, gather information to mitigate their information disadvantages, and facilitate the collection of land revenues. The British relied heavily on these relationships especially during the uprising of 1857 when British allies among the rural elites helped to quell the uprising. In return for their loyalty, the British bestowed favours on such groups in the form of land grants and other privileges (Ali and Malik 2009). The bureaucracy played a central role in establishing and fostering such relationships and used these as instruments not only to leverage their administrative power but also to seek rents in return for their favours to the local elites. The alliance of the bureaucracy with the local elites was the bedrock of corruption during the colonial regime. The local elites had a long tradition of being partners in extractive practices especially during the reign of the East India Company when such groups gained immense prosperity by colluding and cooperating with the Company in its economic plunder and extraction of land revenues (Acemoglu et al. 2001b). The local elites thus had an incentive to perpetuate extractive institutions and were willing partners with the bureaucracy in corrupt practices. The role of elites in corruption has been particularly emphasized in colonial regimes where European settlers were in a minority and elites were powerful (Angeles, Kyriakos and Neanidis 2010).

The bureaucracy controlled vast segments of the Indian economy. Being predominantly an agrarian economy, irrigation played an important role in the economic development of the Indian sub-continent. The bureaucracy developed a centralized irrigation management system to control the distribution of canal water, which was the most valuable and prized resource for the Indian farmers. The bureaucratic grip over the irrigation system provided the bureaucracy with a powerful tool to control agricultural output and through this the bureaucracy exerted an enormous influence on the local landed class and peasants alike. In addition to irrigation water, arable land was another precious resource in the Indian economy and the bureaucracy had complete control over this resource as well as through the system of land grants, transfers, and acquisitions. In an environment with weak political oversight and lack of bureaucratic accountability, the control over precious resources was a potent instrument in the hands of the bureaucracy to maximize rents (Ali and Malik 2009).

When the British left the sub-continent, they left a powerful legacy in the form of colonial bureaucracy that was steeped in authoritative culture and had deep influence in the socio-economic spheres. Pakistan inherited this bureaucratic set-up at the time of independence. As emphasized by Teece, Pisano and Shuen (1997, p. 522), “bygones are seldom bygones”, and so was the case with the bureaucracy in Pakistan.

The newly established Civil Service of Pakistan was mainly carved out of the colonial bureaucracy and retained many of the characteristics of the colonial era as detailed in the next section.

## **2.5 The bureaucracy in the post-colonial period: the institutional change**

At the time of independence, Pakistan established the Civil Service of Pakistan that was essentially a descendent of the Indian Civil Service ‘in law as well as in spirit’ (Braibanti 1963, p. 389). The civil service was structured and designed strictly along the lines of the Indian Civil service with a powerful hierarchical system of administration. The Civil Service of Pakistan was just a renamed version of the colonial era Indian Civil Service with its form, structure and functional characteristics intact (Cheema and Sayeed 2006). During the formative period, Muslim Indian Civil Service officers who opted for Pakistan as well as some British officers who were hired on contract manned the service. With the appointment of three out of four provincial governors from the British officers, this bureaucratic apparatus quickly gained the prominence and the status of a ruling class. The bureaucracy assumed a powerful position early on as the Governor General directly consulted the provincial governors and senior secretaries – who were all civil servants – without any political consultations (Braibanti 1963; Islam 1989). Though the induction of British civil service officers was phased out during the initial years, their elitist and ruling class mind-set persisted as the new entrants into the civil service internalized these attributes through ‘training and indoctrination’ (Hussain 1979).

Political institutions during the initial years were very fragile and lacked the broad-based popular support and clout to effectively govern the fledgling country facing myriad socio-economic challenges. The major challenges for the new government were the rehabilitation of millions of refugees who migrated to Pakistan, the

establishment of an effective system of governance, and revival of the economy. The bureaucracy quickly filled the power vacuum left by weak and fragmented political institutions and forged an alliance with the powerful feudal class to strengthen its administrative rule (Burki 1969).

As a matter of fact, the stunting of the political institutions during the early years has been blamed on powerful bureaucrats who loathed the democratic institutions and thus actively worked to weaken the political process (Ganguly and Fair 2013). Once accustomed to power, bureaucrats tend to use discretion in their decisions and governing relationships. As Wood and Waterman (1994, p. 231) put it “Bureaucracies also have powers in their own right, and sometimes use that power to alter outcomes in their relations with other actors”. This use of bureaucratic discretion translates the bureaucrats’ preferences into economic policies.

In the absence of a strong middle class and effective political checks and balances on bureaucratic rule, this axis of power was the predominant and authoritative force that ruled Pakistan (Alavi 1973). Soon after independence, the army came to the centre stage of politics and found the bureaucratic-feudal nexus as a convenient partner in extending its rule over the country. With its control over a highly centralized administrative apparatus, the bureaucracy played a central role in this triumvirate structure of power with most decisions of public policy made by senior bureaucrats and military officials (Islam 1989). During most of the early and subsequent military rules, the bureaucracy remained a powerful player and the ‘bureaucratic-military oligarchy’ largely controlled the policy-making process. The bureaucratic-military nexus also strived to undermine political development to perpetuate their power and rule (Haque 1997). The bureaucratic control over policy and administrative functions was further strengthened by three factors



(Cheema and Sayeed 2006). First, the bureaucracy effectively strived to gain autonomy through constitutional protection in 1962, which insulated the bureaucracy from political control, and consequently the bureaucracy had virtually a free hand in policy formulation and implementation. Bureaucratic autonomy may be desirable when bureaucracy plays by the rules but the politicians often have narrow and personal interests. However, if the bureaucracy is powerful and is prone to abuse of authority, then bureaucratic autonomy can lead to undesirable outcomes (Cheema and Sayeed 2006). The power of the bureaucracy was further reinforced by the introduction of the system of 'Basic Democracies', which gave greater control to the bureaucrats over the local political actors. Second, the bureaucracy was at the centre of the interventionist model of development followed in the early years and this gave the bureaucracy a large sway on the economy and enabled the bureaucrats to maximize their rents (Nadvi and Saeed 2003). Third, the bureaucracy developed interlocking ties, based on mutual interests and favours, with domestic elite groups including leading business houses and feudal landlords, and devised policies to protect their interests without any fear because all the powerful actors had a stake in perpetuating this system. For example, wealthy and influential individuals are allied in a network based on mutual favours and corruption, and then the threat of exposure compels them to perpetuate their influence and power (Rose-Ackerman 1996).

The bureaucracy retained its predominance even during political regimes, which were often marred by political instability and hence needed the support of a strong administrative apparatus to deal with the challenges of governance. As Wilder (2009) illustrates, Pakistan's bureaucratic institutions have been much stronger than its political institutions ever since its independence from the colonial regime.

During the early years of political government in Pakistan, there were no clearly defined policy guidelines from the political leadership and hence the bureaucracy autonomously took policy decisions thus retaining its colonial mode of administration i.e. policy formulation and execution without political control and oversight (Cheema and Sayeed 2006). In a weak, unstable and fragmented political structure, politicians tend to lack long-term goals and rather have shorter time horizons, focused on maximizing their short-term gains (Rose-Ackerman 1996). The bureaucracy remained at the centre of power even during the democratic regimes when the political institutions were somewhat consolidated, not least because the bureaucrats were able to leverage their specialized administrative knowledge combined in many cases with their professional expertise to hold sway over politicians especially in the public policy arena (Haque 1997). It is thus not surprising that observers have generally recognized that in Pakistan, the bureaucracy, thanks to ineffective legislative control over policy making has assumed the roles of both policy formulation and implementation (Shafqat 2014).

A hallmark of the bureaucracy during both dictatorial and democratic regimes has been its ability to develop strong linkages both with the ruling elite and other powerful segments of the society including big businesses and landed aristocracy. While such alliances during dictatorships naturally arose out of the necessity of the dictatorial regimes to consolidate their rule without significant opposition from the bureaucracy and the civil society, even the democratic set-ups saw the emergence of such alliances thanks to political coalitions that bestowed privileges on special interest groups including industrialists and big landlords (Ali and Malik 2009).

In this network of power, politics, and privileges, the bureaucrats and politicians drew their power from their regulatory control over the economy and public policy while elites held control over productive assets. This system of mutual interests and favours ensured that economic policy was geared towards protecting the interests of the big businesses who in return provided support and favours to the ruling elite and bureaucracy (Ali and Malik 2009).

Nothing describes the lingering colonial legacy of power and privileges of the bureaucracy more vividly than the case of the District Management Group (DMG), an elite and prestigious cadre of civil service that provides administrative functions at the local level. This group is the direct descendant of the district level administrative apparatus established by the British in the sub-continent under the umbrella of the Indian Civil Service. As in the colonial era, the group enjoys immense power through its control over instruments of law and order and collection of local level revenues. Among all the civil servants, members of this group enjoy a special status and are the so-called Brahmins of the bureaucracy with their clout extending deep in the society. Given its immense power and prestige, it is not surprising that the group remains as one of the most favoured choices for the new entrants in the civil service (Khan and Din 2008).

To sum up, Pakistan inherited a civil service that had its roots in the colonial period during which the British established a powerful and elite administrative organization meant to rule, ensure political stability and extract revenues in an environment that was devoid of electoral representation and parliamentary oversight. The bureaucrats enjoyed immense power and drew support from a coalition of landed aristocracy and other elite groups to develop a system of mutual rewards in the form of perks and privileges for the bureaucrats and patronage to

the elite in the form of grants and land titles. The colonial rule therefore put in place a strong bureaucratic system that thrived on patron-client relationships and rent seeking. This institutionalization of power and rent seeking behaviour continued in the post-independence period when the bureaucracy developed new patron-client relationships with powerful industrial groups and landlords (Wilder 2013). Since political institutions were not developed, the bureaucracy remained the key player in economic decision-making and bureaucrats enacted policies without any fear of accountability. Despite a change in the socio-economic context and institutional environment, this set up has continued to this day and bureaucracy in Pakistan retains the status of a ruling class and a symbol of power and social status geared more towards consolidation of its power, perks and privileges rather than the delivery of an effective public service (Kardar 2006).

While the case of Pakistan's bureaucracy illustrates how colonial legacy carried its imprints, similar experiences have been documented in other former colonies as well. For example, both Zambia and Mozambique inherited bureaucratic institutions that carried the imprints of their former colonial rulers (Nkomo 1986). In Zambia, for instance, the professional training of officers in routine administrative matters was designed in line with the colonial administrative practices, which ensured continuity of colonial administrative systems. Such administrative systems relied on colonial practices to rule by power but these were inappropriate for development purposes. Similarly, bureaucracy in Bangladesh is viewed as a carrier of British legacy with poor public service delivery, inefficiency and lack of accountability and transparency (Ferdous 2016). These examples suggest that there is sufficient objective reason to argue that colonial legacy has tended to persist through the process of imprinting. The next section thus details

how imprinting works to perpetuate the colonial legacy of the bureaucratic organization, focusing on Pakistan as a case study.

## **2.6 The traditionalizing forces that kept the imprints in place**

The preceding sections have provided a historical perspective on the evolution of the bureaucracy focusing in particular on the colonial heritage and subsequent developments that played a significant role in shaping the bureaucratic organization. This section situates the historical evolution of the bureaucracy within the theory of organizational imprinting with a view to understanding, first, how the environmental conditions imprinted specific traits on the bureaucracy. Second, it explores the question of why the imprints of various attributes acquired by the bureaucracy during its founding period have persisted over time. In particular, it focuses on how forces of structural inertia and institutionalization can explain the persistence of various traits of the bureaucracy including its ruling class and elitist orientation, culture of rent seeking, structure and routines, patron-client relationships as a mode of governance, and economic policy stance.

### **2.6.1 The cadre based structure of the bureaucracy**

As already discussed in the section 2.3, the importance of external environment in shaping the characteristics of organizations during a 'sensitive period' when an organization is stamped with the imprints of its environment. The founding period is usually taken to be a particularly sensitive time during which an organization is more open, malleable and receptive to adopting specific structures in line with the demands of the external environment. During this period, an organization is

particularly susceptible to external environment because it has no historical baggage and hence can easily adopt new structures and strategies that match the environmental context. Marquis and Tilcsik (2013, p. 205) characterize the external environment as a “richly textured, multi-faceted space, rather than a homogenous, one-dimensional force.”

Building on the same premises, the external environment during the sensitive period shaped the characteristics of the colonial bureaucracy. The sensitive period starts at the founding of the Indian Civil Service after the British crown formally gained control from the East India Company in the aftermath of the armed struggle of 1857. As described in the Section 2.4, the British were facing enormous challenges of governance in an environment characterized by a sagging economy, a hostile population, and the rubble left by the armed struggle. Consequently, the colonial regime needed a powerful organization that could effectively deal with the challenges of law and order and thus help strengthen its rule while at the same time ensuring smooth collection of revenues. Against this backdrop, the British established a powerful and highly centralized bureaucracy – an imprint of the environment – that was mandated to exercise its administrative power to protect colonial interests. The cadre based structure of the bureaucracy was designed to provide an effective centre of governing power that could perform complex administrative tasks in multiple arenas ranging from local administration to economic management and from social services to the provision of physical infrastructure. This structure of the bureaucratic organization is consistent with the view that organizations tend to incorporate the complexity of their environment into their own structures, which reflect a greater level of administrative complexity (Scott 1991).

## **2.6.2 Ruling class and elitist culture**

Another trait that the bureaucracy acquired at the time of its founding was the ruling class and elitist culture which shaped bureaucratic attitudes and power relations both within and outside the organization. In the absence of effective political institutions, the bureaucracy was the sole centre of power that governed without any challenge to its authority. Fligstein (1991) observes that organizations are shaped by the institutional contexts in which they operate and one aspect of this institutional context is their relation with the state, which is supposed to specify the rules of the game for the organization. According to Fligstein (1991, p. 314), “the state is a set of formal organizations that interacts in much the same way as other organizations.” In this sense, though bureaucracy is an organization of the state, it interacts with other state organizations, which set the rules for it.

However, in the context of colonial bureaucracy the state was the imperial government, which wanted the bureaucracy to have absolute authority to strengthen the colonial rule. So the bureaucracy was moulded by design as a powerful organization singularly controlling all administrative functions including the formulation and implementation of public policies. Hofstede (1985) emphasizes that organizations tend to embed the values and norms of their founders into their routines and cultures. Seen from this perspective, the British being the colonial power had a ruling class and elitist orientation and consequently the bureaucracy was infused with a ruling class and elitist ethos mirroring the norms and values of its founders. The ruling class and elitist character of the bureaucracy had a direct bearing on bureaucratic attitudes and modes of administration reflected in its aloofness from local society including local political actors and its authoritative style of governance.

Not surprisingly, the locals viewed the Civil Service Officers as a breed apart and popularly referred to them as Mai-Bap or mother-father because of the latter's high social status and power (Kenny 2013).

### **2.6.3 Networks of power and patronage**

As emphasized by DiMaggio and Powell (1991b), organizations tend to achieve a fit with their institutional environment to deal effectively with their functional responsibilities. During the colonial rule, the bureaucracy became a powerful ruling class because of weak domestic political institutions that left a power vacuum, which was naturally filled by the imperial bureaucracy. With fragmented political power, the institutional environment immediately after independence simply reinforced the bureaucracy as a powerful player. The lack of populist pressure helped the bureaucracy to retain its colonial status of a ruling class that governed authoritatively without any accountability especially from domestic political actors (Cheema and Sayeed 2006).

While the environmental context ensured the continuity of the bureaucracy as a powerful organization, the bureaucracy subsequently strived to perpetuate its power through forging alliances with other centres of power or through efforts to constrain the political authority (Cheema and Sayeed 2006). This behaviour seems consistent with the new institutionalisms' arguments that once an organization gains a position to assert its control, it invariably strives to expand its jurisdiction, and agents who stand to gain from such a system of power will tend to invest effort in maintaining their dominance (Powell 1991). Moreover, dominant organizations within an organizational field tend to continuously pursue strategies to maintain their power (DiMaggio and Powell 1991b). Powerful organizations can even go to



the extent of attempting to influence their environmental context through moulding their relational networks so as to make them conform to their objectives as well as through attempts to gain social acceptance of their goals and purposes as institutional rules (Meyer and Rowan 1991). Viewed from this perspective, the persistence of the powerful bureaucracy and its dominance in the axis of power can also be seen as emerging from the elaborate efforts of the bureaucracy to shape its relations with political institutions and civil society in a way that relevant actors take the distribution of power as an accepted mode of governance. As discussed in the previous section, the bureaucracy formed patron-client relationships with the ruling elite to maintain its power. Also, it effectively worked to limit political authority over its functions. For example, it succeeded in gaining autonomy through constitutional protection in 1962, which gave it a free hand in policy formulation and implementation without political oversight.

Besides the bureaucracy's strategies to perpetuate its influence and power in the organizational field, forces of institutionalization and inertia can also sustain bureaucratic power. Organizations tend to persist with patterns of authority that, with the passage of time, achieve the status of 'objective social fact', which lends social acceptance and legitimacy to the existing power relations (Boeker 1989b; Zucker 1991, p. 83). Furthermore, forces of inertia also contribute to the persistence of the authoritative bureaucratic apparatus. Organizational patterns of authority exhibit strong inertia because they are systems of power sustained by the interests of key actors in the status quo which confers benefits to those who wield power and control resources of the organization (Fligstein 1991). The power of bureaucracy means a certain scope, structure and purpose in terms of the

bureaucratic control on policies and programs, and those controlling powers have a vested interest in perpetuating the system.

The forces of inertia can also help explain the persistence of patron-client relationships, which formed the backbone of the governance strategy, adopted by the British and the same mode of governance continued after independence. The key insight here is that organizations learn from their experience and become committed to arrangements that result from early successes (Powell 1991). Developing patron-client relationships was an effective and successful strategy for the British to govern a vast empire with a thinly stretched bureaucracy. The support provided by the local elites was necessary for the colonial rulers not only to strengthen their rule but also to gain legitimacy in society. After independence, learning from the organizational memory, (see Walsh and Ungson 1991 for a detailed treatment of the notion of organizational memory) the bureaucracy forged new alliances with feudal landlords and industrialists thus retaining the patron-client relationships as a mode of governance. Another reason for the persistence of such arrangements is the presence of vested interests that benefit from the system and hence strive to perpetuate it (Powell 1991). The patron-client relationships created stakeholders in the bureaucracy and expanded their links with influential businesses to actively work to consolidate the system.

Institutional theorists have highlighted the acquisition of organizational structures and models by organizational actors that are thought to be appropriate or rational within a given environmental context (Scott 1991). Viewed in this light, the model of governance through patron client relationships can be seen as a deliberate strategy of the colonial regime to consolidate its rule. More specifically, the colonial regime in the sub-continent critically needed the support of the local

population to effectively govern a geographically expansive and culturally diverse country. Local elites who had considerable influence in the society through their control over the means of production were natural allies. Being the operational arm of the colonial regime, the bureaucracy was at the forefront of developing such alliances to protect colonial interests. This mode of governance inevitably resulted in a culture of rent-seeking – another imprint of the environment – as the players involved in the alliance tended to maximize their mutual benefits. It is important to emphasize here that rent-seeking and corruption, though entrenched in the bureaucratic culture, may simply have been an unintended consequence of a particular mode of governance necessitated by the given environmental context.

## **2.6.4 The persistence of policy stances**

The economic environment at the time of founding is believed to strongly influence various organizational attributes including operational scope, management principles and business strategies (Carroll and Hannan 1989; Marquis and Tilcsik 2013). In the case of colonial bureaucracy, the economic environment was a critical factor in determining what type of economic policies and programs were needed to administer the economy. Though the monopoly rights of the East India Company were phased out in 1833, the key commercial and business interests remained in the control of foreigners and the British regime protected these through regulatory measures thus exhibiting an interventionist model of economic management. On the other hand, the British regime had a development orientation too as far as it protected its economic and other interests (Maddison 1971). It is well known that the British developed a vast network of railways and an irrigation system in the sub-continent, which were a boon for the local economy.

Consequently, the economic policy paradigm, which the bureaucracy adopted, was one of state-led development with extensive intervention in the economy to maintain monopolistic domination of the foreign owned business interests.

A defining characteristic of the historical imprints is their persistence over time despite changes in environmental conditions (Marquis and Tilcsik 2013). Since the independence of Pakistan from British rule, the socio-economic and political landscape has undergone considerable changes, but the bureaucracy, which Pakistan inherited from the colonial rule, has defied change and has retained many of the characteristics of the colonial era including power and privileges of the bureaucrats, a culture of elitism, and distrust of politicians. As Habib (1973, p. 117) notes:

*“Apart from being unequal, authoritarian and unscientific and an instrument of colonial rule, the administrative system in Pakistan has doggedly defied the winds of change and in the process has earned a nation-wide disgust and dislike. It has blighted creative and professional talent everywhere and has vitiated the educational system. It has hindered the founding and flowering of democracy and people's sovereignty”.*

Describing the characteristics of the bureaucracy in Pakistan during the same period, Ziring and LaPorte (1974, p. 196) observes:

*“The higher or elite bureaucracy in Pakistan held enormous power and enjoyed exceptional privilege. Their contempt for the politicians and their paternal management of the public produced the abrasive reactions that characterized Pakistan government”.*

Besides the persistence of authoritative rule and power and privileges of the bureaucrats, the bureaucracy continues to display other colonial era characteristics including interventionist economic policies and rent-seeking. At the time of independence, Pakistan inherited an economy that was dominated by feudal landlords and a few powerful industrial magnates who became allies of the

bureaucracy to gain preferential treatment in economic policies in return for their favours to the bureaucrats. Consequently, economic policies were mainly aimed at protecting the interests of the landlords and industrialists. For example, agricultural income was exempted from income tax and this exemption continues to this day. Similarly, the industrialists were protected from internal and external competition through a plethora of licences and regulatory instruments that suppressed market development and created rent-

seeking opportunities (Ali and Malik 2009; Husain 1999). Some policies were directly aimed at maximizing rents by the bureaucratic and industrialist alliance. For example, industrialists were allowed accelerated depreciation allowances with high tariff walls that enabled them to reap super profits at the cost of consumer welfare. Similarly import licences allowed the holders of the licences to earn monopoly rents (Husain 1999). Though the economic environment, including economic policies, has changed considerably since then, the culture of rent-seeking still pervades the bureaucracy as well as the industrial elites. To be sure, economic policies have seen some re-orientation towards deregulation but the state continues to have a large footprint in the economy reflecting a continuing interventionist bias in economic policies (Haque and Din 2006; Kardar 2006).

A similar reasoning can be applied to explain the persistence of interventionist economic policies and the state-led model of development of the colonial era. The initial impetus for the continuation of the public sector-led model of development was provided by huge development challenges at the time of independence, which meant a significant role for the public sector in the economy. At the same time, with the limited presence of the private sector, the public sector expanded its role in the economy through direct involvement in productive activities as well as

through interventionist policies purportedly to regulate the market and address market failures. As a result, bureaucratic intervention in the economy has persisted despite changes in the economic environment reflected in a reasonable state of physical infrastructure, a well-diversified economy, and a growing private sector (Kardar 2006; Haque and Din 2006).

This persistence of an economic policy paradigm can be explained by two key factors.

First, a particular policy stance that becomes a shared belief and hence institutionalized can be reproduced because the individuals may not ‘conceive of appropriate alternatives’ or the available alternatives may simply be considered as improper (DiMaggio and Powell 1991). Bureaucrats may thus perceive interventionist economic policies as the most appropriate mode of managing the economy and consider other policy options as unsuitable. Kardar (2006) observes that the bureaucrats prefer interventionist policies not only because of certainty of command but also because of their distrust of markets underpinned by their belief that the state is more knowledgeable and that markets are imperfect and thus require the regulatory hand of the state.

Second, powerful vested interests who stand to gain from specific policies and programs tend to expend significant efforts to perpetuate such policies (Powell 1991). In this context, since public intervention in the economy entails rent-seeking opportunities, bureaucrats have an incentive to maintain the interventionist policy stance to maximize their rents. Interventionist economic policies are instruments in the hands of the bureaucrats to affect the playing field for private

businesses to seek rents. Indeed, the rent-seeking motive partly explains the still pervasive role of the state in the economy (Kardar 2006).

Strictly speaking, policy formulation is typically considered to be the prerogative of the politicians and the bureaucracy is supposed to implement policies set by the political actors. So how can the bureaucracy be responsible for the persistence of economic policies when the politicians may simply dictate such policies? To see this, recall from the arguments made above that the bureaucracy is a dominant player in the axis of power, which is manifested in its influence and control over the process of policy formulation as well. Notwithstanding this, the ability of the bureaucracy to independently determine policy choices can also be seen in the light of the observation that organizations are often able to develop a logic of their own and may pursue their own specific policies and goals which may neither be aligned with the goals of other groups nor reflect the distribution of power in the larger society. Institutional policies may thus be driven more by the logic of the organization itself rather than the interests of the external groups (Brint and Karabel 1991, p. 352). Accordingly given the bureaucracy's sway over policymaking, its predilections towards a particular policy stance do matter for the perpetuation of such policies over time. There are other factors, which can provide a leading role to the bureaucracy in policy making. For example, both politicians and bureaucrats may have interlocking interests in specific policies. Thus in the case of interventionist policies, for instance, both actors may have an interest in perpetuating such policies because of rent seeking opportunities (Cheema and Sayeed 2006).

## **2.6.5 Persistence of corruption**

In their seminal work, Becker and Stigler (1974) laid the micro-economic foundations of corrupt behaviour by emphasizing the role of rents, risk of detection and reporting and gains associated with corrupt practices. More recent work has greatly expanded the scope of research on corruption and the key themes of this research include the role of corruption in economic development, mechanisms to fight corruption including legal framework, and policy analysis (See, for example, Anderson and Gray 2007; Baltaci and Yilmaz 2006; Heineman and Heimann 2006; Schatz 2012, 2013; Schutte 2012; Asthana 2012). By and large there is a consensus that corruption not only adversely impacts static efficiency but also hurts long-term investment and growth by diverting resources away from productive uses to support the private consumption of the corrupt individuals (Bardhan 1997). A number of approaches have been highlighted to combat the menace of corruption including legal and regulatory reforms (Anderson and Gray 2007), internal control and audit in public sector organizations (Baltaci and Yilmaz 2006), compliance with international treaties to deal with corruption (Heineman and Heimann 2006), and political will in the implementation of anti-corruption policies (Brinkerhoff 2000).

Recent policy oriented research on corruption builds on detailed case studies to identify effective mechanisms to combat corruption. It is argued that anti-corruption programs especially in developing countries must focus on administrative oversight, transparency, and involvement of civil society in the fight against corruption. The role of civil society to fight corruption in public administration is particularly important as it can lead to social accountability through involvement of citizens (Schatz 2013; Schutte 2012). However, social



accountability can be sustained only through electoral accountability and thus there is a need also to strengthen democratic governance (Schatz 2013). Another important initiative to control corruption in the public sector is decentralization of powers from central government to provincial and local levels. However, experience shows that decentralization may initially lead to more corruption but once decentralization takes hold with the passage of time corruption is significantly reduced (Asthana 2012). It is important to emphasize here that while the case studies provide practical and policy-relevant guidelines there is a need to explore how the policy prescriptions can be adjusted duly taking into account the diverse institutional backgrounds of developing economies.

Furthermore, corruption in organizations may emerge possibly as an (un) intended consequence of historical and institutional factors as emphasized by the theory of organizational imprinting. As elaborated in the preceding sections, the culture of rent-seeking and corruption is another colonial era imprint on the bureaucracy that has persisted until now. In this context, corruption is viewed as a behavioural trait that is hardwired in the bureaucracy and is shaped by the institutional environment in which the bureaucracy operates.

Several factors can help to explain the persistence of corruption.

First, bureaucratic power can be an important factor in the prevalence of corruption as powerful bureaucrats can use their control over public policies and resources as instruments of rent-seeking<sup>9</sup>. It is plausible then to argue that as long as bureaucrats

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<sup>9</sup> There is considerable empirical evidence that power contributes to corruption, whether it is corruption by powerful political elites or malfeasance by close-knit power structures such as local governments. See, for example, Gerring and Thacker (2004).

have powers, there will be room for abuse of power and corruption will tend to persist (Toerell 2007).

Second, corruption as a social behaviour may tend to persist through forces of institutionalization. Once corruption becomes a shared norm in the organization (for example a shared norm among coalitions of corrupt bureaucrats), it has the tendency to become an institutionalized act or what Zucker (1991) refers to as “socially constructed reality” which is resistant to change because it is viewed as an objective and external fact assuming a taken-for-granted character.

Third, interest groups who have a stake in the system tend to actively block efforts to change the system to maintain their benefits that accrue through their corrupt practices (Brint and Karabel 1991).

Finally, aside from institutional reasons, there are mechanisms that can make corruption self-reinforcing and hence persistent over time (Aidt 2003).

For example, the more corrupt individuals there are in an organization the more incentive there is for an individual to engage in corruption, because it may be harder to catch corrupt officials in an environment where corruption is endemic. Moreover, corrupt individuals tend to work together in networks (Nielsen 2003), which attract other individuals to join the club because of network externalities that make it easier for them to engage in corrupt practices. Also, the reward to rent seeking relative to entrepreneurial activities is higher in situations where a majority of individuals are engaged in rent seeking from entrepreneurial activities and this lures more individuals to indulge in corrupt practices. The underlying mechanism here is the allocation of talent between rent-seeking and productive

activities. If the relative rewards for rent seeking are higher more talent will be allocated to rent-seeking activities (Acemoglu 1995).

## **2.6.6 Rigid hierarchal structure**

This section describes the persistence of the colonial era structure of a cadre based bureaucratic apparatus in Pakistan. More specifically, this section critically discusses the impact of rigid hierarchical system prevalent in the bureaucracy taking into account the statutory distribution of powers across different layers of bureaucratic organization.

As mentioned before, the Civil Service of Pakistan, an offshoot of the colonial Indian Civil Service, was established at a time when Pakistan was facing pressing challenges of governance amidst the turmoil following independence from the British rule. The inherited structure of colonial bureaucracy was useful to provide administrative functions in a turbulent situation. As Carroll and Hannan (2004, p. 64) have put it, “changing a core feature exposes an organization to great risk of mortality”, altering the structure of bureaucracy was too risky in those challenging times. Moreover, organizations tend to cling to their existing structures because of familiarity with the mode of operations and habituation through accumulated experience. As a result, design of organizational building blocks that are in lockstep with specific organizational structure, imply high switching costs for changing the form and structure of an organization (Powell 1991).

In addition, the bureaucracy was staffed by former Indian Civil Service officials who were attuned to working in a powerful hierarchy and hence were naturally averse to changing the structure of the bureaucracy. With the passage of time, the cadre-based structure of bureaucracy became a standard along with the work

routines and administrative procedures, thus making the whole system resilient and averse to change. One may argue that the colonial era bureaucratic structure may have persisted just because it provided an efficient system of governance. This argument, however, does not hold much ground on closer scrutiny. The cadre-based structure introduces a wedge between various functional groups in terms of relative power, professional expertise, perks and privileges, and horizontal mobility of the staff, all to the detriment of equality of opportunity and upward mobility of professionals. Take, for example, the District Management Group (DMG), which enjoys a coveted status in the civil bureaucracy because of its powers and prestige. The possession of status and power allows organizational coalitions to actively pursue their interests and acquire resources to maintain their status and privileges in the future (Salancik and Pfeffer 1977).

This group dominates the top jobs in the bureaucratic hierarchy and members of this group enjoy faster career progression while bureaucrats in other cadres stagnate (Kardar 2006). The superior treatment of one cadre to the disadvantage of others vitiates the administrative environment with inter-cadre rivalries that affect the performance of the bureaucrats. It is precisely because of these problems in the cadre-based system that one of the earliest reports on civil service reforms recommended the unification of all cadres in the civil service (Islam 1989). R. Egger prepared the report in 1953 under the auspices of the United States Agency for International Development (USAID), but it was not implemented because of strong opposition from the bureaucracy (Islam 1989).

Furthermore, organizations are composed of individuals who form a cohort, which is not fixed over time because of the continuous turnover of employees as new employees replace the older ones. In this scenario, a key mechanism for the

persistence of organizational imprints is the inter-generational transmission of institutionalized rules norms, values, and attitudes within an organization. How does this process happen? How do new employees adopt the norms, values and attitudes of their predecessors? The first point to note here is that the transmission of rules and acts across individuals depends on the degree of institutionalization which determines the extent to which the rules or acts are unique to the individual or are objective facts that can be transferred to other individuals. As a matter of fact, the two mechanisms are interlinked and reinforce each other: the higher the degree of institutionalization the easier is the transmission; and the more effective the transmission, the more will be the degree of institutionalization (Zucker 1991).

The rules or acts that are highly institutionalized can easily be transmitted across individuals as the transmitting individual can simply communicate the institutionalized rules as objective facts and the receiving individual takes them as an accurate depiction of the objective fact. Similarly, acts performed by an individual occupying an office are by definition institutionalized and are taken as facts-of-life. When an individual occupies a post s/he tends to view actions as objective and as continuing over time across different holders of the post. Moreover, a post enhances the inter-subjective knowledge of appropriate action thus ensuring continuity of action across different holders of the position. Even if the organizational traits are not highly institutionalized, some degree of transmission across individuals is still possible through individual influence. These transmission mechanisms thus ensure that the imprints are carried across overlapping cohorts of employees who vary over a period of time.

## **2.7 Bygones are seldom bygones: discussion and some remarks**

In this section we summarize the key insights we gained from this exploratory analysis.

Bureaucracies in many countries around the world are synonymous with inefficiencies and incompetence with bureaucratic actors striving to protect their own interests often at the expense of quality of governance and efficacy of public policies. Moreover, bureaucracies often fail to adapt to changing circumstances, and efforts to reform are frequently met with strong resistance from vested interests who have a stake in perpetuating the system.

Against this backdrop, taking the bureaucracy in Pakistan as a case study and using the theory of organizational imprinting as a framework of analysis, this chapter has explored how the institutional context, mainly the economic environment and founders' inclinations, shaped the bureaucratic structure, mode of governance and economic policies.

Second, it has identified the underlying constraints and incentives that have contributed to the persistence of bureaucratic features particularly bureaucratic power and corruption.

An attempt has also been made to show that the historical and institutional context prevailing at the time of founding of the bureaucracy left several imprints in terms of its structure and power, culture of rent-seeking, patron-client relationships as a mode of governance, and interventionist economic policies. Given the pressing governance challenges at the time, the colonial regime needed a powerful

organization that could ensure internal security and stability for the smooth collection of revenues.

The cadre-based structure of the bureaucracy was thus designed to provide an effective centre of governing power that could perform complex administrative tasks. In addition, the patron-client relationships with local elites proved a convenient mode of governance to consolidate colonial rule, and such relationships inevitably spawned a culture of rent-seeking. Moreover, the model of development and interventionist policies led by the public sector and pursued by the bureaucracy were dictated by the prevailing economic environment characterized by an under-developed economy and a dominance of foreign owned monopolies, both of which meant a dominant role of the state in the economy including the protection of monopolies through extensive regulation.

Once the bureaucracy acquired specific traits in line with the dictates of the environment, forces of inertia and institutionalization came into play and they contributed to their persistence over time. Accustomed to power and an authoritative style of governance, the bureaucracy strived to perpetuate its power through either forging alliances with other centres of power or through efforts to undermine the political process. Once a pattern of authority was established, it gained social acceptance and legitimacy through the institutionalization of power relations, and consequently the bureaucracy remained a dominant player with significant power over administrative functions including the design and implementation of economic policies and programs.

The bureaucratic power also gave rise to rent-seeking as powerful actors used their control over policies and resources as instruments of rent-seeking. As a social

behaviour, corruption showed a tendency to become institutionalized as a shared norm and an objective and external fact, which is resistant to change. Corruption also thrived as the bureaucracy, learning from the organizational memory, continued with the patron-client relationships as a mode of governance based on its success in the colonial era. Similarly, the inclination towards a state-led model of development and interventionist economic policies persisted as a shared belief reinforced by powerful vested interests that stood to gain from such policies and programs which offered possibilities for rent-seeking.

Furthermore, imprinting can work at various levels of organization. For example, administrative procedures, rules of conduct and regulatory policies can all be determined by initial conditions and may persist over time. To this day, Pakistan's bureaucracy follows the same practice of evaluating officials' performance through annual confidential reports that was in vogue during the colonial period.

However, it needs to be emphasized that imprinting implies persistence and not permanence; and that imprinting of certain bureaucratic attributes does not imply that bureaucratic reforms are impossible. For bureaucratic reforms to be successful, a strong political will is needed along with the adoption of mechanisms and incentives that can unleash forces of change from within the bureaucracy. Such mechanisms may include modern training programs for officials at all levels of the bureaucratic hierarchy, a competitive compensation package for bureaucrats to attract the best talent, and adoption of modern monitoring and evaluation systems. A sustained effort to reform and modernize the bureaucracy can help in breaking away from the past and in setting up an organization that adapts to changing environments. However, such reform efforts must be informed by a complete understanding of underlying factors that give rise to imprinting in the first place.



The greatest challenge to current and future reform efforts will be dismantling ‘rules of the game’ that past imprints have preserved as a colonial legacy.

To sum up, the study has broadly surveyed the historical mechanisms and processes and to identified their effects on the contemporary structures, strategies and technologies of the bureaucratic organization. The case study of bureaucracy in Pakistan, a descendent of the British colonial era civil service in India, provided a means for an in-depth examination of the processes and mechanisms underlying the persistence of specific attributes in bureaucratic organisations. The study has identified the triggers of bureaucratic rigidity with the help of the experience of Pakistani bureaucracy, which has not essentially changed since its inception. The study has also provided an account of how certain practices during the colonial era of the Indian subcontinent led to unintended consequences in the form of bureaucratic power, corruption and control over economic policies after changes in the external environment (post-independence).

The analysis in this chapter was exploratory. These macro-level insights set the ground to investigate the behaviour of bureaucrats in the following chapters of the dissertation where public choice framework of utility-maximizing individuals acting strategically within the institutional contexts is used as an analytical approach. Following these macro-level insights, we next investigate the micro-level behaviour of individuals.

In the next chapter (chapter 3) of this dissertation, we will explicitly incorporate these institutionalized factors in the policy choice of the bureaucrats. The aim is to underpin the role that these imprints play in the policy choices of the bureaucrats in traditional neo classical models.



# Chapter 3

## Inertia and Policy Choice: The Imprints of the Bureaucrat<sup>10</sup>

### 3.1 Introduction

The previous chapter has provided a historical account to shed light on bureaucratic features shaped by the institutional context. Also, an investigation is made to explain the persistence of specific features in the bureaucracy. While this approach provides a macro level institutional context, the behaviour of organizational actors also becomes imprinted with these context factors at the micro level (Hannan and Freeman 1984; Marquis and Tilcsik 2013; Powell 1991).

Since William Niskanen's pioneering works (1968; 1975) on the economic implications of bureaucratic agenda control over public policies, a growing body of literature in the realms of political science and economics has focused on the decisive role of bureaucrats for public policy (see Bendor 1988; Gill 1995; and Gailmard and Patty 2012 for excellent surveys of this literature). The core insight of these studies is that a bureaucrat can to a large degree live out his own policy preferences, with possibly detrimental consequences for society (Aberbach,

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<sup>10</sup> This chapter is based on a co-authored work with Professor Klaus Heine. I gratefully acknowledge the comments and suggestions we received at the American Political Science Association Annual Conference 2016 (Philadelphia, USA), the American Sociological Association Annual Conference 2016 (Seattle, USA), the European Public Choice Society Annual Meeting 2016 (Freiburg, Germany), the European Association of Law and Economics Annual Meeting 2016 (Bologna, Italy) and from the participants during the EDLE seminars for helpful comments on earlier drafts. The usual disclaimer applies.

Putnam and Rockman 1981; Aberbach and Rockman 2000). While these studies have recognized the role of policy preferences of bureaucrats (Gailmard and Patty 2012), these models are silent about the impact of the historical, institutional and organizational context on the emergence of public policy preferences of bureaucrats. However, the study of history, institutions and organization is important as individual preferences and choices cannot be understood without taking these context variables into account (Friedland and Alford 1991; Powell 1991; Kelman and Hong 2014).

In this chapter, we consider two originally different streams of literature to obtain a richer and more nuanced picture of bureaucratic behaviour. First, as discussed in the previous chapter, the theory of organizational imprinting postulates that history matters in shaping organizational strategies and policies and that initial conditions can trigger organizational rigidity and inertia. In particular, the theory can explain how policy rigidity may arise due to bureaucrats' own policy predilections driven by their initial choices and economic or psychological switching costs (Staw 1976; Powell 1991; Perkmann and Spicer 2014). Second, public choice theory in the tradition of Niskanen (1968) posits that self-interested and powerful bureaucrats have a preference for higher budgets and use their power to maximize their budget, resulting in outcomes that are sub-optimal from a social point of view. Insights from these two strands of literature are synthesised in a unified framework and the question is examined of how bureaucratic inertia impacts the choice of public policies focusing in particular on the economic efficiency of public policy outcomes. The proposed framework shows how initial conditions of bureaucratic organization have a lasting impact on the self-interested decision-making of bureaucrats. Taking the decisive role of organizational imprinting into account for

bureaucratic decision making is an important step to better evaluate reform proposals for bureaucracies. The chapter determines the categories, which have to be put on the agenda, if organizational imprinting of bureaucracies is taken as seriously as the figure of the selfish budget-maximizing bureaucrat.

The rest of the chapter is organized as follows. First, we briefly account for the research gap by proving the literature review in the area (section 3.2). Then a link is made to the concept of imprinting and how it can be aligned with economic research on bureaucracy (section 3.3). After this preparation section 3.4 presents a status quo framework, which captures the role of inertia in a model of budget maximization. Section 3.5 concludes and suggests some insights for policy making.

## **3.2 Bureaucracy: from rational legal authority to a policy agency**

The literature on public bureaucracy embraces today a wide spectrum of disciplines such as public administration, organization theory, political science, sociology and economics. The scientific enquiry into public bureaucracy dates back to Max Weber's conceptualization of public bureaucracy as a professional, rule-based and efficient organization, where bureaucrats are seen as technocrats executing a legal order (Weber 1922). Weber provided a normative framework for public bureaucracy in a double sense. The proposed bureaucratic rules and processes should lead to an efficient bureaucratic outcome, but the interlinkage with the legal system also provides legitimacy, establishing a bond between government and citizens. Furthermore, the bureaucrats should serve with loyalty,

obedience and impartiality and follow well-defined rules and administrative procedures to effectively deliver their functional responsibilities (Weber 1914).

“Experience tends universally to show that the purely bureaucratic type of administrative organization, that is, the monocratic variety is, from a purely technical point of view, capable of attaining the highest degree of efficiency and is in this sense formally the most rational known means of exercising authority over human beings” (Weber 1914).

While the Weber’s model of bureaucracy provides a normative framework for the bureaucratic organization, bureaucracies in many countries around the world remain far from Weber’s ideal and are routinely lambasted for the authoritative style of governance, corruption, incompetence and inefficiency (Olsen 2008; Dixit 2012). What is more, despite frequent calls for reforms, the bureaucracies continue to retain these characteristics, and fail to adapt to changing circumstances (Olsen 2008).

Hence, subsequent research on bureaucracy became largely detached from the normative legal aspects of bureaucracy and gave weight to positive analyses. Public management and organization theory emphasized institutional design, staff relationships, hierarchical structures, and procedures of public administration (March and Simon 1958; Wilson 1989; Simon 1997). Political science concentrated on questions of political control of bureaucracies and the conjunctions between legislature and bureaucracy (McCubbins, Noll and Weingast 1987; Moe 1995). Most of the studies from public administration, organization theory or political science focus mainly on the categorization and delineation of problems rather than providing a coherent theoretical frame for understanding bureaucracies’ role in

public policy (Moe 1995). The literature on public bureaucracy in the field of economics adopts a more rigorous approach to studying bureaucratic behaviour by emphasizing the rational actor model. But as a result, those models are quite often very narrow, dismissing large parts of the situational context and organizational dynamics. Nevertheless, for our purposes it is reasonable to start our literature review with the basic economic model of bureaucracy and then to mark step-by-step the attempts to fill pivotal research gaps.

### **3.2.1 Policy delegation**

Most of the literature in political science focuses on the questions of policy delegation and political control of the bureaucracy. Studies on policy delegation have typically used spatial models in which principals choose agents for the delegation of policies. When agents are fully informed and face no uncertainty in policy implementation, the politicians tend to delegate policy to an agent whose policy preferences are closest to those of the politicians – the so called ‘ally principle’ (Bendor et. al. 2001; Gailmard 2002; Bendor and Meirowitz 2004; Huber and McCarty 2004)

Other studies, however, argue that the ally principle does not hold in a variety of situations. For instance, if policy implementation by the bureaucrats is influenced by the interest groups, politicians may be inclined to delegate policy to bureaucrats whose preferences diverge from those of the politicians but who work actively to negate the influence of the interest groups (Bertelli and Feldman 2007).

In a recent contribution, Warren (2012) shows that the ally principle may be violated in a situation where the internal dynamic of the legislature may lead to delegation of policy to non-allied bureaucrats to preclude any particular branch of

the legislature from directly controlling the bureaucracy. Other studies on policy delegation explore how the delegation of policy-making power creates incentives for the bureaucrats to enhance their professional expertise (see, for example, Aghion and Tirole 1997; Bawn 1995; and Bendor and Meirowitz 2004).

Policy delegation to the bureaucrats may encourage acquisition of information and professional expertise, which can influence public policy outcomes. This has been elaborated by Stephenson (2007) who explores the implications of policy delegation in a setting with decision costs and endogenous bureaucratic expertise. The study analyses the impact of changes in costs associated with adopting a new regulatory policy on bureaucratic incentives to acquire information on the potential consequences of the new policy. By explicitly focusing on decision costs, the study departs from earlier works, which focus on bureaucratic discretion as an important instrument to influence policy-making by the bureaucrats. It is argued that the control of bureaucratic discretion is not necessarily the most effective strategy in public policy oversight. As a matter of fact, politicians can more effectively influence policy-making by the bureaucrats by making policy choices more or less costly through enactment costs. It is shown that the presence of enactment costs presents an incentive for the bureaucrats to acquire expertise but the ultimate impact depends on whether or not the decision maker is uninformed. In the case where an uninformed decision maker prefers to retain the status quo, an increase in enactment costs will decrease agency expertise. However, an increase in enactment costs would contribute to an enhancement in agency expertise when new policy is adopted by the uninformed decision maker. The analysis highlights the need take into account the interplay between oversight mechanisms and bureaucratic expertise in issues of public policy delegation. More recent research



in the realm of bureaucratic politics has emphasized the notion of transactional authority that encompasses both formal and informal arrangements for the delegation of policy-making powers as well as ensuring agency compliance (Carpenter and Krause 2015).

It is argued that the traditional concept of authority in bureaucratic politics that is rooted in the formal authority of the principal is incomplete in view of its exclusive focus on formal institutional mechanisms. Such mechanisms ignore the agency's power to shape the terms of the contract with the principal through lobbying or direct involvement in drafting legislation. The concept of transactional authority which is based on bargaining and mutual exchange between the agency and the principal can be helpful in better understanding bureaucratic politics in the area of public policy delegation.

### **3.2.2 Budget maximization models of bureaucracy**

Economic models of bureaucracy trace their origin to Niskanen's seminal work, which provides a formal model of bureaucracy to explore the interaction of legislation and bureaucracy in determining budgetary allocations (Niskanen 1968). The bureaucracy knows the legislators' demand function for public services and exploits its monopoly power to extract the maximum budget from the legislator.

In economic parlance, this is akin to perfect price discrimination by the bureaucracy leading to the extraction of the maximum price (budget) that politicians are willing to pay for public services (output) produced by bureaucracy. In particular, the bureaucracy is assumed to offer take-it-or-leave-it proposals to the legislator, which binds the latter to a choice between accepting the

bureaucracy's preferred level of output or to get no output at all. Since the legislators are willing to pay as long as the marginal benefit of a bureau's output is positive, the monopolistic bureau produces past the point where marginal costs are equal to marginal benefits. As a result, the bureau's output and budget exceed the socially optimal level leading to economic inefficiency.

Several studies have extended Niskanen's budget maximization framework to incorporate more nuanced approaches for modelling the budgetary allocations, emphasizing in particular the discretionary powers of bureaucracy (see, for example, Breton and Wintrobe 1975; Romer and Rosenthal 1978; Mackay and Weaver 1981; Miller and Moe 1983; Conybeare 1984; Bendor, Taylor, and Van Gaalen 1985; and Bendor and Moe 1985, 1986). In an influential contribution, Migue and Belanger (1974) develop a model of bureaucratic discretion and argue that bureaucrats maximize their budget leeway, defined as the total budget less the cost of production of the bureau's output. It is shown that the equilibrium output may range from the level of a profit-maximizing monopolist to that of an output-maximizing bureau, depending on the bureaucrat's utility from productive and non-productive spending. In any case the budget of a bureau is too large and the output is not produced at the minimum cost.

Niskanen (1975) develops a framework that focuses on specific institutional mechanisms for the legislative control of bureaucracy, including majority rule decision-making, committee review, vote-maximizing behaviour of politicians and legislative discretion. For the background of those institutional features the bureau's output and budget positively depend on the marginal effect of the bureau's output on the bureaucrat's rewards. In the absence of any legislative

control, the bureau would produce an optimal level of output from the legislators' point of view but at a sub-optimal higher cost level (see also Bendor 1988).

### **3.2.3 Agenda setting power of bureaucracy**

Romer and Rosenthal (1978) focus on the agenda setting powers of bureaucracy that take the form of an all-or-nothing or all-or-status-quo ultimatum, where a representative legislator has an ideal reference point for the budget with symmetric preferences. Symmetric preferences around the ideal budget imply that the utility of the median legislator would decline at the same rate when a lower or higher budget is appropriated. In this setting, the bureaucrat proposes a level of budget to the legislator who either accepts the offer or else the budget reverts to zero or the status quo prevails. Since the legislator is assumed to be equally averse to under or over spending, he would prefer a budget that is close to twice as big as his ideal budget. Thus, it is very likely that a sub-optimal high budget will be determined. Furthermore, high demand interest groups may be better able to influence the bureaus agenda than moderate demand interest groups, which amplifies the bureaucrats demand for sub-optimal high budgets. Interestingly, however, an imposition of those budgetary proposals may result in welfare improvement, compared to an even more inefficient status quo. Mackay and Weaver (1981) differentiate between substitutable and complementary public services provided by bureaus in an extended framework that incorporates multiple agencies with multiple agendas. In the case where bureaucratic agencies produce substitutable services, an agency that is able to offer a take-it-or-leave-it type of proposal is better off in terms of its budgetary allocation as compared with an agency that gets its budget on a competitive basis. However, if bureaus produce complementary services, then the agenda-setting powers of one agency can benefit the other

agency in terms of the size of its budget. Extending the framework for multiple agencies brings forth some further insight. For example, an increase in one agency's reversion level of budget leads to a reduction in its expected budget while the budget of the other agency is enlarged. The reversion level of budget is defined as the level that will prevail in the absence of an agreement on the new budget. This is because as the reversion level of budget moves closer to the agenda setting budget, legislators have an incentive to choose the former and allocate the difference to the other agency.

Most notably, in a major departure from most of the earlier studies that consider budget-maximizing bureaus producing a single output, Mackay and Weaver develop a model of a multi activity agenda-setting bureau. For example, a municipal corporation provides multiple services including police, fire, and sanitation services. The citizen-voter sets the budget to maximize its utility while the bureau controls the budgetary mix. The control over the budgetary mix gives a bureau the effective control over the desired budget of the citizen-voter, and hence the bureau gets power to manipulate the budgetary outlays. For instance, a school board may strategically alter the budgetary allocation between "academics" and "athletics" so as to induce voters to support an increase in the school budget. As a result, while there may be efficiency gains (economies of scale) from having a single bureau that produces a variety of outputs, these gains need to be weighed against potential losses resulting from the monopoly power of the bureau.

### **3.2.4 Role of interest groups**

Bendor and Moe (1985) develop a framework in which interest groups interact with the legislator and bureaucracy to determine budgetary outlays in a setting that incorporates adaptive rather than optimizing behaviour. The bureaucratic agency is concerned with its budget, the legislator is interested in re-election, and different interest groups may either benefit or lose from the output of bureaucracy. Interest groups play a critical role in driving agency relationships by influencing the legislator through their votes with the latter affecting the bureaucracy through budgetary allocations and oversight mechanisms. The equilibrium configuration in this set-up is generally not socially optimal and is characterized by a too low level of public services that benefits corporations over consumers because of the relative strength of the former in influencing public policy. A key insight is that bureaucratic inertia has a beneficial impact because it counteracts the bureaucratic tendency to seek higher budgets from which certain interest groups profit at the expense of the public.

To sum up, the literature about the role of bureaucracy in public policy covers a wide spectrum of issues ranging from budgetary allocations to efficiency of the bureaucracy and from agenda control powers to the design of oversight mechanisms. The literature has greatly enhanced the understanding of the bureaucracy's peculiar role for public policy and budget spending. However, despite the richness and breadth of these studies, some important gaps remain. For example, while the studies highlight the legislative-bureaucratic interaction for the determination of public policies, questions such as the distribution of power within the bureaucracy and its implications for the choice and implementation of public policies have received less attention. Also, most of the literature ignores the

institutional environment, which shapes the incentives and constraints faced by bureaucrats. Specifically, little attention has been paid in the literature to explore how bureaucratic preferences over public policies are determined by the historical and institutional context and how such policies may persist through the forces of institutionalization and inertia.

### **3.3 Organizational imprinting meets rational actor model of bureaucracy**

As discussed in chapter 2, the theory of organizational imprinting has received a great deal of attention in organizational research (for an overview see Marquis and Tilcsik 2013). The theory provides a conceptual framework for understanding not only the genesis of organizational forms and strategies but it also gives an explanation why organizations exhibit inertial tendencies in their policies and strategies. There are two features, which mark this theory (Johnson 2007). First, it refers to the process through which economic, social and institutional factors shape or imprint organizational forms. The second feature embodied in the idea of imprinting is the tendency of various organizational structures and processes to persist over time (Hannan and Freeman 1984; DiMaggio and Powell 1991).

The insights from the theory of organizational imprinting shed light on how the external environment (including economic, social and political institutions) shapes a bureaucracy's organizational form, policies and routines at both macro and micro levels. At the macro level, it is argued that organizations exhibit a tendency to become 'isomorphic' with the external environment to avoid uncertainty and to gain legitimacy. Reflecting further on this theme, Carroll and Hannan (2004) argue that the viability of particular organizational forms is dictated by the broader social

and institutional context, which is ‘mapped’ onto the organization leaving a lasting imprint on key organizational features. Besides influencing the type of organization and its form at the macro level, the external environment can also have deep influence on the various micro level characteristics of an organization including management practices, policy orientation, intra-organizational distribution of power, and other social attributes such as work ethics, and organizational norms and values. Similarly, while the individual organizational actors can themselves be imprinted in terms of their work habits, beliefs, and preferences, they can also be a source of imprints on organizational building blocks as well as on other individuals. For example, individuals, particularly the first incumbents of an organization, may imprint a particular position within an organization through their social and educational background, experience and skills, leaving a defining stamp that will continue to shape the behaviour of future entrants (Burton and Beckman 2007).

### **3.3.1 Inertia and policy preferences**

Hannan and Freeman (1984) argue that once organizations adopt specific forms, strategies and practices, it is difficult and costly to dismantle these due to the irreversibility of investments. More specifically, the persistence of various organizational features can be attributed to three powerful and complementary forces. First, forces of inertia play a major role in the persistence of organizational features and strategies. Second, institutionalization of norms, beliefs and practices contributes to the persistence and reproduction of organizational attributes. Third, other traditionalizing forces including vested interests may perpetuate the existing organizational structures and policies. It needs to be emphasized that these forces

are not mutually exclusive and may either work alone or in tandem to induce persistence of various characteristics and policies of an organization.

The forces that contribute to inertia may be internal and/or external to the organization (Hannan and Freeman 1984; see also Kaplan and Henderson 2005). In the chapter, we use the notion of imprinting as internal to the organization. There are several internal factors that can lead to inertia. For example, an organization may have incurred sunk costs in its systems, work methods, and personnel training which may compel the organization to adhere to its original structures and processes. Similarly, the dynamics of political coalitions within an organization may prevent change in policies and modes of operations. Another important force that is internal to organization and contributes to inertia is the tendency for established practices and policies to become generally accepted normative standards and hence difficult to change. Among the external factors that can lead to inertia are regulations that govern the activities of an organization, inter-organizational relations, and the threat of losing legitimacy in response to radical change.

### **3.3.2 The institutionalization of policies**

A multi-disciplinary literature under the rubric of ‘new institutionalism in organizational analysis’ draws on economic, social and cultural explanations for institutionalization and hence the persistence of various organizational strategies and policies. Meyer and Rowan (1991) delineate the institutionalization processes through which organizational traits and behaviours get a rule-like status and become embedded in social thought and action. Organizations tend to incorporate these institutionalized rules in their structures, in order to acquire resources and



secure legitimacy, which raise the survival chances of the organization. Consequently, Jepperson (1991) conceives the process of institutionalization as a social pattern that aims at reproduction and retention. Seen in this light, institutions reproduce themselves not primarily by success in the market but by ‘self-activating social processes’ that contribute to the persistence of organizational characteristics. Powell (1991) takes a broader view of institutional reproduction and highlights four avenues of institutional reproduction including the exercise of power, complex inter-dependencies, taken-for-granted assumptions, and path-dependent development processes. Organizational characteristics may persist through the active efforts of individuals who have the power to control organizational processes and who have an interest in maintaining the system. Organizational routines and processes may also persist due to organizational interdependencies that create complex linkages making it difficult to change one aspect without disturbing the whole “reaction chain”. Similarly, organizational routines can persist as taken-for-granted rules, which become accepted practice. Finally, institutional arrangements may become long lasting due to path-dependence that makes such arrangements increasingly viable due to increasing returns and positive feedback mechanisms.

The foregoing insights suggest that the policy preferences of bureaucracy can be shaped by economic, social and institutional context factors that define the operational scope, policies and capabilities of bureaucratic organization. For example, the economic environment is believed to strongly influence various organizational attributes including operational scope, management principles and business strategies (Marquis and Tilcsik 2013). As a result, if a bureaucratic organization strives to achieve a fit with its external environment, it acquires

specific attributes that range from organizational hardware such as technological apparatus and human resources to the software of organizations such as attitudes, habits and beliefs. With the passage of time, such organizational characteristics become embedded in the organizational culture and tend to persist because of forces of institutionalization and inertia. For example, once a particular policy or strategy becomes a shared norm in a bureaucracy, it has the tendency to become an institutionalized act or what Zucker (1991) refers to as “socially constructed reality” which is resistant to change because it is viewed as an objective and external fact assuming a taken-for-granted character. Furthermore, the bureaucracy may exhibit inertial tendencies in its policies and programs because of familiarity with the mode of operations, habituation through accumulated experience, design of organizational building blocks and technical and professional orientation of the organizational actors, all of which imply economic and psychological switching costs.

In the following we will link the theory of imprinting with the choice model of Masatlioglu and Ok (2014). Thereby it is important to emphasize that we employ Masatlioglu's and Ok's model not as a direct entry point into analysing bureaucratic inertia but rather as a vehicle to rigorously explicate the sociological concept of organizational imprinting. The model is particularly suited to our context because it allows formalization of inertia in terms of costs faced by individual actors. This makes it possible to connect the concept of organizational imprinting with a welfare analysis.

### 3.4 A formal analysis of imprinting and budget maximization

To formalize how the notion of organizational imprinting can lead to inertia and impact on the behaviour of bureaucrats we build on a choice framework proposed by Masatlioglu and Ok (2014). This framework allows us to study bureaucratic inertia in more detail.

To begin with, let  $H$  be a set of finite states of the world. For simplicity, we assume that there are only two states<sup>11</sup> of the world, the initial state  $h_0$  and the current state  $h_1$ .

$$H = \{h_0, h_1\} \tag{1}$$

A given state of the world captures the economic, social and institutional environment, which determines the set of policies or strategies feasible in that state of the world. With reference to the theory of organizational imprinting, this is consistent with the notion that organizational strategies depend on context factors of the institutional environment. The dependence of the feasible set on the state of the world is captured by the following correspondence:

$$\varphi: H \rightarrow T \tag{2}$$

Where  $T$  is a compact metric space. Let  $K \in T$  be the feasible set in the initial state of the world, i.e.  $K = \varphi(h_0)$ . Also let  $X \in T$  be the feasible set in the current state of the world, i.e.  $X = \varphi(h_1)$ . It is assumed that both  $K$  and  $X$  are compact sets.

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<sup>11</sup> The objective here is to capture the dependence of the feasible set on initial conditions as implied by imprinting and not to incorporate the positive feedback loops inherent in path dependence.

Consider first the individual choice problem of a bureaucrat in the initial state of the world. It is assumed that in the initial state, the individual choice is constrained only by the feasible set corresponding to the initial state of the world. This set-up is in line with the theory of organizational imprinting, which postulates that organizational actors are particularly malleable and open to adopting strategies that are in consonance with the institutional environment in the initial state. Thus, in the initial state the bureaucrat chooses a strategy  $k_0 \in K$  which is maximal in the feasible set, i.e.

$$U(k_0) \geq U(k) \text{ for all } k \in K \quad (3)$$

According to organizational imprinting,  $k_0 \in K$  can be thought of as a viable strategy dictated by the institutional environment in the initial state of the world. Once the initial environment has imprinted a strategy it tends to persist due to the forces of institutionalization and inertia. In other words, even when the institutional environment changes (the current state of the world), the initial choice of strategy may still be a preferred option. Also, the initial choice may alter the feasible choices in the current state of the world, consistent with the notion of path dependence, which underscores the fact that initial choices may restrict future options (Arthur 1989; Powell 1991)

**Step 1: Modelling choice set with status quo bias**

These ideas can be formalized in terms of the Masatlioglu-Ok framework as follows. Consider the set of feasible choices in the current state of the world  $X$ . Since maintaining the status quo or keeping the default position is always an option, it is assumed that  $k_0 \in X$ . A bureaucrat whose initial choice is  $k_0$  maximizes his utility subject to a constraint imposed by his initial selection. One

may think of the constraint as an individual psychological barrier (Masatlioglu and Ok 2014), a cognitive routine shared in a group (Nelson and Winter 1982) or as an institutional logic that governs the behaviour of whole populations in a field (Thornton and Ocasio 2008). Thus, if the individual chooses  $x \in X$  when his feasible set in the current state of the world is conditioned by his initial choice, this implies that “ $x$  is appealing from the perspective of  $k_0$ ”, i.e.

$U(x) \geq U(y)$  for every  $y \in X$  that is appealing from the perspective of  $k_0$ .

The basic idea here is that the initial choice  $k_0$  limits the individual choices in the current state of the world. For example, once an initial choice is made, it can define an institutional logic or a ‘mission’ that shapes future choices. In the extreme case that the individual choice in the current state is limited to only  $k_0$  the initial policies and strategies will persist unchanged. More importantly, it may also be possible that the presence of the default option imposes a constraint that eliminates some choices that may be strictly better than the default option. This is consistent with insights from organizational imprinting and path dependent processes which highlight the fact that organizational actors may choose sub-optimal policies or strategies because of inertia resulting from economic and psychological switching costs (see for example Arthur 1989; Staw 1976). These ideas can be made more precise in terms of the choice framework developed by Masatlioglu and Ok (2014; 2005). In particular, they derive a utility function and a choice set that is constrained by the initial choice of the individual. Let  $\Delta$  denote an object that does not belong to  $X$ . The symbol  $\sigma$  denotes a member of the set  $X \cup \{\Delta\}$ . Let  $\Omega_X$  be the set of all non-empty closed subsets of  $X$ . The choice problem is a list  $(S, \sigma)$  where  $S \in \Omega_X$  and either  $\sigma \in S$  or  $\sigma = \Delta$ . The set of all choice problems is denoted by  $\mathcal{C}(X)$ .

The choice problem without an initial reference point or status quo option is a list  $(S, \Delta)$  for any  $S \in \Omega_X$ . On the other hand, given any  $k_0 \in X$  and  $S \in \Omega_X$  with  $k_0 \in S$ , the choice problem  $(S, k_0)$  is called a choice problem with a status quo or initial endowment or default option. The set of all such problems is denoted as  $C_{sq}(X)$ , which summarizes the choices faced by a decision maker who is currently endowed with or has a default option  $k_0$ . Masatlioglu and Ok (2014) show that if the choice correspondence  $C(X)$  satisfies the specified axioms, then there exists a continuous utility function  $U: X \rightarrow \mathbb{R}$  and a closed-valued self-correspondence<sup>12</sup>  $Q$  on  $X$  such that:

$$c(S, \Delta) = \arg \max U(S) \quad (4)$$

$$c(S, k_0) = \arg \max U(S \cap Q(k_0)) \text{ for every } (S, k_0) \in C_{sq}(X) \quad (5)$$

Equations (4) and (5) summarize the choice model which can now be used for understanding the choices of bureaucrats with or without an initial reference point or status quo option. Suppose that (4) and (5) hold for any choice problem  $(S, \sigma) \in C(X)$ .

A bureaucrat without an initial reference point simply maximizes his utility in the feasible set as indicated in equation (4). More specifically, his choice solves the following maximization problem:

$$\text{Max } U(\omega) \text{ subject to } \omega \in S \quad (6)$$

In the presence of an initial reference point or status quo option  $(S, k_0)$ , the individual uses a psychological constraint set  $Q(k_0)$  to eliminate all feasible alternatives that do not belong to this constraint set, i.e. the agent identifies the set

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<sup>12</sup> This apparatus is needed to formalize the status quo bias in the model.

$S \cap Q(k_0)$ . This set consists of all feasible options that are superior to the initial reference point of the decision maker, i.e. if  $k \in Q(k_0)$ , then his initial reference point would not preclude a switch from  $k_0$  to  $k$ . Clearly, if  $k \in S \cap Q(k_0)$ , then  $k$  satisfies both the feasibility constraint ( $S$ ) as well as the psychological constraint induced by the initial choice of the agent ( $Q(k_0)$ ).

Once the set  $S \cap Q(k_0)$  is determined, the agent simply maximizes his utility among alternatives that satisfy both the feasibility and psychological constraints. In the extreme case, if  $k_0$  is the only element in both  $Q(k_0)$  and  $S$ , the bureaucrat stays with his initial choice. On the other hand, if there are other alternatives in  $S \cap Q(k_0)$  then his choice is determined by solving the following problem:

$$\text{Max } U(\omega) \text{ subject to } \omega \in S \cap Q(k_0) \quad (7)$$

It is important to emphasize that there may be feasible alternatives outside the set  $Q(k_0)$  that may provide strictly higher utility than  $k_0$ . This is because these elements are omitted by the psychological constraint induced by the initial choice  $k_0$  (the imprint). Consequently, there may be alternatives that are superior to  $k_0$  but are not chosen when  $k_0$  was selected in the initial state. This accords with organizational research, which posits that initial choices may preclude future options including those that are superior to the initial choice (Powell 1991; Sarah and Henderson 2005).

The above analysis formalizes the choice problem of an individual bureaucrat when he is facing a psychological constraint. As discussed in chapter 2, these constraints may arise from imprinting and path dependent processes, which give rise to economic and psychological switching costs that contribute to inertia. There may be other factors that can lead to economic and/or psychological switching

cost. For example, Boyer and Robert (2006) argue that agents' reluctance to change some projects despite the fact that more effective and profitable projects are available can be traced to career concerns such as bonuses and promotions that are often linked to successful completion of the projects. In this case, bureaucrats would be reluctant to change their initial choices resulting in inertia. Moreover, from the perspective of population ecology, Hannan and Freeman (1984) argue that organizations attain higher levels of reliability and accountability through stable structures and routines and consequently in an effort to achieve stability change may be resisted, resulting in inertia.

Another channel through which stability of status quo and inertia may emerge is cooperation in groups resulting from informal contracts not to introduce any organizational innovation. The recent work of Samuel Bowles, Herbert Gintis and others show that cooperation in groups is stable if there are a sufficient number of people who impose social punishment on deviators such as expulsion from the group. In essence, the evolutionary argument is that groups with altruistic punishers survive because they are self-stabilizing (Boyd et al, 2003). Whatever the source of economic and/or psychological switching costs, such costs constrain the behaviour of agents by making change costly thus contributing to inertial tendencies. In the absence of such costs, the agent behaviour conforms to the standard rational choice paradigm as demonstrated by Masatlioglu and Ok (2005).



## *Step 2: Applications to budget maximization*

In the next step the framework can be employed to explore how bureaucratic policy choices that are driven by the historical and institutional context can impact upon economic efficiency and social welfare. To that end we focus on the role of bureaucrats in the budgetary process along the lines of Niskanen (1968) and Mackay and Weaver (1983), and combine it with our framework. The model is a simple extension of Niskanen type budget maximizing framework along the lines of Mackay and Weaver (1983). The basic idea is that a representative citizen-voter chooses the overall size of the budget to maximize his utility while the allocation of the budget to different publicly provided goods and services is decided by a representative bureaucrat. This separation of the policy-making powers is in line with the literature on policy delegation and bureaucratic discretion in public policies (Gailmard 2002). According to this literature, delegation of public policy and discretionary powers of the bureaucracy are often necessitated by the latter's implementation capacity, information advantage and professional expertise.

It is important to emphasize here that Niskanen's model is a useful starting point for investigating the economic implications of bureaucratic policy preferences and resulting inertia for at least three reasons. First, it allows focusing squarely on the public budget, which is the single, most economic policy instrument in which all the actors including citizens and bureaucrats have a significant stake. It is through a public budget that a government executes its development plan for the welfare of the citizens through provision of various public goods. On the other hand, bureaucrats are interested in maximizing their budget because their success is tied to the amount of resources under their control. Second, the model is well suited for the incorporation of bureaucratic preferences over budgetary allocation policy,

which may be driven by the organizational dynamic. For example, as discussed in the previous chapter, a bureaucracy that is geared to follow the public sector led growth and development paradigm may have a bias towards spending on public infrastructure as a key driver of economic growth. Third, the model enables a mapping of public policy choices to budgetary resources taking into account bureaucratic inertia that is formalized in terms of switching costs associated with a change in the preferred policy stance. This juxtaposition of benefits and costs of switching budgetary allocation policy brings to the fore the trade-offs a bureaucrat faces between budget maximization and utility loss emanating from shifts in budgetary allocation policy.

In particular, we consider a setting in which a representative bureaucrat controls the budgetary allocation policy while the overall budget is set by a representative citizen-voter (Epstein and O'Halloran 1994; Volden 2002).

Assume that there are two publicly provided goods and services  $B_1$  and  $B_2$ . With their prices normalized at unity,  $B_1$  and  $B_2$  represent the expenditure (budget). Let  $B$  denote the total budget and let  $k \in [0,1]$  be the share of the total budget for  $B_1$ , and  $(1 - k)$  be the share of the total expenditure for  $B_2$ .

Then:

$$B_1 = kB; \text{ and } B_2 = (1 - k)B \quad (8)$$

The representative bureaucrat controls the budgetary allocation policy  $k$  and hence his feasible set is  $K = [0, 1]$ . It is assumed that in both states of the world, the bureaucrat chooses a budgetary allocation from this feasible set, i.e.

$$\varphi: H \rightarrow [0, 1] \quad (9)$$

In the initial state<sup>13</sup> the bureaucrat's choice is free from any reference dependence or imprinting. Hence in the initial state the bureaucrat's choice is maximizing his utility according to (3) and he chooses a budgetary allocation policy  $k_0 \in K$  that is maximal in the feasible set.

In the current state of the world, the bureaucrat's choice of budgetary allocation policy and the total budget is determined as follows. Consider a representative citizen-voter whose utility  $\phi(\cdot)$  is defined by private consumption ( $C$ ) and two publicly provided services ( $B_1$  and  $B_2$ ). The citizen-voter receives an income ( $Y$ ) and pays a lump sum tax ( $T$ ), which finances the provision of public goods and services by the bureaucrat. The citizen-voter's optimization problem is thus:

$$\max \phi = \phi(C, B_1, B_2) \quad (10)$$

Subject to:

$$Y = C + T \quad (11)$$

$$T = B_1 + B_2 = B \quad (12)$$

Plugging (11) and (12) in (10) and using (8), the derived utility function of the citizen-voter can be specified as a function of the budgetary allocation policy ( $k$ ) and the size of the budget ( $B$ ):

$$U(k, B) = \phi(Y - B, kB, (1 - k)B) \quad (13)$$

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<sup>13</sup> It is imperative to mention that this model is an application of the framework developed earlier to the budget maximization problem.

The optimization problem of the representative citizen-voter is thus to choose the size of the budget  $B$  to maximize his utility given income ( $Y$ ) and the budgetary allocation ( $k$ ):

$$\max_B U(k, B) = \phi(Y - B, kB, (1 - k)B) \quad (14)$$

The optimal budget level for the citizen-voter, given the budgetary allocation ( $k$ ), can be defined as:

$$B(k) = \arg.\max_B U(k, B) \quad (15)$$

To work out the closed form solutions while keeping the analysis tractable, it is assumed that the utility function of the citizen-voter is quasi-linear in private consumption and additively separable in the two types of public goods and services. Specifically<sup>14</sup>:

$$U(k, B) = Y - B + (kB)^{\frac{1}{2}} + ((1 - k)B)^{\frac{1}{2}} \quad (16)$$

### ***Step 3: Choice of Sub-Optimal Strategies in the Presence of Inertia***

The bureaucrat's choice in the current state is conditioned by his initial choice of the budgetary mix according to  $k_0$ . As argued in the previous section, once a particular strategy is chosen, it tends to become entrenched and resists change due to the phenomenon of imprinting. It is thus assumed that a bureaucrat faces economic and psychological costs of switching his strategy resulting in disutility for the case of deviation from his default option. On the other hand, a bureaucrat may benefit from a change of his budgetary allocation mix, if larger budgetary

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<sup>14</sup> Without losing generality, for analytical tractability and to get non-trivial closed form solution, we have used square root functional forms.

resources accompany it. Thus, the utility function of the representative bureaucrat can be defined as:

$$V(k) = \alpha(B(k)) - \gamma(k - k_0)^2 \quad (17)$$

The first term on the right-hand side captures the utility derived from the budget while the second term is the disutility that results from changing the initial strategy. The parameters  $\alpha > 0$  and  $\gamma > 0$  capture the relative importance of the budget and the initial budgetary mix policy with regard to the optimization problem of the bureaucrat, where  $\gamma$  is a measure for the level of bureaucratic inertia indicating the degree of bureaucratic resistance to change the initial strategy<sup>15</sup>.

Note that,  $\alpha > 0$  is consistent with the assumption that  $V(k)$  is increasing in the level of budget. If  $\alpha = 1$  and  $\gamma = 0$ , then the problem reduces to simple budget maximization by the bureaucrat. In this case, the model features the budget-maximizing paradigm followed by Niskanen (1968, 1975), Romer and Rosenthal (1978), Denzau and Mackay (1976, 1980) and Mackay and Weaver (1983).

Given his initial strategy the bureaucrat's feasible set in the current state of the world can be defined as follows:

$$Q(k_0) = \{k \in K : V(k) \geq V(k_0) = \alpha(B(k_0))\} \quad (18)$$

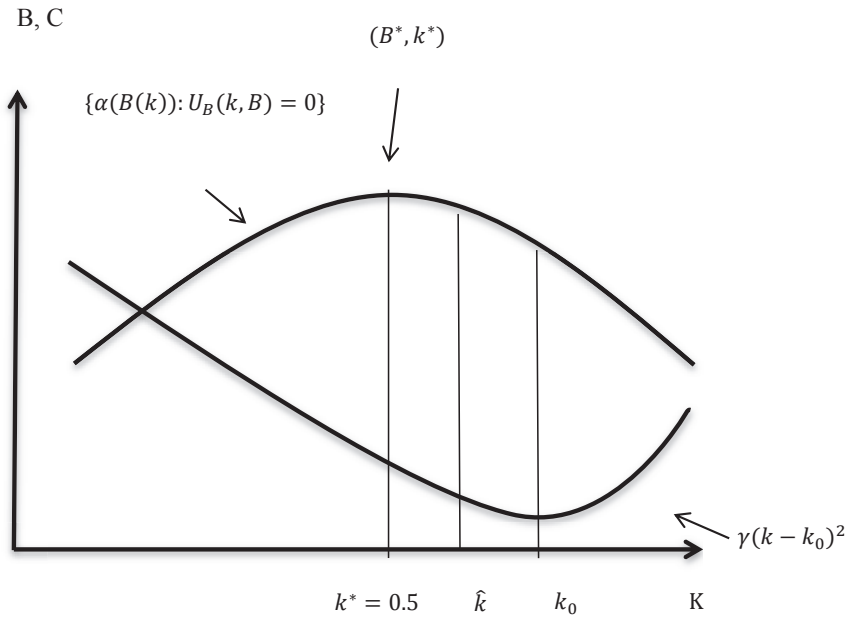
This set identifies all the budgetary mix policies in the feasible set that are better than the initial strategy  $k_0$ . Therefore, the bureaucrat's optimal choice of the budgetary mix in the current state is simply:

$$k = \arg.\max_k V(k) \text{ for every } k \in Q(k_0) \subset K \quad (19)$$

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<sup>15</sup> Without loss of generality,  $\alpha$  can be normalized to one.

It can be seen from equations (17) and (18) that the feasible set depends on the optimal budget levels chosen by the citizen-voter as well as the parameters  $\alpha$  and  $\gamma$ . To identify this set, the model is solved to derive the optimum values of the size of budget and the budgetary mix policy  $(B^*, k^*)$  based on first order conditions pertaining to (15) and (19) (see the appendix 3 for a detailed solution). The solution can be depicted in the following diagram<sup>16</sup> for the case when  $k_0 > k^*$ .



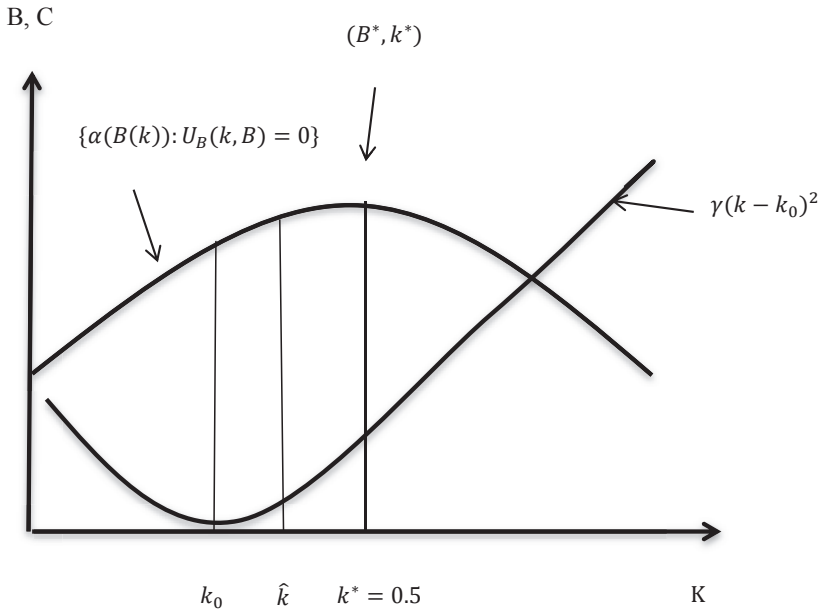
**Figure: 3.1**

<sup>16</sup> The curves in the diagram are drawn for  $\alpha = 1$  and  $\gamma = 1$ . Furthermore,  $V(k)$  is implicit in the diagram, it is the difference between the two curves.

The curve  $\{\alpha(B(k)): U_B(k, B) = 0\}$  plots the first order condition of utility maximization by the citizen-voter (see equation A3). The socially optimal budget level and budgetary mix policy  $(B^*, k^*)$  solves the optimization problem of the citizen-voter (see the appendix 3 for details). Notice that  $k^*$  is also the budget maximizing level of the bureaucrat in the absence of bureaucratic inertia (see equation A6). However, when the bureaucrat's behaviour is constrained by his initial choice, the choice of the budgetary allocation policy will be  $\hat{k}$ , which maximizes his utility (the distance between the two curves) and at which point the slopes of the two curves are equalized indicating that the marginal benefit of a policy change is equal to marginal cost. The feasible set induced by the psychological constraint of bureaucrats can be identified as:

$$Q(k_0) = \{k \in K: \hat{k} \leq k \leq k_0\} \quad (20)$$

Now consider the case when the preferred budgetary allocation for a public good is less than the socially optimal level i.e.  $k_0 < k^*$ . In this case, the first order-condition for utility maximization by the bureaucrat implies that the slopes of the two curves are positive and equalized at the optimal policy chosen by the bureaucrat  $\hat{k}$  (see equation A5).



**Figure: 3.2**

Figures 3.1 and 3.2 show that if the preferred budgetary allocation of the bureaucrat for a given public good is higher (lower) than the socially optimal level that public good would be over-provided (under-provided) as compared with the socially optimal level.

This set demonstrates how institutional and psychological constraints compel bureaucrats to eliminate alternative policies that may be superior to their initial choice in the absence of inertia. It can be seen from the diagram that there are feasible alternatives to the left of  $\hat{k}$  that will provide higher budgetary resources to the bureaucrat. However, these options are excluded from the feasible set that has



imprinted the initial policy choice as a reference point or initial endowment. In the extreme case, if  $\gamma$  is very much larger then  $Q(k_0) = \{k_0\}$  implies that the initial policy choice is the only feasible option. The curve plotting  $\gamma(k - k_0)^2$  becomes steeper and the feasible set gets narrower with an increase in  $\gamma$ . This situation can happen if the marginal cost of switching the policy exceeds the marginal benefit and the initial policy choice becomes locked-in. The term  $\alpha(B(k))$  acts as what Masatlioglu and Ok (2005) refer to as a “utility pump” which can induce the bureaucrat to deviate from his initial policy option. However, if  $\gamma$  is very large then this “utility pump” is not sufficient to trigger a policy shift and the bureaucrat is better off at his initial policy option  $k_0$  with a maximum utility  $V(k) = \alpha(B(k_0))$ . Thus, it becomes clear that the presence of inertia alters the optimizing choices of the bureaucrat in a significant way. The following proposition summarizes this finding.

***Proposition 1:*** The presence of inertia induces bureaucrats to make non-optimal choices despite the availability of superior alternatives in the choice-set. Moreover, the choice of sub-optimal strategies emerges as a rational response to institutional and psychological constraints imposed by imprinting.

This result demonstrates how initial imprints contribute to a lock-in of strategies of bureaucrats. More specifically, the repetitive choice of  $\hat{k}$  is optimal from the bureaucrat’s point of view in the presence of inertia. However, this choice is sub-optimal in the sense that a higher level of budget could have been achieved in the absence of inertia. As argued in the previous section, a particular policy stance becomes a shared belief and leads individuals to consider other policy options as improper. In a similar vein, Meyer and Rowan (1991) argue that organizational policies and strategies tend to be highly institutionalized and hence are considered

as legitimate regardless of their impact on outcomes. Furthermore, organizational strategies persist due to their taken-for-granted characteristics, which make the former self-sustaining.

**Proposition 2:** In the case of inertia a utility maximizing bureaucrat will over (under) provide public services depending on the initially chosen budgetary mix. As a result there will be persistent social welfare losses.

The fact that bureaucrats tend to choose sub-optimal policy mixes has social welfare implications, too. The foregoing analysis shows that psychological constraints induced by initial choices make superior policy choices at later stages unfeasible. For example, if the initial choice involves more spending for one type of public service, the presence of inertia induces bureaucrats to allocate more resources to this service also in the future, even when the demand of the citizen-voter dictates less provision. Consequently, the bureaucrat's choice of the budgetary policy mix will often result in allocative inefficiency.

It can be seen from Figure 3.1 that  $\hat{k}$  is not the optimal budget mix. The intuition of this result is simple. A bureaucrat has only an incentive to change his strategy as long as the marginal utility from getting an additional unit of budget exceeds the marginal cost of a policy change. But the presence of inertia prevents the bureaucrat from achieving a budget strategy, which maximizes his utility in the choice-set.

While the result of social welfare loss through over-production of public services is in line with the budget-maximization hypothesis of Niskanen (1968), the underlying logic here is very different. For example, in Niskanen's model, the budget-maximizing bureaucrat has an incentive to extract the maximum budget

that politicians are willing to provide, resulting in over-production of public services. In our case the welfare loss does not necessarily result from the bureaucrats' motive of over-production, but from inertia that hinders bureaucrats from adapting their individual strategies as well as to adapt to social preferences. Therefore, in our model under-production of public services can be a persistent phenomenon leading to social welfare losses.

**Proposition 3:** The choice of a budget and policy mix without inertia can coincide with the socially optimal budget allocation ( $k^*$ ), if the policy preferences between the bureaucrat and the citizen-voter are aligned. However, in the presence of inertia only a socially sub-optimal allocation of the budget ( $\hat{k}$ ) can be attained<sup>17</sup>.

An interesting implication of our model is that one could assume a situation without inertia, when utility maximizing bureaucrats strive for budget maximization. In those cases, it is recommendable to look for governance structures and monitoring devices that bind the bureaucrat to the preferences of citizen-voters. And indeed, large parts of the literature in the tradition of Niskanen are concerned with institutional designs that prevent bureaucrats from budget maximization. If we put that a step further we could imagine a world where budget-maximization is effectively prevented and the policy preferences between citizen-voters and bureaucrats are aligned. The social optimum of public services would be attained.

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<sup>17</sup> One may question whether the choice of budgetary allocation by a bureaucrat in the presence of inertia could coincide with socially optimal allocation. However, this is not possible in our model as long as the choice problem is meaningful in the sense that the initial allocation differs from the optimal allocation. To see this, notice that when inertia is present ( $\gamma > 0$ ), the first order condition of the bureaucrat's optimization problem will never hold at the socially optimal allocation (see equation A5) unless the initial allocation happens to be equal to socially optimal allocation which is highly unlikely.

However, in a world of inertia the policy recommendation to look for institutions that prevent budget maximization becomes more faceted. A first issue to be taken into account is the fact that even with a perfect incentive alignment between citizen-voters and bureaucrats' over-production of public services may take place. That means institutional designs that are perfect to prevent budget-maximization can be blunt to prevent over-production caused by inertia. This leads to a second issue: Taking the existence of bureaucratic inertia seriously leads to the insight that the institutional design of bureaucracies has to distinguish between two design types. First, which is targeted at overcoming inertia and the second targeted against the opportunistic behaviour of bureaucrats. That brings us to a third issue, the interplay between bureaucratic inertia and the budget maximization behaviour of bureaucrats. The relation between the two can be antagonistic. That means while the budget maximization behaviour of bureaucrats pulls the provision of public services towards over-production, bureaucratic inertia may induce under-production by restricting the bureaucrat's choice set. As a result the amount of a public service actually provided can be relatively close to the preferences of the citizen-voter, although there is no incentive alignment between the bureaucrat and the citizen-voters. For that background in practical cases it is important to investigate very thoroughly from which trigger bureaucratic inefficiency stems. Only then can an appropriate antidote be chosen. In some (antagonistic) cases the policy recommendation might be even to make no reforms at all.

### **3.5 Inertia and policy choices of bureaucrats: some conclusions**

This chapter has provided a fresh perspective on the role of bureaucracy as a key player in budgetary processes. We show that organizational and institutional constraints embedded in initial policy choices fundamentally alter subsequent policy choices of bureaucracies. The chapter has analysed how policy preferences of bureaucrats result in inertia and policy rigidity. In particular, we develop a theoretical framework that synthesizes insights from the theory of organizational imprinting with budget-maximization in the tradition of Niskanen. It becomes apparent that budget-maximization strategies are nested in early imprints of bureaucracy. Imprints of the past define the arena in which budget-maximization takes place, and they have a decisive effect on the individual behaviour of bureaucrats. As a result policy reforms towards better bureaucratic control must distinguish clearly between measures targeted at the individual behaviour of bureaucrats and the imprinted institutional environment.

This finding is in line with research on organizational imprinting, which argues that organizational actors may be stuck with initial policy choices, which may lead to persistent inefficiencies. To be sure, there is a significant body of literature in political science that has analysed the problem of bureaucratic drift and the challenges it poses for the political control of bureaucracy (see, for example, McCubbins, Noll and Weingast 1987; Macey 1992; Calvert, McCubbins and Weingast 1989; and Epstein and Halloran 1994; Gailmard and Patty 2007; Clinton et al 2012). According to this literature bureaucrats are driven by their policy preferences, and in the absence of effective oversight, they tend to adopt policies

that deviate from the preferences of citizens and/or politicians. While those studies have focused on the question of how to devise mechanisms to control bureaucratic drift, little attention has been given to the underlying causes of bureaucratic drift. Thus our analysis adds to the political science literature in terms of identifying inertia as a potential cause of bureaucratic drift. More specifically, imprinting of budgetary allocations takes place independently of the efficacy of any control mechanisms against budget maximization.

Thus, bureaucratic drift can be triggered even in cases when there is no budget maximization (as described by Niskanen) at all. This is an important result for two reasons: First, any institutional design targeted at the over-production of public services through bureaucracy must first analyse whether it is indeed budget maximization or bureaucratic inertia which is causing the over-production. Only if it is indeed budget maximization, then improved monitoring devices against the opportunism of bureaucrats can lead to welfare improvement. Second, bureaucratic inertia can run counter to budget maximization. Early imprints of bureaucracy may actually constrain profligate bureaucrats. But the opposite could also be the case. Imprints may lead to budget allocations, which are persistently too low. In those cases policies against budget maximization may even have a detrimental effect on social welfare by further reducing the amount of public services supplied. As a result, one has to be careful and has to look very specifically into each single case of presumed budget misallocations before steps are taken against it. While this is a rather broad policy implication, it has a very practical relevance. The OECD and World Bank regularly publish reports targeting “good governance” for public bureaucracies or state-owned enterprises (see for example OECD 2005, 2014; World Bank 2012?). Identifying principles

of “good governance” is a valuable goal in itself, but for the background of our study one may wonder about the effectiveness of those principles, if they have to “compete” with the imprinted policy stances of bureaucrats. Or, to put it more generally, our research underscores the relevance of path dependent organizational configurations for the assessment of the performance of public administrations (see also Kelman and Hong 2014; and O’Toole and Meier 2015).

Our contribution has aimed at a better theoretical understanding of bureaucratic budget allocations and has not provided empirical evidence yet. However, it is possible to sketch out what those empirical studies would have to deal with, in order to identify the magnitude of bureaucratic imprinting. First of all, the legal-institutional status of bureaucracy vis-à-vis government, legislature and judiciary would have to be assessed. The role of bureaucracy is strongest in parliamentary style democracies such as the United Kingdom where the legislature has a limited role in modifying the budgetary proposals of the executive (Posner and Park 2007). The situation is somewhat different in other countries such as France, Italy and The Netherlands where the legislator can amend or reject budgetary proposals of the bureaucracy but lack the power to independently formulate the budget. In the U.S. style presidential system the legislature plays a much stronger role in the budgetary process through budgetary oversight committees. In developing countries the bureaucracy often wields significant power in determining budgetary allocations not least because of a lack of legislative capacity to deal effectively with technicalities of the budgetary process.

More generally, it is commonly observed that the role of the bureaucracy in the budgetary process is often reinforced by the delegation of policy-making authority to the bureaucrats owing to their professional and technical expertise (Schick

2002). Thus, the socio-legal context of bureaucracies may vary a lot between countries and may trigger certain patterns of imprinting. From those patterns of imprinting in conjunction with socio-legal boundary conditions it would then be possible to derive tailored policy recommendations for reforms of bureaucracy.





# Chapter 4

## Identity Driven Policy Choices of Bureaucrats: A Game Theoretic Analysis<sup>18</sup>

### 4.1 Introduction

Since Max Weber's seminal piece on public bureaucracy it is acknowledged that the social identity of public bureaucracies plays an important role for bureaucratic decision-making. The blueprint of his analysis was the Prussian bureaucracy that worked like a machine where the single bureaucrat conceived himself as a sort of gear wheel propelling the machinery towards the goals of bureaucracy set by the Prussian legislator and the German Kaiser. What Weber and others have not explored is that different stakeholders in the hierarchy of bureaucracy may have distinct identities that interact with each other and that may impinge on the individual preferences. This rather complex picture of bureaucracy raises the question of how the notion of identity can be analytically seized and conceptually be integrated into economic research on bureaucracy.

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<sup>18</sup> This chapter is based on a co-authored work with Professor Klaus Heine. I gratefully acknowledge the comments and suggestions we received during The Verein für Socialpolitik Annual Conference 2017 (University of Vienna, Austria), The Political Economy of Democracy and Dictatorship 2017 (University of Munster, Germany) and from the participants in The Future of Law and Economics Annual Conference 2016 (Erasmus University Rotterdam, Netherlands) for helpful comments on earlier drafts. The usual disclaimer applies.

In standard principle agent models of bureaucracy, scant attention is paid to the complexity of organizational structure of bureaucracies and the dynamics of non-monetary goals of bureaucrats in the course of formulating and implementing public policy (Simon 1947; Perrow 1986; West 1997). That is, neither the imprinting process of identity nor identity itself has become an explicit topic in the principal agent literature on bureaucracy so far.

In recent years the notion of social identity has given rise to a rich debate in economics (Akerlof and Kranton 2000; Wichardt 2008; Chen and Li 2009; Benjamin et al. 2010; Kranton et al. 2013). The focus has been, for instance, on the desire of individuals to conform with shared norms in society (Benabou and Tirole 2006), the cognitive aspects of norms (Horst, Kermin and Teschl 2007), or the sense of belonging (R. Akerlof 2009). A common denominator of these research routes is the ambition to find more valid explanations of actual decision making when social context and cognitive stances matter.

Adding to this stream of research the chapter aims at investigating the impact of identity driven preferences of bureaucrats on public policy outcomes, when it is assumed that a bureaucratic organization comprises different levels of administration. For that background, we model the policy outcome of a bureaucracy, when it is assumed that there are differences of identity-based preferences between bureaucrats at the policymaking level and bureaucrats at the policy implementation level.

The chapter proposes a theoretical framework to explain policy drift (a bureau deviation from the policy goal of the legislator) where identity moderates the principle-agent relation between the legislator and the bureaucratic organization.

The model reveals the subtle interaction between these two groups of players in a bureaucracy and how this interaction shapes the structure and size of budgetary allocations. Conceptually we build on the public choice tradition of modelling bureaucracies by insights, which fall broadly into the study of organizational behaviour.

More specifically, the chapter analyses the impact of mission orientation in bureaucracies, taking into account statutory distribution of powers and functional responsibilities of agents across different layers of bureaucratic organization. It is assumed that a bureaucracy consists of two vertically distinct layers:

- 1) A superior who allocates the budget to the different public goods on offer and who identifies with the higher-level goals of the bureaucracy (insider identity)
- 2) A subordinate who executes the allocation policy of the superior and is only driven by his private interests, without identifying himself with the organizational goals (outsider identity)

Furthermore, it is assumed that there is strategic interaction between the legislator and bureaucracy. The model set-up highlights the possibility of trade-offs between individual and organizational goals and provides a more realistic approach for the analysis of bureaucracies (Akerlof and Kranton 2000, 2005, 2010).

The rest of the chapter is organized as follows. First, we briefly account for the need to give more focus on matters of organizational behaviour in the economic analysis of bureaucracy (section 4.2). Then a link is made to the concept of identity and how it can be aligned with economic research on bureaucracy (section 4.3). Section 4.4 provides a detailed literature review pertinent to the present study. Thus prepared, section 4.5 presents a game theoretic framework, which captures

the strategic interaction among players in a model of bureaucratic hierarchy, taking into account the different identities of agents in a bureaucratic setting. Section 4.6 discusses some general remarks to the analysis. Finally, section 4.7 concludes and hints to some insights for policy making.

## **4.2 Bureaucracies as complex organizational structures**

Principal agent models are widely used to understand the relationship between bureaucrats and politicians. In its simplest form bureaucrats aim at maximizing output while politicians want to allocate more budget to their constituencies, in order to increase their chance of being re-elected. From a welfare point of view these two different objective functions lead to an inefficient quantity and structure of the bureaucratic output (Niskanen 1971; Miller and Moe 1983; Gailmard and Petty 2012).

With few exceptions, these models largely consider that all bureaucrats in the organization have identical goals. However, bureaucracy as an organization is comprised of multiple agents with quite different political convictions and individual goals (e.g., Downs 1967; McCubbins, Noll and Weingast 1987; Dalton et. al. 1980, Milgrom and Roberts 1990; Dunleavy 1991). Some bureaucrats are driven by mission orientations and are in full support of policies that promote organizational objectives. Similarly, for some bureaucrats their personal goals take primacy over their organizational objectives (Simon 1947; Quirk 1981; Perrow 1986; Kelman 1987; Eisner 1992; West 1997).

More specially, some bureaucrats may identify themselves with the goals of the bureaucracy more than others, facing a trade-off between their individual goals

and the goals of the bureaucracy (Waterman, Rouse and Wright 1998). The issue becomes even more faceted, if one takes into account that policies are formally promulgated by the hierarchy of bureaucracy, which structurally safeguards the organizational goal against possible opportunism on the part of individual bureaucrats (Mazmanian and Sabatier 1983; Tirole 1986; Crémer 1993). For that background, a complex research field unfolds, in which bureaucratic behaviour is determined by bureaucratic hierarchy, the preferences of the various players and organizational norms. The interplay of these factors creates various trade-offs and makes the analysis of bureaucratic decision-making quite demanding.

However, those budget-maximizing models have been challenged because of their neglect of possible non-pecuniary motivations of bureaucrats such as norms, identities and public sector ethos or motivation (e.g., Dixit 2002; Buelens and Broeck 2007; Gains and John 2010). Similarly, Brehm and Gates (1997) argue that there is a need to go beyond the pecuniary motivation of bureaucrats and to consider non-pecuniary preferences that are driven by solidarity considerations and group pressure. Despite these calls for bringing in non-pecuniary factors to the analysis of bureaucrats' policy choices, very little concrete work has been accomplished so far to get a conceptual framework, which aligns the incumbent economic models of bureaucracy with the challenges from behavioural science. With a few exceptions of models that assume bureaucrats to be bounded rational, almost all models of bureaucracy consider bureaucrats as rational actors (Gailmard and Patty 2007; Krause and O'Connell 2012; Carpenter and Krause 2012).

However, a bureaucrat is part of (sometimes large) organizations and he gets accustomed and exposed to certain perceptions and preferences of the organization. Hence, he acts not only as a rational actor on his own account but

also as an encultured actor, whose perception of a supposed “good policy” is deeply influenced by the social context that he is part of (see, e.g. Hoff and Stiglitz 2016). He learns of what is seen in-house as a good public policy and how this translates into certain budgetary allocations. In this sense his budgetary preferences are based on narratives, norms and identities prevalent in an organization. Subsequently he chooses specific budget allocations through the lens of his organizational social context. According to March’s (1999) logic of appropriateness, decision-making is identity fulfilment, and not an achievement of optimal results in the presence of restrictions. This is consistent with the view that an organization is a form of formalized social system where one considers it as essentially to comply with organizational goals to be considered as a member of the organization (Arrow 1994; Davis, 2003, 2006, 2007).

According to the concept of identity introduced by Akerlof and Kranton (2010), utility functions are not fixed. They are rather affected by the situational context in which identities play out. For example, a bureaucrat who is newly recruited has less inclination towards identifying himself with the organizational goals than the superior who has spent a longer period in the organization and who is established among his peers. Thus, the decisions of agents in a bureaucracy do not only depend on the maximization calculus of their individual utility functions but also on the degree of identification with organizational goals. That is, identity emerges apart from individual utility functions, but interacts with individual utility functions for the background of the situational context. Consequently, Akerlof and Kranton (2000, 717) describe the effect of identity on utility functions as a new type of externality, which can be principally integrated into economic analysis.

## 4.3 Bureaucracies as containers of identity

The concept of identity is not new. Psychologists and sociologists have elaborated on it for decades. Identity comprises all kinds of qualities and values that are associated with a person, organization or larger group as society, culture or nation. Identity is the self-image that a person or group has of itself. It is the belief-system or the fundamental norms that guide us and which may prevent us from doing things, which we would do if we had another identity (Davis 2011). Religious identity may serve as an example. A Christian who believes in the texts of Christianity, but does not live up to the Christian standards will feel ashamed (Akerlof 2007, 8).

The new impulse of the works of Akerlof (2007) and Akerlof and Kranton (2000, 2005, 2010) is that they fall into the broader class of models that seek to complement conventional economic analysis with cogent reasoning from other disciplines in order to draw a more complete picture of human decision making. The Akerlof concept of identity aspires for a conceptual integration between economics on the one hand and a behavioural finding that has ample empirical evidence (but as yet is not well explained in economics) on the other hand.

Akerlof and Kranton (2005) develop the concept of identity by using the notion of situation-specific norms, which are the blueprints or scripts that people have internalized and which tell them how to behave in a specific situation. More specifically, the term identity is used to describe a person's "social category" (Charness, Rigotti, and Rustichini 2007) as well as his "self-image" (Turner et al. 1987). Identity captures how people "feel about themselves as well as how those feelings depend upon their actions" (Akerlof and Kranton 2000, p. 719). If a



person's identity enters a utility function, the person will capture utility gains from a behaviour that is in line with the established identity, and the person will experience disutility in case the behaviour deviates from what is dictated by identity.

Akerlof and Kranton (2005) illustrate the concept of identity by a simple model, focusing in particular on the interaction between identity and work incentives. It is assumed that a worker who identifies himself as part of the organization derives utility by acting in the best interests of the organization and loses utility if he does not work in the best interests of the organization. In addition, the worker draws utility from his wage income and experiences disutility from his work effort. Thereby it is assumed that workers can have two different identities: He can be an insider who acts in the interests of the organization, or he can be an outsider who does not identify with the organization and who is more interested in pursuing his own goals. It can be shown that in the case of an insider, the identification with the organization reduces the wage differential that is needed to maintain enough incentives for high work efforts. This simply follows from the fact that an insider worker maximizes his utility by exerting a high level of effort towards achieving the goals of the organization. The model demonstrates not only the interaction of identity and wage incentives, but also more generally that identity affects the choice set of decision-makers.

As emphasized by Akerlof and Kranton (2005), the concept of identity is particularly relevant in case of public administrations, as for example military organizations. The ideal soldier, having an insider identity, is taken as a mission oriented and sharply differentiated character embodying "masculine makeup and ethos" (Akerlof and Kranton 2010, p. 45). The soldier has a sharp corporate-like

identity, signified by his strict observance of the rules and professional execution of orders in the chain of command. The soldier works in the best interests of the organization and his rewards consist of both his monetary income as well as his satisfaction from acting in line with his organizational identity. Military organizations actively use the promotion of identity as a strategic tool in their training programs to motivate soldiers to pursue military ideals. Besides the military organization, civilian workplaces also use worker identity as a motivation device. This is particularly important in situations where work effort is unobservable and monitoring is costly. In such situations worker identity can be instrumental in encouraging a high level of effort. Besides the example of soldiers, physicians in a hospital may serve as an example.

Going beyond motivational issues, it can be argued that public bureaucracies have a distinct identity of their own which is instrumental in influencing their policy choices. First, like the military, public bureaucracy is an organization with well-defined operational procedures and a vertical chain of command. Bureaucrats are career-oriented civil servants who are provided with professional training (including examinations) at least at the early stages of their career. Bureaucrats are also inculcated in a sense of mission and they have clear organizational goals in terms of public policies and public sector programs. Like other organizational actors, bureaucrats are likely to develop their distinct identities in terms of their policy goals, modes of implementation and other aspects of public policies. As a result, some bureaucrats have an insider identity, i.e. they are driven by their mission orientation and they are in full support of policies that promote the organizational objectives. Similarly, some bureaucrats have an outsider identity, their personal goals taking primacy over organizational objectives.

## **4.4 The agency of bureaucracy – a literature review**

A significant body of literature explores the role of bureaucracy in public policy from a multi-disciplinary angle<sup>19</sup>. Within this diverse literature there is a broad consensus about that politicians need specialists to execute their policies. Hence, politicians delegate certain policies to bureaus. In order to minimize monitoring and transaction costs politicians allocate prefixed budgets to the bureaus for which a specific output is expected in return (e.g. Weingast and Marshall 1988). However, there is an inherent tension between political control and the de facto autonomy of bureaucracy (Berry 1979, 1984; Rourke 1984). This tension and the effects of it are subject to different theoretical explanations. In the following we will briefly sketch out some of the generic approaches that can be found in that research field and we will indicate the relevance of taking identity into account for a proper understanding of bureaucracy.

### **4.4.1 Agency of policy delegation**

Principal agent models are widely used to understand the relationship between bureaucrats and politicians (Moe 1982; Wood and Waterman 1994; Mitnick 1986; Vachrish 2004; Gailmard and Patty 2012; Lane 2013). In these models the agent (bureaucrat) leverages his discretion in order to increase the size of the budget, which results in private benefits for him but sub-optimal outcomes from a welfare point of view (Niskanen, 1968, 1971, 1991). In such models, the problem of policy

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<sup>19</sup> See for example, Niskanen 1971, Miller and Moe 1983, Bendor and Meirowitz 2004, Bendor, Taylor and Van Gaalen 1987b.

drift arises due to uncertainty and information asymmetry, which are inherent in the principal-agent relation (Weingast 1984; Moe 1987).

The benefit of delegating authority to an agent is that it reduces the principal's costs to acquire relevant information and skills to fulfil a specific task. However, this comes at a price, because the agent may abuse his informational advantage to the detriment of the principal (Aghion and Tirole 1997). This is because principals and agents may have a divergence of goals. But, even if bureaucrats and politicians have the same goal, bureaucrats are likely to shirk and to produce output at higher costs (Mitnick 1986). In a nutshell, the informational advantage and expertise gives bureaucracy power that can be used to manipulate the quantity and quality of output (Niskanen 1971).

Principals are interested in both, the comparative advantage of employing a specialized agent on the one hand and having a cheap technology for monitoring the agent on the other hand (Mitnick 1986). This set-up leads to so-called principal-supervisor-agent (P-S-A) models. Tirole (1986) presents a P-S-A model where a principal assigns the task of monitoring an agent to a supervisor. This structure resembles a generic form of bureaucratic organization. In this setting, it can happen that the supervisor colludes with the agent due to side transfers by the agent. It comes not as a surprise that the collusion produces inefficiencies to the detriment of the principal. The potential collusion increases the cost of operating the hierarchy (Laffont and Tirole 1986) by producing large diseconomies of scale as each layer involved increases the extracted rent (McAfee and McMillan 1995). Thereby the propensity for collusion becomes stronger, the longer the relation between the agent and the supervisor endures (Tirole 1986). This already hints at the idea of identity, when a supervisor's view coincides either with the policy goal

of the principal or he is more interested in rent extracting for his own purposes in coalition with the agent.

However, neither the imprinting process of identity nor identity itself has become an explicit topic in the principal agent literature on bureaucracy so far.

## **4.4.2 The institutional theory of policy delegation**

Often it is simply assumed that principal agent models are realistic approximations of behaviour in organizations and that there is a simple dyadic relationship between bureaucrats and politicians. Not much attention has been given to a better understanding, why there are goal conflicts between principals and agents in the first place and what the dynamics of those goal conflicts are (Moe 1982, 1983, Perrow 1986; Bendor and Meirowitz 2004).

Indeed, bureaucrats have, due to their specific skills, inherent advantages over politicians, especially if it is about the implementation of policies. They have a good understanding of the organizational procedures and other technicalities of bureaucracy; hence they can manipulate the output of bureaucracy to their advantage (Miller and Moe 1983; Niskanen 1971). However, from a more dynamic perspective another element enters the picture. Politicians aim at policies according to their ideology in the political spectrum. In order to implement their policy they must win elections, but in democracies they must fear that they will not be re-elected and that their policies will be superseded by their successors from another party. Thus, durable property rights do not exist in the political market (Moe 1983; Segal and Whinston 2010) and politicians must think about other vehicles to safeguard their policy stance once they are in office. One of those

vehicles is to delegate policies to bureaus not for efficiency considerations but rather to make sure for the time when they are no longer in office that their rivals cannot easily change the policy. To reach that goal bureaucracies may get extra powers and be shielded through administrative independence against political influence. As a result, powerful bureaucracies emerge which are imprinted with their founders' identity but leave ample room for the actual bureaucrat to live out his own preferences and identity (Moe 1990). In summary, it is fair to say that the institutional theory of policy delegation points to important aspects of bureaucracy that are not easily captured by agency models. Moreover, the institutional theory of policy delegation addresses the problem of how politicians may safeguard their identity over time through the means of bureaucracy, giving at the same time bureaucrats a great leeway to live out their own identity (Bertelli and Feldmann 2006).

### **4.4.3 The coalition framework of bureaucracies**

A bureaucracy does not consist of homogenous individuals with the same goals, preferences and identities leading to a monolithic bureaucracy. Rather there are different people with very different goals inhabiting a bureaucracy (Simon 1947; Bendor and Meirowitz 2004; Jo and Rothenberg 2014). Furthermore, the bureaucracy as an organization has its own policy goal and some agents identify with that goal and others do not. Hence, there can be a divergence of goals within an organization (Eisner 1992; Quirk 1981; Kelman 1987). The difference of policy goals can be due to differences in the job status of individuals within an organization, but also different ideological perceptions may play a role

(Waterman, Wright, and Rouse 1994). The presence of multiple agents and multiple principals with conflicting goals makes the analysis of a bureaucracy rather complicated. Therefore it has been argued that it is much more appropriate to assume coalition frameworks rather than traditional principal agent frameworks for the analysis of bureaucracies (March and Olsen 1984).

Efficiency considerations may play a role in coalition building, but not necessarily. This strand of literature coincides largely with the so-called “behavioural theory of the firm” which regards itself as an alternative to neo-classical approaches of the firm.

The coalition framework has been blamed of being not explicit enough about how a certain policy goal becomes stabilized in a bureaucracy over time and how a bureaucracy can stabilize itself as a corporate actor (Waterman and Meier 1998; Cohen 2012; Howlett 2009). But the coalition framework clearly points to the fact that bureaucracies have an internal structure built by people who share identities with each other (or not) and who engage with each other (or not) to pursue their goals in groups (Howlett 2002).

#### **4.4.4 Identity as non-monetary reward**

The basic principal agent model considers a generic goal conflict between bureaucracy and legislature. The notion of goal conflict, however, gets blurred when bureaucratic structure is taken into account. For example, if the legislature delegates a policy to the bureaucracy, multiple agents within the bureaucracy may have different functional tasks as well as different individual policy goals, making the overall goal conflict between legislation and bureaucracy less predictable. Furthermore, standard agency models of bureaucracy are challenged because of

the non-pecuniary motives of bureaucrats, which embody norms, culture, or the idea of public sector ethos (Perry and Wise 1990; Breham and Gates 1999; Meier and O'Toole 2006; Buelens and Broeck 2007). This underscores the need for extending agency models by incorporating organizational features as well as to take into account the identity of bureaucrats.

From an agency perspective, a bureaucrat's utility is a function of his income that he receives from the principal in the form of a budget. At the same time, he gets disutility from the effort that he puts in on behalf of the principal administering the budget. However, if the bureaucrat's policy preferences are endogenous, he gets utility from performing the task, and in that case the principal can even pay out a smaller budget to reach the policy goal. This is in line with Prendergast (2007) who argues that bureaucrats can have an intrinsic motivation in carrying out policies. Intrinsic motivation is related to, for example, finding sense in work, idealistic stances, or professionalism (Wilson 1989; Dewatripont, Jewitt, Tirole 1999) all of which lower the necessary budget. The flipside is that when the policy preferences of the principal and the agent diverge, then the principal has to control the policy drift not only by pecuniary incentives or tighter oversight mechanisms but also by influencing and changing the identity of the bureaucrat.

The notion of identity provides not only a plausible explanation for the effectiveness of non-monetary incentives in organizations, but also a sort of tub for the behavioural stances of bureaucrats, which make them deviate from opportunism. As a result, identity is a label for the strong binding forces of social networking in organizations, which have to be taken into account when a deeper analysis of bureaucratic decision-making is desired.



In the following we will elaborate on a formal model of bureaucracy that incorporates identity into an agency framework. This way it will become possible to reconcile the standard economic agency framework of bureaucracy with behavioural approaches for the explanation of bureaucratic decision making.

## **4.5 An agency model of bureaucracy with identity**

In this section we develop a benchmark model for studying more deeply bureaucratic behaviour in an organizational hierarchy. In the model, it is assumed that bureaucrats aim at their individual advantage but have different identities. Bureaucrats may have a stance of identifying themselves with the goal of the bureaucracies and derive utility from this identification. Or, they may not identify themselves with the goal of the bureaucracy and gain utility only from pursuing strategies for their own benefit. Because both types of bureaucrats are tied together in the vertical hierarchy of bureaucracy, the interaction of both types of bureaucrats leads to non-trivial outcomes of bureaucratic behaviour.

Before we formally set up the model, it is important to emphasize that we treat the identity of the bureaucrat as exogenously given. An endogenous treatment of identity would require formalizing the myriad sources of identity that have been highlighted in the literature, and this would make the model intractable. For example, a number of studies in the realms of behavioural economics have explored the factors that can give rise to the identity of agents. Davies (2006) argues that identity is formed with the confluence of four dimensions of self, namely self-centred welfare, self-welfare goal, self-goal choice and commitment. Whereas self-centred welfare pertains to an individual's own satisfaction, a self-

welfare goal permits an individual's satisfaction (utility) to depend on other individuals' satisfaction. The self-goal choice allows the incorporation of non-self-welfare objectives such as welfare of the society, community or an organization. Individual commitment, on the other hand, implies that individual choice may be driven by values and objectives of the individuals regardless of any personal gain or loss. According to Benabou and Tirole (2006), individuals may invest in developing certain understandings of themselves and a desire to retain these images for themselves and for others. Identity and group norms may also emerge when individuals are driven by norms that evolve to maintain a sense of belonging and when they desire confirmation of their beliefs (Akerlof and Kranton, 2000). While different factors may give rise to identity, it is malleable and can change by inculcating ethos and values in specifically designed programs (Akerlof and Kranton, 2005). For example military training is designed to alter the identities of the recruits so that they conform to the organizational goals of the military. Similarly, training programs for civil servants aim at developing their affinity with the organization so that they follow certain group norms that can form part of their identity. The model developed below incorporates the notion of identity in a way that it is not tied to any specific source of identity but is rather flexible enough to capture different interpretations of identity as long as the analysis is based on identity-augmented utility function as discussed below.

### a. Model set-up

The model consists of three players: A legislator who is the principal and two bureaucrats (labelled 1 and 2) who represent a boss-subordinate pair in a vertical hierarchy. Let  $Q \in \mathbb{R}_{++}$  denote a composite good provided by the bureaucracy. The composite good can be thought of as encompassing all the goods and services publicly provided by the bureaucracy such as health, education, or physical infrastructure. For simplicity, we assume that the composite good comprises only two types of publicly provided goods and services  $Q_a$  and  $Q_b$ . Let  $k$  be the share of  $Q_a$  in composite output, i.e.  $Q_a = kQ$ . Similarly, let  $(1 - k)$  be the share of  $Q_b$  in composite output, i.e.  $Q_b = (1 - k)Q$ . The variable  $k \in [0,1]$  can be thus thought of as representing a single dimension policy space capturing budgetary allocation policy.

The bureaucracy uses prefixed budgetary resources ( $B$ ) for the production of the composite good. The aggregate production technology for the production of the composite good is defined by the following cost function:

$$TC = \xi(Q) \tag{1}$$

Where  $TC$  are the total costs with  $\xi_Q > 0$  and  $\xi_{QQ} \geq 0$ .

The principal derives utility from the provision of the composite good and provides the budget ( $B$ ) to the bureaucracy. The payoff of the principal can be defined as<sup>20</sup>:

$$U_P(B; k, Q) = W_a(kQ) + W_b((1 - k)Q) - C(B) \tag{2}$$

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<sup>20</sup> Notice that equation (2) also implicitly defines the policy preferences of the principal towards the budgetary allocation policy. More specifically, maximization of (2) with respect to the budgetary allocation policy  $k$  will yield the policy preferences of the principal.

$W_i(\cdot)$  is the principal's assessment of goods and services provided by the bureaucracy and  $C(B)$  is the opportunity cost of providing budgetary resources to the bureaucracy. It is assumed that  $W'_i(\cdot) > 0$  and  $W''_i(\cdot) \leq 0$  for  $i \in \{a, b\}$  and  $C(B)$  is an increasing convex function with  $C'(B) > 0$  and  $C''(B) \geq 0$ .

We define the bureaucratic agency as a boss-subordinate relationship. Player 1 is the boss of a bureaucratic agency whereas player 2 is his subordinate. It is assumed that the boss sets the overall policy direction whereas the subordinate produces the public output in line with the policy guidelines of his boss. This setting coincides with the process of public policy determination in a bureaucracy where decision-making takes place in a vertical hierarchy in which players have different statutory policy making powers. The higher echelons chalk out the broader strategic direction whereas the lower echelons then implement the policies. For example, the secretary of a ministry decides how much of the budget will be allocated to physical infrastructure and the subordinate will program it to specific infrastructure projects as highways and railway tracks.

Furthermore, the boss is assumed to have an identity as an insider who is inclined to pursue the organizational goal of the bureaucracy. The organizational goal can be expressed in terms of a specific budgetary allocation policy  $k_1$ . For example, the bureaucracy might favour a certain development strategy that requires a particular level of budgetary allocation across different sectors such as physical infrastructure (say  $Q_a$ ) or social sectors (say  $Q_b$ ). A higher  $k_1$  would thus indicate a bureaucracy's preference for spending more on physical infrastructure as compared with social sectors. Given this organizational goal, a boss with insider identity has an intrinsic incentive to pursue the organizational goal and thus would lose utility if he deviates from  $k_1$ . The utility of the boss can thus be defined as:

$$U_1(k; Q, k_1) = V_{1a}(kQ) + V_{1b}((1 - k)Q) - \lambda(k - k_1)^2 \quad (3)$$

The boss is assumed to derive positive utility from the overall size of bureaucracy, as measured by the quantities of the two public goods provided ( $V_{1i}$ ). But because of his identity as an insider, he experiences a disutility  $-\lambda(k - k_1)^2$  when he deviates from the organizational goal. The parameter  $\lambda > 0$  captures the identity of the boss.

Contrary to the boss the subordinate has an outsider identity and maximizes his utility without regard to the organizational goal.<sup>21</sup> The subordinate derives utility from the size of the bureaucracy measured in terms of the quantity of the composite public good. Because of his strong self-interest he derives also utility from his discretion over the budget, which he can use for his own purposes. The utility of the subordinate is defined as:

$$U_2(Q) = V_{2Q}(Q) + V_{2S}(B - \xi(Q)) \quad (4)$$

$U_2$  is the utility of the subordinate,  $V_{2j}$  is the subordinate's assigned value to the composite public good ( $Q$ ) and  $V_{2S}(B - \xi(Q))$  is the discretion over the budget.

It is plausible to assume asymmetric information between the legislator and the bureaucracy as well as within the hierarchy of the bureaucracy. The bureaucracy has private information about its costs, which cannot be observed by the principal.

According to (1) the total costs are given as:

$$TC = \xi(Q) = \phi Q \quad (5)$$

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<sup>21</sup> It is shown in Appendix 4B that even if the subordinate also has a policy goal, the equilibrium is determined independently of his policy goal as long as the manager makes the policy choice. Hence, the assumption that the subordinate maximizes his utility without regard to organizational goal is not implausible.

$\phi > 0$  are the marginal costs of production of the composite public good.  $\phi$  is a random variable with a uniform probability distribution over the interval  $[a, b]$ . The subordinate knows the marginal costs whereas the boss and the principal only know its probability distribution.

The equilibrium is then defined as a triplet  $(B^*, k^*, Q^*)$  such that:

$$B^* = \operatorname{argmax} U_P(B; k^*, Q^*) = W_a(k^*Q^*) + W_b((1 - k^*)Q^*) - C(B) \quad (6)$$

$$k^* = \operatorname{argmax} U_1(k; Q^*, k_1) = V_{1a}(kQ^*) + V_{1b}((1 - k)Q^*) - \lambda(k - k_1)^2 \quad (7)$$

$$Q^* = \operatorname{argmax} U_2(Q; B^*) = V_{2Q}(Q) + V_{2S}(B^* - \xi(Q)) \quad (8)$$

### **b. Specification of functional forms**

In a next step we have to derive the functional forms of the model and to get closed form solutions. To work out the closed form solutions we specify the functional forms for the players' valuations and accordingly the budgetary constraints. In particular:

$$W_a(kQ) = v(kQ) \quad (9)$$

$W_a(kQ)$  is the utility that the principal derives from  $Q_a$ . We assume that the utility function is linear, implying that the principal's marginal utility  $v$  from  $Q_a$  is constant, if the quantity of the composite public good ( $Q$ ) is raised.

$$W_b((1 - k)Q) = \gamma((1 - k)Q) \quad (10)$$

$W_b((1 - k)Q)$  is the utility that the principal derives from  $Q_b$ . Accordingly we assume that the utility function is linear implying that the principal's marginal utility  $\gamma$  from  $Q_b$  is constant, if the quantity of the composite public good ( $Q$ ) is

raised. Since the principal assigns different values to  $Q_a$  and  $Q_b$  it holds that  $\gamma \neq v$ .

$$C(B) = \omega B \quad (11)$$

$C(B)$  are the marginal opportunity costs that the budget produces for the principal. The principal could spend the budget also for other projects than the composite public good ( $Q$ ). For example, he could pay back sovereign debts.  $C(B)$  is considered to be a linear function of the budget  $B$  with a marginal opportunity cost given by  $\omega$ .

$$V_{1a}(kQ) = \alpha_{1a}(kQ) \quad (12)$$

$V_{1a}(kQ)$  is the utility that the boss derives from  $Q_a$  if the quantity of the composite public good ( $Q$ ) is raised. We assume that the utility function is linear; implying the marginal utility  $\alpha_{1a}$  from  $Q_a$  is constant.

$$V_{1b}((1-k)Q) = \alpha_{1b}((1-k)Q) \quad (13)$$

Accordingly  $V_{1b}((1-k)Q)$  is the utility that the boss derives from  $Q_b$  if the quantity of the composite public good ( $Q$ ) is raised. We assume that the utility function is linear implying that the marginal utility of the boss  $\alpha_{1b}$  from  $Q_b$  is constant. Furthermore, we assume that the marginal utilities that the boss derives from  $Q_a$  and  $Q_b$  are different ( $\alpha_{1a} \neq \alpha_{1b}$ ). This implies that the boss values the two public goods differently.

$$V_{2Q}(Q) = \mu_2 Q \quad (14)$$

$V_{2Q}(Q)$  is the utility that the subordinate derives from the composite public good ( $Q$ ). It is considered that the utility function is linear, implying that the

subordinate's marginal utility  $\mu_2$  from the composite public good is constant. To keep the model tractable it is further assumed that the subordinate only cares about the overall size of the bureaucracy, which is captured by the level of the composite output, and not the composition of the public output in terms of  $Q_a$  and  $Q_b$ . This assumption is plausible, when an outsider identity is presumed and the bureaucrat mainly cares for the size of the budget, which he gets under control.

$$\xi(Q) = \phi Q \quad (15)$$

The total cost is a linear function of output. The more output is produced the more is the total cost. The linear cost function implies that the marginal cost  $\phi$  is constant.

$$V_{2S}(B - \phi Q) = (B - \phi Q)^\sigma; \text{ with } 0 < \sigma < 1 \quad (16)$$

$V_{2S}(B - \phi Q)$  is the subordinate's utility derived from budgetary discretion or slack (the amount of the budget that is not spent for the production of the public good, but is available for the subordinate to pursue his own goals). The slack is defined as the total budget  $B$  minus the cost of production  $\phi Q$ , and  $\sigma$  is the elasticity of slack. We assume that the utility from budgetary slack has diminishing marginal utility ( $\sigma < 1$ ). This assumption is reasonable, because otherwise the subordinate would simply appropriate the whole budget as slack and would not produce public output at all.

Finally, using the above functional forms, the payoffs of the players can be written as:

$$U_P(B; k, Q) = v(kQ) + \gamma((1 - k)Q) - \omega B \quad (17)$$

$$U_1(k; Q, k_1) = \alpha_{1a}(kQ) + \alpha_{1b}((1 - k)Q) - \lambda(k - k_1)^2 \quad (18)$$



$$U_2(Q; B) = \mu_2 Q + (B - \phi Q)^\sigma \quad (19)$$

**c. Solution of the benchmark model**

The interaction of the principal, the boss and the subordinate can be understood as a sequential game. At the first stage, the principal chooses a level of the budget. At the second stage, the bureaucracy observes this level of budget and determines its output. The budgetary allocation policy is then determined in a sequential move sub-game. In this sub-game the boss moves first and decides the allocation policy. The subordinate then decides the level of the composite public good.

The sub-game can be solved by backward induction. We assume that the budgetary size and the allocation of the budget have already been decided and it is up to the subordinate to decide how to effectively implement it given his production technology. In our model the best response of the subordinate will significantly impact the allocation decision and budgetary size at later stages of the game.

***Step 1: The optimization problem of the subordinate***

The decision problem of the subordinate writes as:

$$\text{Max}_Q U_2(Q; B) = \mu_2 Q + (B - \phi Q)^\sigma \quad (20)$$

The solution to this problem can be written as (see appendix 4A)

$$\hat{Q}(B) = (1/\phi)B - \theta(1/\phi)^\eta \quad (21)$$

Where  $\theta$  and  $\eta$  are parameters defined in terms of the marginal utility of the subordinate derived from the composite public good and the elasticity of the budgetary slack (see appendix 4A)

Equation (21) is the best response function of the subordinate for each budgetary allocation determined by the principal. It shows that an increase in the level of budget encourages the subordinate to increase the output of the composite public good. The extent of the increase depends on the productivity of the bureaucracy, which is the inverse of the marginal cost of production (i.e.  $1/\phi$ ). Simply put, if a bureaucracy produces at low marginal cost, then an increase of budgetary resources translates into an over-proportional output of the composite public good, while high marginal costs lead to a proportionally low increase of output. This observation reveals that the principal as well as the boss must have an interest in encouraging bureaucratic efficiency through appropriate incentives at the level of subordinates (for this finding see also Benabou and Tirole 2003; Dixit 2002).

***Proposition 1:*** Along the optimal path the subordinate, according to his marginal productivity, increases the output of the composite public good as a response to an increase of budgetary resources.

The optimal path of the subordinate (equation 21) determines precisely how the subordinate reacts to changes of the budget allocation to bureaucracy. For example, if the principal decides to enhance the budgetary allocation, then the subordinate observes this increase and provides more composite output in order to maximize his utility. The extent of the increase in composite output is directly proportional to the productivity of the subordinate. However, what is important here is that we take organizational slack into account (equation 21). Organizational slack allows a subordinate to spend resources disproportionately on individual utility enhancing expenditures, for example perks, privileges and patronage (Lindsay 1976; Williamson 1964). As a result organizational slack hinders a

bureaucracy from being efficient, when a growing budget goes into the pockets of subordinate bureaucrats.

***Step 2: The optimization problem of the boss***

Given the optimal response of the subordinate, we solve next the optimization problem of the boss, who chooses the budgetary allocation policy, in order to maximize his expected utility.

$$\text{Max}_k EU_1(k; Q, k_1) = E \left\{ \alpha_{1a} \left( k \hat{Q}(B) \right) + \alpha_{1b} \left( (1 - k) \hat{Q}(B) \right) - \lambda (k - k_1)^2 \right\} \quad (22)$$

The solution to the maximization problem is expressed as:

$$\hat{k}(B) = [(\alpha_{1a} - \alpha_{1b})/2\lambda][B E(1/\phi) - \theta E(1/\phi)^\eta] + k_1 \quad (23)$$

$E(1/\phi)$  is the expected productivity of the subordinate<sup>22</sup> (for further details see appendix 4A).

***Proposition 2:*** The boss' optimal choice of budgetary allocation policy depends on a composite of the marginal utilities derived from the composite public good, the identity parameter and his policy preference, taking into account the expected productivity of the subordinate.

For example, along the optimal path an increase of budgetary resources would prompt the boss to alter his budgetary allocation policy in favour of  $Q_a$ , if his marginal utility of  $Q_a$  exceeds that of  $Q_b$  and vice versa. However, the boss' identity mediates this not surprising result in a non-trivial way, because the higher the expected marginal cost of production, the lower the expected productivity of

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<sup>22</sup> Where  $\theta = (\mu_2/\sigma)^{1/\sigma-1}$ ,  $\eta = \sigma/\sigma - 1$  ( $\eta < 0$ ) and  $\phi$  is the marginal cost of production.

the subordinate, and so the less incentive there is for the boss to move his allocation policy from the point that coincides with his identity. As a result, the utility derived from growing public outputs might not be sufficient to induce the boss to change his policy ideal (for a similar argumentation see Akerlof and Kranton, 2005). Thus, while an increase in budgetary resources works as an incentive for the boss to change his budgetary allocation policy away from his ideal point, the freedom of the boss to adjust his policy stance is limited by his identity, which constrains the decisions of the boss. The stronger the identity of the boss is (a higher  $\lambda$ ), the lower is the boss' willingness to change his budgetary allocation policy, and thus the more budgetary resources would be required to induce him to change the budgetary policy. Thereby the subordinate significantly influences the allocation decision of the boss. If the subordinate is highly productive then this will induce the boss to change his budgetary allocation policy more easily and to deviate from his policy stance to reap the benefit of a higher public output. This result once more underscores the importance of including strategic interaction within a bureaucratic hierarchy into analyses of public policy making. The productivity of the subordinate not only has implications for the identity-based policy choices of the boss, it can also matter for the decisions of the principal. Hence a whole cascade of inter-related choices unfolds. A legislator may exactly know which policy outcomes should be achieved – such as a workable pension system or a reliable supply of clean water – but the legislator may be uncertain about the specific policy, which will achieve the objective. For example, a pension system might work either through private contribution to insurance schemes or through payments from general public revenues. But while the boss may be informed about specific policies to reach a certain policy goal (and hence the choice of policy may

be in the hands of the boss), he may not have all the relevant information about the appropriate technology available at the implementation level. This gives a sort of strategic advantage to the subordinate, and hence the latter's productivity becomes crucial for the principal and the boss to get their policy stance implemented. However, the boss is more informed about the internal attributes of the bureaucracy than the principal and as a consequence he can exploit this informational advantage in order to leverage his agenda setting power to constrain the choices of the principal. This issue relates directly to one of the most prominent problems of political agency, namely bureaucratic drift where the bureaucracy pursues policies that subvert or diverge from the goals of the principal (Gailmard 2002, Bueno de Mesquita and Stephenson 2007; Horn and Shepsle 1989; Shepsle 1992).

***Step 3: The optimization problem of the principal***

Given the optimal solutions for the provision of the composite public good and the decision on the budgetary allocation policy (equations 21 and 23), the principal chooses a level of budget to maximize his expected utility:

$$\text{Max}_B EU_p(B; k, Q) = E \left\{ v \left( \hat{k}(B) \hat{Q}(B) \right) + \gamma \left( (1 - \hat{k}(B) \hat{Q}(B)) - \omega B \right) \right\} \quad (24)$$

This optimization problem can be solved to yield the optimal level of budget:

$$B^* = \lambda \left[ (\omega - \gamma \cdot E(1/\phi) - (v - \gamma) \cdot k_1) / [(\alpha_{1a} - \alpha_{1b}) \cdot (v - \gamma) \cdot (E(1/\phi))^2] + \theta \cdot E(1/\phi)^\eta / (E(1/\phi))^2 \right] \quad (25)$$

Backward substitution yields the equilibrium values of the budgetary allocation policy ( $k^*$ ) and the composite public output  $Q^*$ . Put together, these solutions

define the perfect Bayesian Nash equilibrium of the benchmark model. It is characterized by  $(B^*, k^*, Q^*)$  such that:

$$B^* = \lambda[(\omega - \gamma E(1/\phi) - (v - \gamma)k_1)/[(\alpha_{1a} - \alpha_{1b})(v - \gamma)(E(1/\phi))^2] + \theta E(1/\phi)^\eta / (E(1/\phi))^2] \quad (26)$$

$$k^* = [\omega - \gamma E(1/\phi)] / [2(v - \gamma)E(1/\phi)] + [(\alpha_{1a} - \alpha_{1b}) \theta E(1/\phi)^\eta / 2\lambda] [(1 - E(1/\phi)) / E(1/\phi)] + k_1 [(2E(1/\phi) - 1) / 2E(1/\phi)] \quad (27)$$

$$Q^* = (1/\phi) \{ \lambda [(\omega - \gamma E(1/\phi) - (v - \gamma)k_1) / [(\alpha_{1a} - \alpha_{1b})(-\gamma)(E(1/\phi))^2] + [\theta E(1/\phi)^\eta / (E(1/\phi))^2] \} - \theta (1/\phi)^\eta \quad (28)$$

A unique equilibrium exists if the preferences of the principal and the boss are not aligned for the two public goods, i.e.  $(\alpha_{1a} - \alpha_{1b})(v - \gamma) < 0$ . This is the case when the boss' marginal utility from providing  $Q_a$  is higher than the marginal utility derived from the provision of  $Q_b$ , and if the principal's marginal utility derived from  $Q_a$  is lower than that derived from  $Q_b$ , and vice versa.

**Proposition 3:** A shift in the organizational goal of the boss to allocate more budgetary resources to the public good  $Q_a$  (an increase in  $k_1$ ) induces the principal to allocate more (less) budget to the bureaucracy, if the principal's marginal utility from  $Q_a$  is greater (less) than the marginal utility from the public good  $Q_b$ .

This result illustrates how the principal's strategic reaction to a shift in the organizational goal of the bureaucracy is influenced by the insider identity of the boss. Since the principal knows the insider identity of the boss, he anticipates the

propensity of the boss to shift the budgetary allocation towards  $Q_a$ . If the principal also prefers a higher  $Q_a$  then the principal will increase the budget. If the principal prefers instead a higher  $Q_b$  the budget will be decreased, in order to shrink the leeway of the boss. This means that the fact of the principal knowing the insider identity of the boss does not necessarily produce an ideal outcome from the standpoint of the principal and may exacerbate the problem of policy drift. Or, to put it differently, while normally the preferences of the principal in combination with the preferences of the bureaucrats are assumed to play the pivotal role in determining the overall policy direction, here the organizational goal of the boss takes primacy over the budgetary allocation process. This is because the boss gives more weight to the organizational goal and allocates a larger or smaller budget to a public good than his personal preferences would dictate to him. Akerlof and Kranton (2000, 717) describe this effect as a new type of externality in the process of decision-making. This finding has a straightforward policy implication, because if there are trade-offs between individual preferences and a person's identity, then it might be more appropriate to nudge the identity of the boss in a bureaucracy than to constrain the bureaucracy by law and regulations (Akerlof and Kranton 2005, pp. 13-15). However, the question is to what extent identity is mutable.

**Corollary:** A shift in the organizational goal of the boss to allocate more budgetary resources to  $Q_a$  (an increase in  $k_1$ ), would result in more (less) provision of the composite public good if the principal's marginal utility from  $Q_a$  (e.g. physical infrastructure) is greater (lower) than the marginal utility from  $Q_b$  (e.g. social sectors)

This result is a straightforward extension of proposition 3. A shift in the organizational goal of the boss towards the preferences of the principal induces the

principal to allocate a greater budget to the bureaucracy. An increase in budgetary resources in turn would encourage the subordinate to produce more of the composite public output. On the other hand, if the organizational goal of the bureaucracy diverges from the preferences of the principal, the bureaucracy's budget would be curtailed leading to a lower production of the composite public good. Apparently the insider identity of the boss is instrumental to the extent that it ensures the adoption of public policy by the boss in tandem with the shift of the organizational goal. This in turn has repercussions for the allocation of the budget by the principal to the bureaucracy.

In our model policy drift stems directly from identity driven preferences of the boss in a bureaucratic hierarchy. This distinguishes our model from earlier literature, where the principal is hesitant to delegate policy authority if the policy goal of the bureaucracy diverges from that of the principal (Gailmard 2009). In contrast, in our model even when the policy goals between the bureaucracy and the principal diverge, policy delegation may still take place.

***Proposition 4:*** An increase of the opportunity cost of the budget induces the principal to a reduction of the budget allocation to bureaucracy leading to a lower provision of the composite public good. On the other hand, an increase of the opportunity cost of the budget prompts the boss to a change of the budgetary allocation policy towards more (less) allocation of budgetary resources to  $Q_a$  (e.g. physical infrastructure) if the principal's marginal utility of physical infrastructure is greater (lower) than the marginal utility derived from  $Q_b$  (e.g. social sectors).

An increase of the opportunity costs of the budget forces the principal to cut the bureaucracy's budget, which in turn results in a lower provision of the composite



public good. More importantly, an increase of the opportunity cost of the budget prompts the boss to change his budgetary allocation policy with regards to  $Q_a$  and  $Q_b$ . The direction of this policy change, however, depends on the relative magnitudes of the principal's marginal utilities from the provision of the two public goods. Thereby, it is important to emphasize the role of bureaucratic hierarchy. The boss takes into account the strategic responses of the principal as well as that of the subordinate. For example, if the budgetary resources are cut, the boss anticipates a decline in the provision of the composite public output and reallocates the budget in line with the preferences of the principal.

In summary, the above analysis demonstrates how public policy is shaped by the interplay of the insider identity of the boss, the organizational structure of the bureaucracy and the preferences of the different players. The extent to which the identity of the bureaucracy is aligned with the goals of the principal becomes the key for understanding the determination of public policy in a bureaucracy. The game-theoretic framework presented here focuses exactly on the alignment of identities across different levels of bureaucracy by taking a hierarchical organizational structure into account as well as strategic interactions among the players.

## **4.6 General remarks**

Some points are noteworthy with reference to the foregoing discussion.

First, the game-theoretic framework is particularly important for examining the phenomenon of identity as it situates the individual within an organizational structure that allows strategic interaction among the players. Indeed, the notion of identity can only be meaningfully studied in a game-theoretic setting because it

allows the dependence of an agent's utility on his identity as well as on other agents' actions. Second, the analysis contributes to an enhanced understanding of the process of policy formulation by the bureaucracy in an environment where some agents may be distinguished by their distinct identities.

Third, by linking identity with organizational structure, we provide a conceptual elaboration of how identity plays out in a bureaucratic hierarchy where players in supervisory positions have identity while players in subordinate roles have no identity.

Finally, by demonstrating how the equilibrium values of the key variables are influenced by the interaction of identity, organizational structure and personal preferences of the players, we shed new light on the determinants of public policy in a bureaucratic organization.

Our analysis also demonstrates how public policy responds to exogenous changes through the interplay of insider identity of the boss, organizational structure of the bureaucracy and preferences of principal and boss. It is shown that the insider identity of the boss is more important than his personal preferences in determining the policy direction. It is important to emphasize here that while identity drives the behaviour of the boss in important ways, it plays little role in influencing policy outcomes in some circumstances. For example, in a strategic setting, while the boss takes due cognizance of the preferences of the principal in determining public policy, it is the identity of the boss that underpins the principal's decision to allocate more budget to the bureaucracy. On the other hand, an increase in the opportunity cost of the budget forces a budgetary cut regardless of the boss' identity. Besides the question of how and when identity plays a significant role in

determining policy outcomes, the role of identity must be underscored as an instrument to encourage bureaucracy to follow the dictates of the principal. As the identity of the boss is linked to the pursuit of a specific organizational goal, the principal may develop effective mechanisms to influence the identity of a bureaucrat so that his organizational goal becomes aligned with preferences of the principal. In this sense, the identity of a bureaucrat can become a self-disciplining device that keeps him on course in the choice and implementation of public policies and hence reduces the likelihood of discord between principal and bureaucracy.

For an illustration of how preferences of bureaucrats and their productivity interact and influence policy outcomes, consider a situation in which the bureaucracy is asked to improve the development condition in a city. It could involve improving the drainage system, building highways, public health sector or education. Bureaucracy may have a norm or mission to allocate more budgets to highways rather than to health and education. Let us assume for highways in the city the bureaucracy needs to facilitate land acquisition along with measures for anti-encroachment. How meticulously the bureaucracy appraises each individual application for land acquisition represents effectiveness of policy at the implementation stage. The policy, even though very efficiently crafted on a technical level, may still prove ineffective if the bureaucracy does not invest sufficient effort to develop the competence to implement effectively. For example, if the bureaucracy were to invest low effort through insufficient staffing, or lack of technical support in reviewing permit applications it would be much more prone to erroneously grant permits when they should not have been granted or deny permits when they should have been granted. In both cases the policy is

ineffectively implemented due to lack of productivity. This example — along with many others in which agencies grant or deny permits, make licensing decisions, provide disaster relief, housing, and other government aid --- illuminates how the overall quality of agency operates in the model. If the Agency invests insufficient effort then, regardless of its policy choice, the quality of outcomes suffers through lack of policy precision, and overall policy outcomes would be lower than promised.

In our set-up identity-driven choices of policymakers are influenced by bureaucracy's productivity, which can be construed as effectiveness of policy implementation (Carpenter 2001). For example, a senior bureaucrat may get assistance from international development agencies to build a water project while he has preferences for highways. If boss is able to motivate those working under him to get the job done well in the water project, then he may be compensated for his utility loss (due to choice of water project instead of highway) by the enhanced productivity of a sub-ordinate, which yields more public output.

It is thus clear that an agency's productivity is crucial for the quality of policy outcomes as it impacts upon the choices of both boss and principal. The higher the level of effort invested by the agency toward implementation, the more precise are policy outcomes. Consequently, as agencies choose policy along some substantive or ideological dimension they must also effectively implement or enforce policy in practice (Carpenter 2001; Derthick 1990; Lipsky 1980).

The bureaucrat's identity also determines whether the political principal will make fiduciary investment<sup>23</sup> in terms of budgetary resources of the agency (Krause and

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<sup>23</sup> The principal can use fiduciary investment as a tool to mold the behaviour of the bureaucrats.

O'Connell 2012). Furthermore, the degree of trust by principal (politician) on agent (bureaucracy) will be conditioned by organizational norms of the agency. As Moe (1985) writes that a political principal entrusts a responsive bureaucrat and bestows him with authority and resources with the belief that he will pursue the principal's policy goals. A bureaucrat without identity may place more weight on complying with the political principal's goals and hence can attract more budgetary resources. Similarly, in deciding about fiduciary investments, the principal may rely on bureaucratic competence<sup>24</sup>, which increases the reputation of the agency to carry out a particular policy task (Carpenter and Krause 2012; Gailmard and Patty 2007).

## **4.7 Identity and bureaucracy: some conclusions**

A bureaucracy is an organization where social norms and policy taste play an important role. When the legislator delegates a policy to a bureaucrat it is shaped not only by the preferences of the bureaucrat but also by the social norms of the organization. This seemingly simple set-up creates a bunch of interesting questions: What role does a bureaucrat's identity play for the policy outcomes? What role does the internal organization of bureaucracy play for the policy outcome? Do all agents identify alike with the goals of bureaucracy? What are the trade-offs between individual and organizational goals faced by a bureaucrat who identifies with the organization? And what are the externalities inherent to an

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<sup>24</sup> Davis (2003) "Identity and commitment"

identity augmented utility function of top echelon bureaucrats on politicians and low-tiered bureaucrats?

To assess these questions we develop a principal-supervisor-agent (P-S-A) model of policy choice, where the legislator and bureaucrats are driven by different concerns. The legislator provides the budget; the top echelon bureaucrats make an allocation decision according to the goals of the organization, and the subordinate implements the policy choice.

The chapter employs the Akerlof-Kranton concept of identity, in order to give an in-depth analytical description of the interaction between identity and hierarchical decision-making in a bureaucracy. We incorporate the notion of identity in a game-theoretic model that emphasizes the strategic interaction among bureaucratic actors at different levels of the bureaucracy and the legislator for the determination of public policies. In particular it can be shown that the identity of the boss in a bureaucracy plays an important role for the determination of public policies. If the boss has an insider identity and is driven towards pursuing organizational goals, then all equilibrium outcomes of the public policy are affected, including the overall size of the budget, the budgetary allocation policy and the size of the bureaucracy. Thereby the boss' decisions are constrained by the opportunity costs of budgetary resources and the marginal costs of providing the composite public good. Consequently, actual policy choices will only partly coincide with the policy ideal of the boss, but are amalgams of organizational and individual decision mechanisms, which are interspersed by identity.

For that background, the chapter contributes in three dimensions to the literature. First, we incorporate identity as a non-pecuniary motivation in the bureaucrat's

utility function in order to analyse his behaviour with regard to public policy choices. Second, we show that public policies are determined by the interaction of the various hierarchical layers of a bureaucracy.

Third, we identify possible trade-offs between individual preferences of bureaucrats and the organizational identity of a bureaucracy. The inclusion of identity into the analysis of bureaucracy yields a more faceted picture of policymaking.

Our analysis produces two main results. First, the possibility of an inefficient policy outcome, in terms of public good provision, is higher if the identity-based preferences of the high-level bureaucrat diverge from the preferred policy goal of the legislator. Second, bureaucrats with different roles (policymaking or implementation) have different individual goals and it is the interplay of these different goals, which determines the provision of the public good. For example, whereas the boss wants to adhere to his identity preferences (non-pecuniary goal) the subordinate wants to increase the budgetary slack (pecuniary goal). Thus, lawmakers should not only be cognizant of the bureaucrats' identity, but it may be more appropriate to nudge the identity of the boss in a bureaucracy than to constrain the bureaucracy by laws and regulations, in order to reach a specific policy outcome (for a similar result see Akerlof and Kranton 2005, pp. 13-15)





# Chapter 5

## Conclusions and Policy Implications

### 5.1 Overview

The dissertation seeks to maintain that public bureaucracy is an organization in which institutional context (prevailing at the time of founding) and the organization's social context play a significant role in shaping the choices of the bureaucrats. When the legislator delegates a policy to a bureaucrat it is shaped not only by the preferences of the individual bureaucrats but also by the past organizational structures, strategies, technologies and social norms of the organization.

Legal theorists, political scholars and economists have all addressed how rational actors (legislators) can control the behaviour of agents to whom they delegate authority. However, little attention has been given to the underlying causes of bureaucratic drift duly taking into account organisational context. The dissertation has investigated the behaviour of bureaucrats by exclusively taking into account different types of contextual situations that influence bureaucrat's policy choices.

In order to understand the context of bureaucratic choices directly stemming from the organizational, institutional and social factors, the study encompasses two generic research routes, which are covered by the content of three chapters of the dissertation.

In the first research route the impact of history on present organizational structures is investigated with the theory of organizational imprinting. This refers to the process through which the economic, social and institutional factors, which prevailed at the time of founding, shape present organizational forms and attributes. More specifically, organizations tend to adopt those attributes and strategies that are particularly suited to reflect the institutional context at the time of their establishment. This institutional context is showcased in the form of structural rigidity of various organizational attributes over time.

Following this line of enquiry, the chapter 2 of this dissertation provides a long-term temporal perspective on the persistence of organizational design. More specifically, it has been argued that past patterns are critical to our understanding of how bureaucracies and their specific mode of operation become persistent over very long time frames. The long term view on the matter allows us to better explore and explain why corruption and rent-seeking continue in many bureaucracies although the founders of the bureaucracy have disappeared a long time ago and history has provided ample chances for a country to change its path.

The study identifies the triggers of bureaucratic rigidity with the help of the Pakistani bureaucracy, which has not essentially changed over the last 150 years. The study also provides an account of how certain practices during the colonial era of the Indian sub-continent led to unintended consequences in the form of bureaucratic power, corruption and control over economic policies.

Chapter 3 continues to follow the theory of organizational imprinting and argues that once the bureaucracy acquires specific characteristics in line with the dictates of the environment, the forces of inertia and institutionalization contribute to

policy rigidity/status quo bias in the decision-making of the bureaucrat. The chapter proposes that organizational actors may be stuck with initial policy choices, which may lead to persistent inefficiencies. Hence, the core attributes of an organization, besides influencing the type of organization and its form at the macro level, also have a deep influence on various micro level characteristics of an organization.

The second research route aims at finding a more valid explanation of actual decision making when social context and cognitive stances matter. In chapter 4 of this dissertation, it is exemplified that a bureaucratic organization is a formalized social system where one considers it as essential to comply with organizational goals in order to be considered as a member of the organization. The notion of social context in the form of identity not only provides a plausible explanation for the effectiveness of non-monetary incentives in an organization, but also a sort of tub for behavioural stances of bureaucrats which make them deviate from opportunism. As a result identity can be understood as a label for the strong binding forces of social networking in organizations, which have to be taken into account when one seeks a deeper analysis of bureaucratic decision-making. In order to analytically seize the social context of the bureaucratic organization the notion of identity is conceptually integrated into the decision calculus of the bureaucrat. More explicitly, the term identity is used to describe a bureaucrat's "social category" as well as his "self-image". In the proposed analysis a bureaucrat captures utility gains from behaving in a manner, which is in line with the established identity, and he experiences disutility when the behaviour deviates from what is dictated by identity.

It is important to mention that the term “preferences” in the third and fourth chapters refers to choices, which are influenced by the organizational imprinting or the social norms of the organization. These choices are introduced in the form of inertial-preferences and identity-driven preferences in the decision calculus of the bureaucrats. However, the term ‘preferences’ in this study is not meant to refer to mental states behind choices, those mental states including assessments of social norms, the valuation of inertial imprinting are beyond the scope of the study. The focus has been rather on exploring the contextual factors that produce diverse choices in particular settings. Furthermore, there is no simple contrast between “rationality” and context-oriented choices in our analysis. Individual rationality is influenced by the organizational imprinting and social norms, over which individual agents have little or no control.

An understanding of the organizational context of policy choices bears a great deal on the design of effective policies to change bureaucratic behaviour. In particular, the analyses of the inertial and identity-driven choices point out that many well-known anomalies in the behaviour of bureaucrats are best explained with reference to contextual framework. These contextual factors can either help to produce socially optimal choices or force policy choices that are non-optimal from a social point of view. Consequently, policy interventions in the form of information campaigns, persuasion, training, economic incentives, or legal coercion might be necessary to enable bureaucrats to change contextual choices. However, when these contextual factors are facilitating optimal choices, no policy intervention is required, rather the focus should be to streamline the system in order for bureaucrats to act according to these contextual factors. Thus for the policy analysis it should be explored, first, how contextual factors play a part in

determining choices; especially whether the social or institutional factors promote or hinder socially optimal choice. The next step of policy analysis should be to see whether the inertial tendency, imprinting and identity oriented choices can be obstacles to the efficient provision of public goods, and whether something might be done to change them, even if agents are making “simple choices,” and whether or not there is “harm to others” for example social welfare loss in the form of inefficient provision of public goods.

In the next section we spell out the main findings of the research and discuss their policy implications.

## **5.2 Imprinting and bureaucracy**

Chapter 2 discusses that to meet the pressing governance challenges at the time, the British laid the foundations of a strong and powerful bureaucracy. At the time of independence, Pakistan established the Civil Service of Pakistan that was essentially a descendent of the Indian Civil Service ‘in law as well as in spirit’.

The analysis shows that the historical and institutional context prevailing at the time of founding of the bureaucracy left several imprints in terms of its structure and power, culture of rent-seeking, and patron-client relationships as a mode of governance. Given pressing governance challenges at that time, the colonial regime needed a powerful organization that could ensure internal security and stability for the smooth collection of revenues. The cadre- based structure of the bureaucracy was thus designed to provide an effective centre of governing power that could perform complex administrative tasks. In addition the patron-client relationships with local elites proved a convenient mode of governance to

consolidate colonial rule, and such relationships inevitably spawned a culture of rent-seeking.

Once the bureaucracy had acquired specific traits in line with the dictates of the environment, forces of inertia and institutionalization came into play that contributed to their persistence over time. Accustomed to power and an authoritative style of governance, the bureaucracy strived to perpetuate its power through either forging alliances with other centres of power or through efforts to undermine the political process. When a pattern of authority had been established, it gained social acceptance and legitimacy through institutionalization of power relations, and consequently the bureaucracy remained a dominant player with significant clout over administrative functions including the design and implementation of economic policies and programs. The bureaucratic power also gave rise to rent-seeking as powerful actors used their control over policies and resources as instruments to their own advantage. Along the same lines corruption showed a tendency to become institutionalized as a shared norm and an objective and external fact, which is resistant to change. Corruption also thrived as the bureaucracy, learning from the organizational memory, continued with the patron-client relationships as a mode of governance based on its success in the colonial era.

While centred on Pakistan, the approach and arguments we outline provide insights into some common dilemmas of post-colonial bureaucracies. For instance, policies for fighting corruption in post-colonial societies are rarely informed by a study of colonial structures that have persisted after independence. Rather the focus has been on administrative and procedural methods instead of addressing perverse incentives embedded in the historical evolution of administrative culture.

Before the enactment of procedural laws, one needs to understand the historical roots of corruption. Countries like Pakistan have failed in their reform efforts by relying on existing mechanisms based on administrative rules and procedures rather than tackling the deep-seated incentives for corruption. Hence, there is a need for new thinking on administrative structures as well as bureaucratic attitudes to effectively address corruption. Such innovations require fresh observation, and a theoretical framework quite different from the neo-classical economic framework that has dominated corruption reform efforts.

### **5.3 Legal implications of the imprinting analysis: the case of Pakistan**

To this effect, our analysis provides key insights into the internal structure of a bureaucratic system inherited from the colonial masters, revealing a distinctive stamp of historical legacy on present bureaucratic forms including incentives for corruption. As shown in chapter 2, the culture of rent-seeking and patron-client relationships as a mode of governance in the British administrative system was successful as these conformed to the institutional demands of the time. Furthermore, accustomed to power and authoritative style of governance, bureaucracy remained a dominant player even after independence, with significant clout over administrative functions including the design and implementation of economic policies and programs. Similarly, the success of the organization in the colonial era led the post-independence bureaucracy to stick to the same structure in terms of mode of governance. The excessive power over economic resources by these unelected public officials eventually legitimized corruption as a shared norm. This understanding of the dynamics of bureaucratic power and control and the

institutional mechanisms through which they are generated and sustained is central to fighting corruption.

In Pakistan three institutions namely, Establishment Division, Federal Public Service Tribunal and Federal Public Service Commission, are responsible for the efficiency and discipline of the federal public servants. The internal accountability process is the responsibility of the Establishment Division (federal) and the Services and General Administration Departments (provincial), both staffed by members of the bureaucracy enforcing the efficiency and discipline rules on their peers with a mandate to enforce minor and major penalties. The external accountability authorities require the court of law to determine violations of the penal and criminal procedure code on the basis of the Evidence Act, which is the law governing evidence in the law courts of Pakistan. However, both internal and external accountability mechanisms are often weakened as decisions are evacuated on technical considerations of evidence not meeting the requirements of the Evidence Act and the judicial process. The Judicial process of accountability cannot begin for higher officials without the consent/approval of the bureaucracy itself.

Since independence in 1947, dozens of administrative measures have been taken to tackle corruption in bureaucracy in Pakistan. When a bureaucrat is found to be involved in corruption, under the National Accountability Ordinance (NAO) of 1999, along with efficiency and disciplinary rules of 1973, he is charged with “misconduct”. He can also be charged under section 9 (a) (4) of the National Accountability Ordinance (NAO) under which a person is considered involved in corruption or corrupt practices if he “misuses his authority so as to gain any benefit or favour for him or any other person, or renders or attempts to render or wilfully



fails to exercise his authority to prevent the grant, or rendition of any undue benefit or favour which he could have prevented by exercising his authority”.

Also patron client relationships are described as misconduct as defined under Government Servants (E&D) Rules of 1973 and Government Servants (conduct) Rules of 1964 for bringing political or other outside influence directly or indirectly to bear on the government or any officer in respect of appointment, promotion, transfer, punishment, retirement, etc.

The president in consultation with the Chief Justice of Pakistan is required to appoint a Supreme Court judge to hold an inquiry into such matters. If the judge finds a bureaucrat guilty of misconduct (as held by the apex court) or is incapable of properly performing his duty, the president will remove him from office.

As far as the government is concerned, it cannot take action against bureaucrats since they enjoy protection under Article 209 of the Constitution, which says civil servants are permanent government employees and thus cannot be removed by any politician, except for filing a reference in the Supreme Judicial Council.

To sum up, the government’s anti-corruption approach has been mainly prosecutorial, involving the criminalization, investigation and prosecution of corrupt behaviour as a special offence. Little attention has been devoted to understanding the underlying institutional determinants of corruption, which is important for designing an effective anti-corruption strategy. That’s the core reason that, although administrative initiatives have been introduced repeatedly over decades, levels of corruption have actually increased in the bureaucracy.

Over the years, some 34 federal and provincial institutions have been created with a variety of control mandates to ensure the efficiency, responsibility and

accountability of the administrative agencies. To strengthen efforts to curb corruption, the government enacted the Ehtesab Ordinance and established the National Accountability Bureau (NAB), which is currently the supreme anti-corruption agency in the country. However, NAB remains mired in controversy due to politicization and its failure to catch top bureaucrats and politicians involved in corruption.

The failure of efforts to control corruption can be understood in the light of our analysis in chapter 2, which shows that corruption thrives on discretionary powers of the bureaucracy that facilitate their rent-seeking motives. A key policy lesson is that a system of governance where power and corruption have been institutionalized cannot be dismantled by administrative procedures alone. What is needed is a holistic approach towards fighting corruption based on a complete understanding of the institutional environment, which creates incentives for corruption in the first place. In this context, policies should aim at minimizing bureaucratic discretion while at the same time ensuring the smooth functioning of the bureaucracy. Putting in place transparent guidelines for bureaucratic conduct coupled with strict enforcement of accountability mechanisms can be instrumental in controlling corruption. Furthermore, education and training programs can be effective in influencing the behaviour of bureaucrats. In particular, anti-corruption programs in the bureaucracy may target fresh recruits to inculcate values of honesty and integrity. As shown in chapter 2, in the formative years individuals in an organization are more flexible and hence can be ‘imprinted’ by honest work ethics that can help the organization break away from the past. For example, new entrants to Pakistan’s civil service are provided with training at the time of their induction into the service. The training program is aimed at educating the trainees

about Pakistan's socio-economic structure, demographics, and public administration methods. The curriculum of the training program may include at least one course on work ethos and social values that can be helpful in creating a sense of civic and honest behaviour among public servants.

Some other measures such as increases in salaries to partially accommodate for loss in income originating from corrupt practices, as well as a combination of administrative measures and appeals to conscience can result in a reduction of corrupt behaviour. For example, providing for strong internal administrative accountability and vigilance in systems and procedures with strict compliance can help to reduce corruption. Similarly, introducing mandatory disclosure and transparency requirements, including the application of information communications technology to all appropriate processes and procedures and treating any failure on this count as a criminal offence can be helpful in reducing corruption. Also, a system of promotions based on merit rather than rigid procedural requirements can be effective in giving administrative control to honest civil servants.

To sum up, some important policy lessons emerge from this analysis.

First, bureaucratic power and corruption are intertwined and thus policies should aim to curb bureaucratic power so as to minimize bureaucratic discretion without compromising their functional responsibilities and work efficiency. This could be achieved by laying out clear and transparent rules and guidelines for bureaucratic conduct as well as strict enforcement of bureaucratic accountability to minimize the chances of malfeasance.

Second, policy interventions to fight corruption need to control the malaise of rent-seeking by reforming the regulatory apparatus so that bureaucracy is weaned away from patron-client relationships to a system of governance based on public service delivery. The Pakistan government has taken steps in that direction. For example, the government has curtailed the role of bureaucracy in major economic sectors including energy and telecoms and appointed independent regulatory agencies such as National Electric Power Regulatory Authority (NEPRA) and Pakistan Telecommunication Authority (PTA). Such initiatives are expected to keep important businesses out of the bureaucratic reach thus minimizing rent-seeking opportunities.

Finally, the civil service reform programs in developing economies, often supported by the donor agencies, must be designed while keeping in view the historical and institutional context that plays a pivotal role in shaping bureaucratic behaviour. Indeed, past experience has shown that civil service reforms have largely failed, not least because of the neglect of the local context in the design of the reforms. Failure to take due cognizance of the context factors seriously impairs the effectiveness of policy instruments designed to control corruption in the public sector. In Pakistan for example, the World Bank launched the Public Sector Capacity Building Project in 2004 with the aim of improving the system of governance through civil service reforms. However, it is widely believed that despite such donor supported efforts, civil service reforms in Pakistan have not yielded the desired results, due mainly to the absence of a 'home-grown' reforms program that takes into account the local institutional context.

The foregoing discussion underscores a key point of this research, that roots of corruption go deeper than is generally realized by researchers and policymakers.

Consequently, anti-corruption policies need to be based on a thorough understanding of the historical and institutional factors, which shape attitudes towards corruption. Most of the earlier literature on corruption focuses on the financial incentives of bureaucrats to indulge in rent-seeking behaviour and consequently their recommendations are restricted to devising schemes for monetary compensation. In contrast, our research has derived some important policy implications that aim to target the institutional drivers of corruption so as to improve the effectiveness of anti-corruption measures.

## **5.4 Lessons from inertia and policy rigidity analysis**

The notion of initial imprinting reinforces assumptions in the classic delegation models that agency preferences and incentives may be set when the agency is created. Following this line of enquiry, chapter 3 of the dissertation analysed how imprinting results in inertia and policy rigidity.

In particular, the study develops a theoretical framework that synthesizes insights from the theory of organisational imprinting with budget-maximization in the tradition of Niskanen. The proposed framework shows that organisational and institutional constraints embedded in initial policy choices, fundamentally alter subsequent policy choices of bureaucracies and this is consequential for voters' utility from policy outcomes.

Furthermore, the results illustrate how status-quo bias might lead to further budgetary inefficiencies in the budgetary bargaining model, or how it might lead to more socially desirable budget allocations even when bureaucrats have preferences that diverge from those of a representative voter or legislator.

The study reveals that a bureaucrat in rational choice models not only maximizes budget but also minimizes psychological cost due to imprinted policy preferences dictated by organizational past trajectories. Hence welfare loss occurs not just because bureaucrats engage in budget-maximizing behaviour, but also potentially due to the cost incurred in moving from an initial policy to a new policy (i.e., inertia). These results also lend an analytical perspective to inertia as a cause of bureaucratic drift and its consequences in terms of social welfare. Therefore, it becomes apparent that imprints of the past have a decisive effect on the individual behaviour of bureaucrats.

In the following, we spell out some key policy implications of our analysis that investigated the inertial preferences of bureaucrats in public policy due to strong imprints.

An understanding of inertial policy choices bears a great deal on devising effective policy to change bureaucratic behaviour.

First it should be explored whether institutional factors are an ingredient in the policy choice of bureaucrat. The next step of policy analysis should aim to see whether the inertial tendency and imprinting result in inefficient provision of public goods. In terms of bureaucracy's role in the provision of public goods and services, policies that aim to check over-production of public goods and services must be based on proper identification of the source of over-production i.e. whether over-production is driven by budget maximization or is it driven by bureaucratic inertia towards certain policies which are inefficient? Policies that target monitoring of bureaucrats against their opportunistic behaviour can be

welfare improving only when over-provision of public goods is driven by budget maximizing behaviour.

Second, it is also critical to understand that policy inertia can run counter to budget maximization as early imprints of the bureaucracy may actually constrain bureaucrats in their effort to maximize budget. On the flip side, imprints may also lead to budget allocations to the bureaucracy, which are persistently too low and result in under-production of public goods. In developing countries, for instance, the bureaucracy often holds the power to determine budgetary allocations due mainly to lack of legislative capacity to deal effectively with the technicalities of the budgetary process.

Third, while bureaucratic preferences can be inertial, it does not follow that such preferences necessarily result in welfare loss. The inertial policies of bureaucracy can be welfare improving when political parties are polarized, when bureaucratic preferences were successful in the past, and when the political interests change relatively rapidly.

Furthermore, an understanding of such patterns of imprinting combined with socio-legal boundary conditions is essential to develop tailored policy recommendations for reforms of bureaucracy. To illustrate, Pakistan has faced the problem of persistently high fiscal deficits, as budget-maximizing bureaucrats tend to expand their development budgets while revenues fail to keep up owing to a narrow tax base. Bureaucratic preferences towards high development spending may cause policy rigidity and bureaucrats may be reluctant to control their expenditures resulting in the persistence of fiscal deficits. To control this problem, Pakistan, like many other countries, has enacted the Fiscal Responsibility Law that

restricts the bureaucrats to maintain their budget deficits below 4 percent of gross domestic product (GDP). This law has put pressure on bureaucracy to bring its spending in line with growth in revenues to maintain a level of fiscal deficit permissible by law. Yet there are instances when fiscal deficit exceeds the limit imposed by the law. In this context, the law can be made more effective by curtailing discretionary powers of the bureaucrats which enable them to often overspend in pursuit of their preferred budgetary allocations as pointed out by our analysis.

## **5.5 Policy implications of bureaucratic identity analysis**

Chapter 4 incorporated identity as a non-pecuniary motivation in the bureaucrat's utility function in order to analyse his behaviour with regard to public policy choices. We show that public policies are determined by the interaction of the various hierarchical layers of a bureaucracy. The study identified possible trade-offs between individual preferences of bureaucrats and the organizational identity of a bureaucracy to yield a more faceted picture of policymaking.

Our analysis produces two main results. First, the possibility of an inefficient policy outcome, in terms of public goods provision, is higher if the identity-based preferences of the high-level bureaucrat diverge from the preferred policy goal of the legislator. Second, bureaucrats with different roles (policy-making or implementation) have different individual goals and it is the interplay of these different goals that determines the provision of the public goods. For example, whereas the boss (higher echelon) wants to adhere to his identity preferences (non-pecuniary goal) the subordinate (lower echelon) wants to increase the budgetary



slack (pecuniary goal). Thus, lawmakers should not only be cognizant of the bureaucrats' identity, but it may be more appropriate to nudge the identity of the boss in a bureaucracy than to constrain the bureaucracy by laws and regulations, in order to reach a specific policy outcome.

An obvious question is to what extent identity is mutable? While pecuniary incentives can be devised to change the behaviour of employees and their productive efforts, how much will it cost to change the identity of agents? One policy instrument is training and development programs aimed at inculcating values and norms in an agency and this may not cost much as public sector employees are likely to be more receptive to such training programs in view of their long-term affiliation with the organization. Similarly, the cost of inculcating identity will be lower for agents higher in the hierarchy of public organizations since such employees become attached to the organization due to their long service and thus are more likely to internalize the values of the organization. The training and learning programs can be developed using insights from studies on social determinants of behaviour which show that individuals can be nudged to control decision biases and social influences.

Another important mechanism through which the legislator can ensure the effective implementation of his policies is the selection of bureaucrats. The two most popular selection mechanisms are meritocratic selection and partisan selection. It is apparent that partisan selection will bring bureaucrats ideologically closer to the principal's ideal policy choices. However, bureaucrats thus selected may lack expertise and training. As a result the provision of public goods may deviate considerably from what the legislator would have expected. On the other hand, bureaucrats selected in a meritocratic system typically have a higher level of

policy expertise and ensure policy continuity because of their permanent positions in office. To the extent that policy drift depends on the productivity of the subordinates at the implementation level, a meritocratic system may be preferred as expert bureaucrats at the top level are better able to increase and to monitor the productivity of the subordinate.

Finally, there is a trade-off between enacting laws to control the behaviour of bureaucrats at the implementation level on the one hand and using nudging as a vehicle to influence the behaviour of the higher echelon bureaucrats to control the problem of policy drift on the other. It can be more effective to change or amplify the identity of higher-level bureaucrats and to make their behaviour conform to the political goals of the legislator than to build-up a tight regulatory environment, which becomes circumvented by smart bureaucrats.

The premise that identity is central to bureaucratic decision-making has important implications for the design of contracts in principal agent relationships.

The contractual agreement of policy delegation from the political principal to the agent (bureaucrat) must be informed by behavioural considerations including the social identity of the bureaucrat. This may involve explicit recognition of non-pecuniary motivation as a possible cause of policy drift, as is the tradition in contract theory of private agency. As identity is an important source of worker's motivation in public sectors, its omission in contracts would lead to inefficient policy outcomes. Furthermore, explicit recognition of identity will allow the legislature to deal with the moral hazard problem that may stem from the non-pecuniary motivation of bureaucrats.

To conclude, this research has provided an institutional perspective on the policy choices of bureaucrats focusing in particular on three aspects. First, the research has provided a historically embedded explanation for the persistence of bureaucratic attributes such as administrative structures, control of power and rent-seeking motives. Second, we have dealt with the issues of bureaucratic inertia and policy rigidity in a theoretical setting that incorporates the role of switching costs emanating from institutionalized norms. Third, the role of bureaucratic identity has been highlighted in strategic decision making by bureaucrats at different levels of bureaucratic hierarchy.

Our research can add value in guiding reforms in administrative laws that govern bureaucratic behaviour, especially in context of Pakistan. To illustrate, consider the Administrative Procedures Act, which plays a key role in Pakistan administrative law as a legal instrument to keep checks on the decisions and actions of bureaucrats. Interestingly, the role of procedural rules, which provide the means to control bureaucratic inefficiency and drift, has rarely been investigated, to check whether these laws address all types of economic slack created by bureaucrats. In particular, our finding that bureaucrat's decision-making is influenced by a complex interplay of monetary and non-monetary incentives can be helpful in the design of appropriate administrative laws and procedures to control bureaucratic behaviour so as to ensure bureaucratic efficiency and accountability. For example, to incentivize bureaucratic efficiency, administrative rules may not only provide monetary rewards for individual performance but also recognize and acknowledge team performance in groups that identify with organizational goals. Such non-pecuniary incentives can be

instrumental in motivating bureaucrats to achieve efficiency in public service delivery.

There are at least four areas where the insights of this research can be applied especially in the context of Pakistan's bureaucracy.

First, the Federal Public Service Commission (FPS), which is responsible for laying out the administrative structure of the bureaucracy, may seek to revamp the cadre-based structure of the bureaucracy through an Act of Parliament. In this context, it is essential also to pay due attention to educating the bureaucrats regarding the need for restructuring the bureaucracy to achieve the larger development goals of the nation. Such awareness programs can be instrumental in changing attitudes towards reforms and developing away from imprints of the past.

Second, laws to control corruption (section 5.3) must be informed by the institutional context which gives rise to corruption in the first place. Without calibrating such laws to reflect the institutional factors discussed in the study, corruption is likely to persist despite the enactment of laws to curb corruption.

Third, there is a need to devise institutional mechanisms to formalize the interaction between legislature and bureaucracy especially for the budget making process. One such mechanism could be the establishment of a high level budgetary committee, comprising both bureaucrats and legislators, with the task to develop budgetary allocation proposals to be included in the Finance Bill. This measure could be helpful in aligning the preferences of the bureaucrats with those of the politicians, thus improving social welfare.

Finally, the Efficiency and Discipline Rules 1973, which set out detailed administrative laws and procedures to govern the conduct of bureaucrats need to

be amended to devise a system of promotion on the basis of merit rather than seniority alone. A focus on merit would ensure that bureaucrats having a strong identity with the organization are promoted to higher policymaking levels thus ensuring better policy outcomes.

## **5.6 Future research**

Future research can proceed in two broad directions, theoretical and empirical. There are several areas in which theoretical research can make important contributions. First, the analysis of agency burrowing suggests that theories of the bureaucracies should focus more explicitly on institutional and social constraints. Our analysis of policy choices in this context focused on the bureaucrats keeping preferences of the legislator exogenous. An important area of research is thus to endogenize the preferences of the legislator to investigate how these preferences are formed and what are the factors that could influence such preferences. This research could come up with interesting propositions on legislative policy preferences highlighting, for instance, political economy and legal considerations as well as political incentives to promote a certain policy choice in bureaucracy.

Second, theoretical research can focus on developing a more elaborate dynamic optimizing framework to study state-dependent preferences of bureaucrats in a dynamic setting. In a dynamic framework, the states of nature are explicitly connected with the time dimension, which facilitates the study of how policies evolve over time. This research can provide interesting insights on the comparative dynamics of changes in policy in response to exogenous changes in institutional and social contexts.

Third, the economic analysis of identity (chapter 4) has the potential to be extended to shed light on a wide array of important administrative issues that may emerge in public and private organizational settings. Our model embeds identity in a framework that incorporates many features common to models of bureaucratic politics, such as preference divergence, specialization, and policy delegation. The main predictions related to identity driven preferences, policy choice, and the technological environment of the bureaucracy can be applied to gain a better understanding of the policy setting environments in which non-pecuniary motivations of agents are given due consideration. It thus appears that targeting identity can be an important mechanism to achieve the legal and administrative compliance of agents in policy delegation settings. Research can explore the ways in which identity can be targeted focusing in particular on monetary incentives, administrative laws, and training and peer pressure. Similarly, future research can explore the applicability of identity economics to complex contracting situations involving legislative and executive branches of the government. Research in this area can produce useful insights on how identity economics can be deployed in programs to reform the bureaucracy.

On the empirical front, research can aim to test the key predictions of the theoretical models presented in this dissertation. This research can proceed in two directions. First, the role of imprinting can be tested using simple differential equations that link past choices with the present ones. This analysis can be helpful in identifying temporal causal mechanisms that underpin the persistence of organizational attributes. Second, empirical research may be based on a survey of the perceptions of bureaucrats. For this purpose, a survey may be conducted to collect primary data on key variables such as individual profiles including policy

preferences, drivers of individual motivation, monetary incentives, incentives for teamwork, and administrative procedures. A simple econometric model can be used to assess how policy preferences of bureaucrats are formed in terms of their monetary incentives and administrative procedures. Similarly, the role of identity can be investigated by looking at the interplay of drivers of individual motivation and incentives for teamwork.

The empirical analysis can also be conducted at cross-country level to take into account the diversity in socio-legal and institutional contexts of bureaucracies across different countries.

## *Appendix: Chapter 2*

The survey was conducted among the six most senior ranks of bureaucrats from BPS-17 to BPS-22. The data were collected from eight occupational groups namely District Management Group (DMG), Pakistan Administration Service (PAS), Information, Income Tax, Office Management Group (OMG), Pakistan Audit and Accounts, and Pakistan Railways.

As a first step, a list of 200 CSP (Civil Service of Pakistan) officers was collected and compiled with email addresses. Before initiating the survey, the list was updated with the help of a research team in Pakistan. This was a very challenging task to trace all the civil servants through emails, as many respondents were not prepared to answer. However with repeated contact we were able to collect 141 questionnaires with complete answers. One team of two members was formulated and trained through many sessions to carry out this task. By sending a team in person fifty percent of the questionnaires were collected. The team tried its level best to ensure maximum response; team visits were followed up by repeated emails from the author's side. It was the outcome of repeated reminders that many responses were received over a period of two months. Visits were arranged to capture a realistic reflection from civil servants in one to one sittings. Email responses constitute 50 percent of the total responses.



## **Method followed**

A total of 141 responses (71 percent of the questionnaire sent) were collected. Among the respondents 36 (25 percent) were females and 105 (75 percent) were male civil servants. The range of age of respondent is 25 to 63 with the mean age of 43 years. Basic pay scale-wise feedback shows that maximum response came in from BPS-17 (22%) followed by BPS-18 (21%), BPS-19 (16%) and BPS-21 (15 %). The least response was recorded for BPS-22 (10%), which is the highest hierarchical level in the civil services in Pakistan, and it was very difficult to approach these officers. Overall, we were able to get a very representative number of responses from each grade of officers. Mean tenure for BPS-17 officers was 4 years, followed by 10 years for BPS-18, 18 years for BPS-19, 22 years for BPS-20, 31 years for BPS-21 and 34 years for BPS-22. The respondents were 75% male; were on average 43 years of age (SD =11.27); had worked, on average for 17.5 years with their current organization (SD = 11.41); and were in their current position for 3.46 years (SD = 2.1). As for their educational background, 17% had Bachelor level education, 55% had a Master's degree whereas 20% had an MPhil degree.

## **Survey Variables**

Total participants 141

Age

Gender

Highest Education Level

Current Designation

Time since joined the service

Time in current scale

Occupational group

Organisational identity graphic scale (1 item)

Organisation identity verbal scale (6 items)

Competitive psychological climate (4 items)

Public service Motivation (40 items)

PSM 1– Attraction to policy making (5 items)

PSM 2 - Commitment to Public interest (7 items)

PSM 3 – Social Justice (5 items)

PSM 4 – Civic Duty (7 items)

PSM 5 – Compassion (8 items)

PSM 6 – Self Sacrifice ( 8 items)

Performance pay ( 3 items)

Development experience ( 4 items)

Procedural justice (7 items)

Distributive justice (4 items)

Distinctiveness ( 4 items)

Turnover intension (4 items)

## **Scales Used**

- Social identification graphic scale ( Shamir et al. 2000)
- Organizational Identification verbal Scale (Mael and Alderks 1993)
- Competitive Psychological Climate (Brown et al., 1998)
- Public Service Motivation Items by Subscale (James L. Perry 1996)
- Performance-Pay (Deckop et al., 1999)
- Developmental experiences (Wayne et al, AMJ 1997)
- Justice scale Colquitt (2001)
- Turnover intention (Jaros 1997 cf. Meyer et al., 1993)

## **Survey items (76 items)**

Likert Scale (Response was provided on a five point scale ranging from agree to disagree).

OID verbal scale (6 items)

- When someone criticizes (Bureaucracy), it feels like a personal insult
- I am very interested in what others think about (Bureaucracy)
- When I talk about this Bureaucracy, I usually say “we” rather than “they.”
- This organization’s successes are my successes.
- When someone praises Bureaucracy, it feels like a personal compliment
- If a story in the media criticized Bureaucracy, I would feel embarrassed

Competitive Psychological Climate (4 items)

- My supervisor frequently compares my results with those of other officers

- The amount of recognition you get in bureaucracy depends on how your performance compares to that of other bureaucrats
- Everybody is concerned with finishing tasks that give them best recognition among seniors
- My co-workers frequently compare their results with mine

#### Attraction to Policy-Making (5 items)

- Politics is a dirty word.
- I respect public officials who can turn a good idea into law.
- Ethical behaviour of public officials is as important as competence
- The give and take of public policy making doesn't appeal to me.
- I don't care much for politicians.

#### Commitment to the Public Interest (7 items)

- People may talk about the public interest, but they are really concerned only about their self-interest.
- It is hard for me to get intensely interested in what is going on in my community.
- I unselfishly contribute to my community.
- Meaningful public service is very important to me
- I would prefer seeing public officials do what is best for the whole community even if it harmed my interests
- An official's obligation to the public should always come before loyalty to superiors.
- I consider public service my civic duty

### Social Justice (5 items)

- I believe that there are many public causes worth championing.
- I do not believe that government can do much to make society fairer.
- If any group does not share in the prosperity of our society, then we are all worse off.
- I am willing to use every ounce of my energy to make the world a more just place.
- I am not afraid to go to bat for the rights of others even if it means I will be ridiculed.

### Civic Duty (7 items)

- When public officials take an oath of office, I believe they accept obligations not expected of other citizens.
- I am willing to go great lengths to fulfil my obligations to my country.
- Public service is one of the highest forms of citizenship.
- I believe everyone has a moral commitment to civic affairs no matter how busy they are
- I have an obligation to look after those less well off.
- To me, the phrase "duty, honour, and country" stirs deeply felt emotions.
- It is my responsibility to help solve problems arising from inter-dependencies among people.

### Compassion (8 items)

- I am rarely moved by the plight of the underprivileged.
- Most social programs are too vital to do without
- It is difficult for me to contain my feelings when I see people in distress.

- To me, patriotism includes seeing to the welfare of others
- I seldom think about the welfare of people whom I don't know personally
- I am often reminded by daily events about how dependent we are on one another.
- I have little compassion for people in need who are unwilling to take the first step to help themselves.
- There are few public programs that I wholeheartedly support

#### Self-Sacrifice (8 items)

- Making a difference in society means more to me than personal achievements
- I believe in putting duty before self
- Doing well financially is definitely more important to me than doing good deeds
- Much of what I do is for a cause bigger than myself
- Serving citizens would give me a good feeling even if no one paid me for it
- I feel people should give back to society more than they get from it
- I am one of those rare people who would risk personal loss to help someone else
- I am prepared to make enormous sacrifices for the good of society

#### Five point Likert Scale (Not at all \_\_ to a large extent)

#### Performance-Pay (3 items)

- Increased productivity means higher pay for employees

- My individual performance actually has little impact on any incentive pay award
- My performance actually has little impact on my salary

Developmental experiences (4 items)

- In the positions that I have held with my company, I have often been given additional challenging assignments
- In the positions that I have held with my company, I have often been assigned projects that enabled me to develop and strengthen new skills
- Besides formal training and development opportunities, my manager has helped develop my skills by providing me with challenging job assignments
- Regardless of my organization's policy on training and development, to what extent have your managers made a substantial investment in you by providing formal training and development opportunities

Justice scale

The following items refer to the procedures used to arrive at your evaluation and salary. (Change "outcome" in "evaluation and salary").

Procedural justice (7 items)

- Have you been able to express your views and feelings during those procedures?
- Have you had influence over the (outcome) arrived at by those procedures?
- Have those procedures been applied consistently?
- Have those procedures been free of bias?
- Have those procedures been based on accurate information?

- Have you been able to appeal the (outcome) arrived at by those procedures?
- Have those procedures upheld ethical and moral standards

Distributive justice (4 items)

- Does your (outcome) reflect the effort you have put into your work?
- Does your (outcome) reflect the effort you have put into your work?
- Is your (outcome) appropriate for the work you have completed?
- Does your (outcome) reflect what you have contributed to the organization?
- Is your (outcome) justified, given your performance?

Three -point scale (none, some, and many).

Distinctiveness (4 items)

Indicate to what extent you have in your department each of the following

- Special slogans
- Special nicknames
- Special rituals
- Special jargon

Turnover intention (4 items)

- How often you think about quitting this organization
- How likely it was that you would search for a position with another employer
- How likely it was that you would leave the organization in the next ten years
- How often you regret for selectin



## **Measures**

Unless noted otherwise, all items were answered on 5-point Likert scales (1 = completely disagree to 5 = completely agree). We measured organizational identification with the social identification graphic scale based on the work of Shamir et al. (2000) and organizational identification verbal scale with the six items based on the work of Mael and Alderks (1993). Competitive Psychological Climate was measured with four items based on the work of Brown et al. (1998). Public Service Motivation was measured with 40 items based on James L. Perry (1996), while Performance-Pay was measured with three items based on the work of Deckop et al. (1999). Developmental experience was measured with four items based on the work of (Wayne et al, AMJ 1997). We measured Justice Scale with 11 items based on the work of the Colquitt (2001) while turnover intention was measured with the four items based on the work of Jaros (1997) and Meyer et al. (1993).

## **Correlations**

Cronbach's alpha coefficients, means, and standard deviations for all measures are presented in table 2A.

## **Hypotheses Testing**

We tested the relationship between Hierarchical level and all other items with ordinary least squares (OLS) regression. For details see tables 2B and 2C.

SCALE	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
1. Organisation identity	(.818)															
2. Competative psychological environment		-.277** (.844)														
3. Attraction to policy making		.322** (.203)														
4. - Commitment to Public interest		.485** (.605)														
5. Social Justice		.408** (.526)														
6. Civic Duty		.489** (.778)														
7. Compassion		.097	.244** (.157)													
8. Self Sacrifice		.493**	.233** (.142)	.573** (.766)												
9. Performance pay		-.451**	-.290** (.590)	-.285**	-.371**	-.078	-.165	-.165	-.185**	-.067	-.512** (.919)					
10. Development experience		.333**	.049	.303** (.499)	.345**	.359**	.158	.318**	-.185**	.401**	.472**	.512** (.919)				
11. Procedural justice		.458**	.162	.430**	.438**	.401**	-.021	.472**	-.067	.356**	-.051	.392**	-.039	.407**	.871** (.960)	
12. Distributive justice		.378**	.212*	.142	.419**	.323**	.356**	-.051	.392**	.356**	-.051	.392**	-.039	.407**	.871** (.960)	
13. Distinctiveness		.231**	-.079	.047	.039	.015	.035	.105	.036	.036	-.026	.146	.150	.187*	.108	.696
14. Turnover intension		-.341**	.053	-.235**	-.36**	-.215*	-.35**	-.065	-.38**	.203*	-.152	-.216*	-.199**	-.199**	.108	.772
15. Gender		-.071	.111	.017	.049	-.004	-.028	-.709	-.109	-.075	-.122	.022	.082	-.044	-.012	-.044
16. Hierarchy level		.362**	-.19*	.141	.322**	.299**	.289**	.046	.301**	-.201*	.260**	.398**	.369**	.063	-.263**	.110
17. Tenure		.309**	-.804	.121	.328**	.308**	.300**	-.022	.267**	-.197*	.222**	.370**	.370**	-.291**	-.051	.181* .915**

Notes: N = 141. Alpha coefficients are displayed on the diagonal. Values represent proportions of the value 0 on these variables. \* p < .05, \*\* p < .01, \*\*\* p < .001

Table: 2A



	Mean	SD	Number of observations	Scale used
1.Organisation identity	3.5095	.81128	140	1-5
2.Competative psychological environment	3.1321	.96216	140	1-5
3. Attraction to policy making	3.4657	.50475	137	1-5
4. - Commitment to Public interest	3.6187	.46191	139	1-5
5. Social Justice	3.7333	.56689	138	1-5
6.Civic Duty	3.9837	.51210	140	1-5
7. Compassion	3.4158	.38569	138	1-5
8.Self Sacrifice	3.8291	.53355	139	1-5
9. Performance pay	2.6407	.85734	141	1-5
10. Development experience	3.4184	1.46522	141	1-5
11. Procedural justice	2.6899	1.09182	135	1-5
12. Distributive justice	3.0255	1.25524	137	1-5
13. Distinctiveness	1.6773	.48600	141	1-3
14. Turnover intension	1.6206	.52321	141	1-3
15.Gender	1.744	.437	141	Male Female
16.Hirarcical level	3.1206	1.67	141	1-6
17.Tenure	17.5	11.41	141	# of years

Table: 2B

	Survey response	Level of significance
1- Organization identity	Strongly significant	<i>p.000</i>
2-Competitive psychological environment	Significant	<i>p.041</i>
3- Attraction to policy making	Not significant	<i>p.103</i>
4- Commitment to Public interest	Strongly significant	<i>p.000</i>
5- Social Justice	Strongly significant	<i>p.001</i>
6- Civic Duty	Strongly significant	<i>p.001</i>
7- Compassion	Not significant	<i>p.498</i>
8- Self Sacrifice	Strongly significant	<i>p.000</i>
9- Performance pay	Significant	<i>p.011</i>
10-Development experience	Significant	<i>p.002</i>
11-Procedural justice	Strongly significant	<i>p.000</i>
12- Distributive justice	Strongly significant	<i>p.000</i>
13- Distinctiveness	Not significant	<i>p.223</i>
14- Turnover intension	Significant	<i>p.002</i>

Table: 2C

# Appendix: Chapter 3

## Mathematical Derivations

### Optimization Problem of a Citizen-voter with Policy Delegation

$$\max_B U(k, B) = Y - B + (kB)^{1/2} + ((1 - k)B)^{1/2} \quad (\text{A1})$$

Let  $B(k)$  be the optimal level of budget given budgetary allocation policy  $k$ . Then

$B(k)$  solves the following first order condition:

$$U_B = -1 + \left(\frac{1}{2}\right) \cdot (kB)^{-\frac{1}{2}} \cdot k + \left(\frac{1}{2}\right) \cdot ((1 - k)B)^{-\frac{1}{2}} \cdot (1 - k) = 0 \quad (\text{A2})$$

Straightforward algebraic manipulation yields:

$$B(k) = \frac{1}{4} + \frac{1}{2} \cdot (k - k^2)^{1/2} \quad (\text{A3})$$

### Optimization Problem of the Bureaucrat

The bureaucrat maximizes the following utility function:

$$\max_k V(k) = \alpha(B(k)) - \gamma(k - k_0)^2 \quad (\text{A4})$$

The first order condition is given by:

$$V_k = \alpha \cdot B_k(k) - 2\gamma(k - k_0) = 0 \quad (\text{A5})$$

Notice that in the absence of inertia ( $\gamma = 0$ ), the first order condition reduces to  $B_k = 0$  which implies from (A3) that:

$$B_k = \frac{1}{4} \cdot (k - k^2)^{-1/2} \cdot (1 - 2k) = 0 \quad (\text{A6})$$

Solving (A6) (assuming interior solution) yields the optimal value of  $k^* = 1/2$  at which the bureaucrat's utility is maximized without inertia. In other words, the bureaucrat's budget is also maximized at  $k^* = 1/2$  in the absence of inertia.

If inertia is present ( $\gamma > 0$ ), then the first order condition (A5) implies that  $B_k(k) > (<)0$  if  $k - k_0 > (<)0$ . If  $k_0 > k^*$  then  $B_k(k) < 0$ , and the optimal budgetary mix with inertia ( $\hat{k}$ ) is greater than the optimal budgetary mix policy without inertia ( $k^*$ ) (see Figure 1). If  $k_0 < k^*$  then  $B_k(k) > 0$  and the optimal budgetary mix policy in the presence of inertia ( $\hat{k}$ ) is less than the optimal budgetary mix policy without inertia ( $k^*$ ).

### **Socially Optimal Budget and Allocation Policy**

The optimal size of budget and budgetary allocation policy ( $B^*, k^*$ ) simultaneously maximizes the utility of the citizen-voter. That is, ( $B^*, k^*$ ) solves (A2) and the following first order condition:

$$U_k = \frac{1}{2}(kB)^{-\frac{1}{2}} - \frac{1}{2}((1-k)B)^{-\frac{1}{2}} = 0 \quad (A7)$$

Solving (A2) and (A7) gives the socially optimal  $(B^*, k^*) = (0.5, 0.5)$ .

# Appendix: Chapter 4 (A)

## Mathematical derivations

### Optimization problem of the subordinate

$$\text{Max}_Q U_2(Q) = \mu_2 \cdot Q + (B - \phi \cdot Q)^\sigma \quad (\text{A1})$$

Let  $\hat{Q}(B)$  be the optimal level of the composite public good given a fixed level of budget. Then  $\hat{Q}(B)$  solves the following first order condition:

$$\partial U_2 / \partial Q = \mu_2 - \sigma \phi (B - \phi Q)^{\sigma-1} = 0 \quad (\text{A2})$$

Straightforward algebraic manipulation yields:

$$\hat{Q}(B) = B \cdot (1/\phi) - \theta \cdot (1/\phi)^\eta \quad (\text{A3})$$

Where  $\theta = (\mu_2/\sigma)^{1/\sigma-1}$ ,  $\eta = \sigma/\sigma - 1$  ( $\eta < 0$ ) and  $\phi$  is the marginal cost of production. It can be easily seen from (A3) that the partial derivative of  $\hat{Q}(B)$  with respect to  $B$  is:

$$\hat{Q}_B = 1/\phi \quad (\text{A4})$$

Since the marginal costs are random, the expected value of  $\hat{Q}(B)$  can be written as:

$$E\hat{Q}(B) = B \cdot E(1/\phi) - \theta \cdot E(1/\phi)^\eta \quad (\text{A5})$$

It is assumed that  $\phi$  is uniformly distributed over the interval  $[a, b] \in \mathbb{R}_{++}$ . So the expected values can be computed as:

$$E(1/\phi) = 1/(b-a) \int_a^b (1/\phi) d\phi = [1/(b-a)][\ln b - \ln a] \quad (\text{A6})$$

Similarly:



$$E(1/\phi)^\eta = 1/(b-a) \int_a^b (1/\phi)^\eta d\phi = [1/(b-a) \cdot (1-\eta)][b^{1-\eta} - a^{1-\eta}] \quad (A7)$$

### Optimization problem of the boss

Given  $\hat{Q}(B)$  the boss maximizes the following expected payoff function:

$$\text{Max}_k EU_1(k; Q, k_1) = E \left\{ \alpha_{1a} \cdot (k \cdot \hat{Q}(B)) + \alpha_{1b} \cdot ((1-k) \cdot \hat{Q}(B)) - \lambda \cdot (k - k_1)^2 \right\} \quad (A8)$$

Taking expectations, the above problem can be written as:

$$\text{Max}_k EU_1(k; Q, k_1) = \alpha_{1a} \cdot (k \cdot E\hat{Q}(B)) + \alpha_{1b} \cdot ((1-k) \cdot E\hat{Q}(B)) - \lambda \cdot (k - k_1)^2 \quad (A9)$$

Let  $\hat{k}(B)$  the optimal budgetary allocation policy. Then it solves the following first order condition:

$$\partial EU_1 / \partial k = \alpha_{1a} \cdot E\hat{Q}(B) - \alpha_{1b} \cdot E\hat{Q}(B) - 2\lambda \cdot (k - k_1) = 0 \quad (A10)$$

The above equation can be solved as:

$$\hat{k}(B) = [(\alpha_{1a} - \alpha_{1b}) / 2\lambda] \cdot E\hat{Q}(B) + k_1 \quad (A11)$$

Substituting for  $E\hat{Q}(B)$  from (A5), equation (A11) can be solved as:

$$\hat{k}(B) = [(\alpha_{1a} - \alpha_{1b}) / 2\lambda] \cdot [E(1/\phi) \cdot B - \theta \cdot E(1/\phi)^\eta] + k_1 \quad (A12)$$

From (A12), the partial derivative of  $\hat{k}(B)$  with respect to  $B$  can be computed as:

$$\hat{k}_B = [(\alpha_{1a} - \alpha_{1b}) / 2\lambda] \cdot E(1/\phi) \quad (A13)$$

### Optimization problem of the principal

Given the solutions for the composite public good and the budgetary allocation policy in the bureaucratic sub-game, the optimization problem of the principal can be set up as follows:

$$\text{Max}_B EU_p(B; k, Q) = E \left\{ v \cdot (\hat{k}(B) \cdot \hat{Q}(B)) + \gamma \cdot ((1 - \hat{k}(B)) \cdot \hat{Q}(B)) - \omega \cdot B \right\} \quad (\text{A14})$$

The optimal level of budget  $B^*$  solves the following first order condition:

$$\frac{\partial EU_p}{\partial B} = E \left\{ v \cdot [\hat{k}(B) \cdot \hat{Q}_B + \hat{Q}(B) \cdot \hat{k}_B] + \gamma \cdot [(1 - \hat{k}(B)) \cdot \hat{Q}_B - \hat{Q}(B) \cdot \hat{k}_B] - \omega \right\} = 0 \quad (\text{A15})$$

### Proposition 3

Using equations A4, A5, A12, and A13, equation (A15) can be solved for equilibrium  $B^*$  as follows:

$$B^* = \lambda [(\omega - \gamma \cdot E(1/\phi) - (v - \gamma) \cdot k_1) / [(\alpha_{1a} - \alpha_{1b}) \cdot (v - \gamma) \cdot (E(1/\phi))^2] + \theta \cdot E(1/\phi)^\eta / (E(1/\phi))^2] \quad (\text{A16})$$

Substitution of (A16) in (A3) yields:

$$Q^* = (1/\phi) \lambda \{ [(\omega - \gamma \cdot E(1/\phi) - (v - \gamma) \cdot k_1) / [(\alpha_{1a} - \alpha_{1b}) \cdot (v - \gamma) \cdot (E(1/\phi))^2] + [\theta \cdot E(1/\phi)^\eta / (E(1/\phi))^2] \} - \theta \cdot (1/\phi)^\eta \quad (\text{A17})$$

Similarly, substituting (A16) in (A12) yields:

$$k^* = [\omega - \gamma \cdot E(1/\phi)] / [2(v - \gamma) \cdot E(1/\phi)] + [(\alpha_{1a} - \alpha_{1b}) \theta \cdot E(1/\phi)^\eta / 2\lambda] [(1 - E(1/\phi)) / E(1/\phi)] + k_1 \cdot [(2 \cdot E(1/\phi) - 1) / 2 \cdot E(1/\phi)] \quad (\text{A18})$$

### Existence of equilibrium

We assume that the players' pay-off functions are twice continuously differentiable. To verify the existence of an equilibrium, the second order conditions of each player can be checked as follows. Differentiating (A2) with respect to  $Q$ :

$$\partial^2 U_2 / \partial Q^2 = \phi \cdot \sigma \cdot (\sigma - 1) \cdot (B - \phi \cdot Q)^{\sigma-2} < 0, \text{ since } 0 < \sigma < 1 \quad (\text{A19})$$

Similarly, differentiating (A10) with respect to  $k$ :

$$\partial^2 EU_1 / \partial k^2 = -2\lambda < 0, \text{ since } \lambda > 0. \quad (\text{A20})$$

Finally, differentiating (A15) with respect to  $B$  yields:

$$\partial^2 EU_P / \partial B^2 = (\alpha_{1a} - \alpha_{1b}) \cdot (v - \gamma) \cdot (E(1/\emptyset))^2 / \lambda \quad (\text{A21})$$

The above expression will be negative if:

$$(\alpha_{1a} - \alpha_{1b}) \cdot (v - \gamma) < 0 \quad (\text{A22})$$

We assume that this condition is satisfied, and hence a perfect Bayesian Nash Equilibrium exists. To see its implications, notice that the first term in the above expression measures the difference between the marginal utilities of the two public goods to the boss, while the second term measures the marginal utilities of the two public goods for the principal. In essence, the negativity of the above expression implies that there is a difference between the preferences of the boss and the legislator with regard to the two types of public goods.

### Proposition 4

This follows from using the derivative of (A16) with respect to  $k_1$ :

$$\partial B^*/\partial k_1 = -\lambda(v - \gamma)/(v - \gamma) \cdot (\alpha_{1a} - \alpha_{1b}) \cdot (E(1/\phi))^2 \quad (\text{A23})$$

The denominator is negative by assumption. Thus the above expression is  $> (<) 0$  as  $v > (<) \gamma$  implying an increase (decrease) in the budget as long as  $v > (<) \gamma$ .

**Corollary**

This result follows from (A17) with respect to  $k_1$ :

$$\partial Q^*/\partial k_1 = -\lambda(v - \gamma)/(v - \gamma) \cdot (\alpha_{1a} - \alpha_{1b}) \cdot (1/\phi) \cdot (E(1/\phi))^2 \quad (\text{A24})$$

As the denominator is negative, the above expression is  $> (<) 0$  as  $v > (<) \gamma$  implying an increase (decrease) in the composite public output as long as  $v > (<) \gamma$ .

**Proposition 5**

It is straightforward to see from equations (A16) and (A17) that  $\partial Q^*/\partial \omega < 0$  and  $\partial B^*/\partial \omega < 0$  holds. Differentiating (A18) with respect to  $\omega$  yields:

$$\partial k^*/\partial \omega = 1/2 \cdot (v - \gamma) \cdot E(1/\phi) \quad (\text{A25})$$

Since the sign of  $\partial k^*/\partial \omega$  depends on the sign of  $(v - \gamma)$ . If  $v > (<) \gamma$  it yields  $\partial k^*/\partial \omega > (<) 0$ .

## *Appendix: Chapter 4 (B)*

### **Modeling the subordinate's policy preferences and identity**

We set up a game-theoretic model in which the subordinate also has policy preferences which are embedded in his identity. We show that even if the subordinate has his own identity stance, this will have no impact on the equilibrium values as long as the boss controls the allocation policy. For analytical tractability we draw our attention to a 2-person simultaneous move game in which the budget of the bureaucracy is treated as exogenously given.

The boss is assumed to derive utility from the two public goods on offer and has an insider identity. He pursues the organizational goal  $k_1$ . The utility function of the boss can be written as:

$$U_1(k; Q, k_1) = \alpha_{1a} \cdot (k \cdot Q) + \alpha_{1b} \cdot ((1 - k) \cdot Q) - \lambda \cdot (k - k_1)^2 \quad (\text{B1})$$

The subordinate's utility function also depends on the two public goods. His identity is captured by the identity parameter  $\rho$  and his organizational goal  $k_2$ . The subordinate as the implementer of the policy derives utility from budgetary slack<sup>25</sup>. The utility function of the subordinate can be specified as:

$$U_2(Q; k, B, k_2) = \mu_{2a} \cdot (k \cdot Q) + \mu_{2b} \cdot ((1 - k) \cdot Q) - \rho \cdot (k - k_2)^2 \\ + a \cdot (B - \phi \cdot Q) - b \cdot (B - \phi \cdot Q)^2 \quad (\text{B2})$$

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<sup>25</sup> For simplicity utility from budgetary slack is assumed to be quadratic.

The two players play a simultaneous move game in which the boss chooses the budgetary allocation policy  $k$  while the subordinate chooses the size of the composite public good  $Q$ . Both players have their own identities  $k_1$  and  $k_2$ .

### Nash Equilibrium

A Nash equilibrium of the game can be defined as a pair  $(k^*, Q^*)$  such that:

$$k^* = \operatorname{argmax}_k U_1(k; Q^*, k_1) = \alpha_{1a} \cdot (k \cdot Q^*) + \alpha_{1b} \cdot ((1 - k) \cdot Q^*) - \lambda \cdot (k - k_1)^2 \quad (\text{B3})$$

$$Q^* = \operatorname{argmax}_Q U_2(Q; k^*, B, k_2) = \mu_{2a} \cdot (k^* \cdot Q) + \mu_{2b} \cdot ((1 - k^*) \cdot Q) - \rho \cdot (k^* - k_2)^2 + a \cdot (B - \phi \cdot Q) - b \cdot (B - \phi \cdot Q)^2 \quad (\text{B4})$$

To derive the Nash equilibrium the following optimization problems need to be solved:

### Optimization problem of the boss

The boss chooses the budgetary allocation policy that maximizes his utility.

$$\operatorname{Max}_k U_1(k; Q, k_1) = \alpha_{1a} \cdot (k \cdot Q) + \alpha_{1b} \cdot ((1 - k) \cdot Q) - \lambda \cdot (k - k_1)^2 \quad (\text{B5})$$

The optimal budgetary allocation policy solves the following first order condition:

$$\partial U_1 / \partial k = (\alpha_{1a} - \alpha_{1b}) \cdot Q - 2\lambda \cdot (k - k_1) = 0 \quad (\text{B6})$$

The above equation can be solved as:

$$k = [(\alpha_{1a} - \alpha_{1b}) / 2\lambda] \cdot Q + k_1 \quad (\text{B7})$$

Equation (B7) shows that the best response of the boss depends on the level of the composite public good as well as his organizational goal. Any change of the

organizational goal will be translated to an equivalent change in the budgetary allocation policy. The best response of the boss to changes in the level of the composite output depends on the relative marginal utilities of the boss from the two public goods. An increase in the level of composite output will prompt the boss to increase the budgetary allocation towards  $Q_a$  or ( $Q_b$ ) if the boss' marginal utility from  $Q_a$  is greater (less) than that of  $Q_b$ .

### Optimization problem of the subordinate

The subordinate chooses the level of composite public good that maximizes his utility:

$$\begin{aligned} \text{Max}_Q U_2(Q; k, B, k_2) = & \mu_{2a} \cdot (k \cdot Q) + \mu_{2b} \cdot ((1 - k) \cdot Q) - \rho \cdot (k - k_2)^2 \\ & + a \cdot (B - \phi \cdot Q) - b \cdot (B - \phi \cdot Q)^2 \end{aligned} \quad (\text{B8})$$

The optimal level of the composite output solves the following first order condition:

$$\partial U_2 / \partial Q = \mu_{2a} \cdot k + \mu_{2b} \cdot (1 - k) - a\phi + 2b\phi \cdot (B - \phi Q) = 0 \quad (\text{B9})$$

Straightforward algebraic manipulation yields:

$$Q = (\mu_{2b} - a\phi) / 2b\phi^2 + [(\mu_{2a} - \mu_{2b}) / 2b\phi^2] \cdot k + (1/\phi) \cdot B \quad (\text{B10})$$

Equation (B10) reveals that the best response of the subordinate depends on the budgetary allocation policy and the level of budget. Thereby the identity of the subordinate plays no role for determining the optimal choice of the composite output. This is because the subordinate takes the budgetary allocation policy as given while maximizing his utility. Therefore, the optimal response of the subordinate is determined independently of his organizational goal. Second, an increase in the budgetary allocation policy towards  $Q_a$  will induce an increase in the level of composite output

as long as the marginal utility of the subordinate from  $Q_a$  exceeds that from  $Q_b$ . Otherwise, an increase of the budgetary allocation policy towards  $Q_a$  will lead to a lower level of composite public output. An increase of the level of budget will lead to an increase of the level of the composite public output along the optimal path of the subordinate.

The equilibrium values of the budgetary allocation policy and the composite public output can be derived from solving equations (B7) and (B10) for  $k^*$  and  $Q^*$ . While these detailed derivations can be solved, some observations can be made already without having the explicit solutions. For example, the equilibrium values will depend on the level of the budget of the bureaucracy and the organizational goal of the boss. How the equilibrium values will respond to changes of the variables depends on the relative magnitudes of the marginal utilities of the boss and the subordinate for the two types of public goods.



# *References*

- Aberbach, Joel D., and Bert A. Rockman. 2000. *In the Web of Politics: Three Decades of the U.S. Federal Executive*. Washington DC: Brookings Institution.
- Aberbach, Joel D., Robert D. Putnam, and Bert A. Rockman. 1981. *Bureaucrats and Politicians in Western Democracies*. Cambridge, MA: Harvard University Press.
- Acemoglu, Daron , Simon Johnson and James Robinson. 2001a. The Colonial Origins of Comparative Development: An Empirical Investigation. *The American Economic Review* 91 (5): 1369–401.
- Acemoglu, Daron , Simon Johnson and James Robinson. 2001b. *Institutions and Economic Development*. Mimeographed.
- Acemoglu, Daron and James Robinson. 2012. *Why Nations Fail: The Origins of Power, Prosperity, and Poverty*. New York: Crown Business.
- Acemoglu, Daron. 2012. *Institutions, Political Economy and Growth*. Available at <http://www-2.iies.su.se/Nobel2012/Presentations/Acemoglu.pdf>. Accessed on September 5, 2014.
- Aghion, Philippe and Jean Tirole. 1997. Formal and Real Authority in Organizations. *The Journal of Political Economy* 105 (1): 1-29.
- Ahmad, Muneer. 1964. *The Civil Servant in Pakistan*. Pakistan Publishing: Karachi.
- Aidt, Toke S. 2003. Economic Analysis of Corruption: A Survey. *The Economic Journal* 113 (491): 632-652.

- Akerlof, George A. 2007. The Missing Motivation in Macroeconomics. Presidential Address. *American Economic Association*, Chicago, IL.
- Akerlof, George A. and Rachel E. Kranton. 2000. Economics and Identity. *Quarterly Journal of Economics* 115 (3): 715-753.
- Akerlof, George A. and Rachel E. Kranton. 2005. Identity and the Economics of Organizations. *Journal of Economic Perspectives* 19 (1): 9-32.
- Akerlof, George A. and Rachel E. Kranton. 2010. Identity Economics. Princeton: Princeton University Press.
- Akerlof, Robert J. 2009. A Theory of Social Motivation. Chapter 1 in “Essays in Organizational Economics”. PhD Thesis, Harvard University, Cambridge, MA.
- Alavi, Haque. 1973. The State in Post-Colonial Societies: Pakistan and Bangladesh. In K. Gough and H. Sharma (Eds.), *Imperialism and Revolution in South Asia*: 145-160. New York: Monthly Review Press.
- Alchian , Armen A. and Harold Demsetz. 1972. Production, Information Costs, and Economic Organization. *The American Economic Review* 62(5) : 777-795.
- Ali, Imran and Adeel Malik. 2009. The Political Economy of Industrial Development in Pakistan: A Long-Term Perspective. *Lahore Journal of Economics* 14 (September): 29-50.
- Anderson, James H. and Cheryl W. Gray. 2007. Policies and Corruption Outcomes. In *Anti-corruption in Transition 3. Who is Succeeding and Why*: 43-72. Washington DC: The World Bank.

- Angeles, Luis and Kyriakos C. Neanidis. 2011. Colonialism, Elite Formation and Corruption. *Working Paper* University of Glasgow.
- Arnold, David. 1983. White Colonization and Labor in Nineteenth Century India. *Journal of Imperial and Commonwealth History* 11 (2): 133-158
- Arrow, Kenneth J. 1994. Methodological Individualism and Social Knowledge. *American Economic Review* 84 (2): 1-9.
- Arthur, Brian W. 1989. Competing Technologies, Increasing Returns and Lock-In by Historical Events. *Economic Journal* 99 (394): 116-131.
- Asthana, Anand. 2012. De-centralization and Corruption Revisited: Evidence from a Natural Experiment. *Public Administration and Development* 32 (1): 27-37.
- Baltaci, Mustafa and Serdar Yilmaz. 2006. Keeping an Eye on Sub-national Governments: Internal Control and Audit at Local Level. Washington DC: The World Bank.
- Banerjee, Abhijit and Lakshmi Iyer , 2005. History, Institutions, and Economic Performance: The Legacy of Colonial Land Tenure Systems in India. *The American Economic Review* 95 (4): 1190-1213.
- Bardhan, Pranab. 1997. Corruption and Development: A Review of Issues. *Journal of Economic Literature* 35 (3): 1320-1346.
- Barnard, Chester I. 1938. The Functions of the Executive. Harvard University Press: Cambridge, MA.
- Baron, James N., Michael T. Hannan, and M. Diane Burton. 1999. Building the Iron Cage: Determinants of Managerial Intensity in the Early Years of Organizations. *American Sociological Review* 64 (4): 527-47.

- Bassanini, Arnold P. and Giovanni Dosi. 2001. When and How Chance and Human Will can Twist the Arms of Clio: An Essay on Path Dependence in a World of Irreversibilities. In R. Garud and P. Karnoe (Eds.), *Path Dependence and Creation*: 43-68. Mahwah, NJ: Lawrence Erlbaum.
- Bawn, Kathleen. 1995. Political Control vs. Expertise: Congressional Choices About Administrative Procedures. *American Political Science Review* 89: 62-73.
- Bayly, Christopher Alan. 1988. *Indian Society and the Making of the British Empire*. Cambridge University Press: New York.
- Becker, Gary and George Stigler. 1974. Law Enforcement, Malfeasance, and Compensation of Enforcers. *The Journal of Legal Studies* 3 (1): 1-18.
- Benabou, Roland and Jean Tirole. 2003. Intrinsic and Extrinsic Motivation. *Review of Economic Studies* 70 (3): 489-520.
- Benabou, Roland and Jean Tirole. 2006. Incentives and Pro-social Behavior. *American Economic Review* 96 (5): 1652-1678.
- Bendor, Jonathan and Adam Meirowitz. 2004. Spatial Models of Delegation. *The American Political Science Review* 98 (2): 1-19.
- Bendor, Jonathan B. 1988. Review Article: Formal Models of Bureaucracy. *British Journal of Political Science* 18 (3): 353-395.
- Bendor, Jonathan B., Ami Glazer, and Thomas Hammond. 2001. Theories of Delegation. *Annual Review of Political Science* 4: 235-269.
- Bendor, Jonathan B., and Adam Meirowitz. 2004. Spatial Models of Delegation. *The American Political Science Review* 98: 293-310.

Bendor, Jonathan B., and Terry M. Moe. 1985. An Adaptive Model of Bureaucratic Politics. *American Political Science Review* 79 (3): 755-774.

Bendor, Jonathan B., and Terry M. Moe. 1986. Agenda Control, Committee Capture, and the Dynamics of Institutional Politics. *American Political Science Review* 80 (4): 1187-1207.

Bendor, Jonathan B., Serge Taylor, and Ronald Van Gaalen. 1985. Bureaucratic Expertise vs. Legislative Authority: A Model of Deception and Monitoring in Budgeting. *American Political Science Review* 79 (4): 1041-1060.

Benjamin, Daniel J., James J. Choi and A. Joshua Strickland. 2010. Social Identity and Preferences. *American Economic Review* 100 (4): 1913-1928.

Berger, Peter L., and Thomas Luckmann. 1967. *The Social Construction of Reality*. New York: Doubleday.

Berry, William D. 1979. Utility Regulation in the States: The Policy Effects of Professionalism and Salience to the Consumer. *American Journal of Political Science* 23 (2): 263-77.

Berry, William D. 1984. An alternative to the Capture Theory of Regulation: The Case of State Public Utility Commissions. *American Journal of Political Science* 28 (3): 524-558.

Bertelli, Anthony and Sven E. Feldmann. 2006. Strategic Appointments. *Journal of Public Administration Research and Theory* 17 (1): 19-38.

Bertelli, Anthony, and Sven Feldman. 2007. Strategic Appointments. *Journal of Public Administration Research and Theory* 17: 19-38.

- Boeker, Warren. 1989a. Strategic Change: the Effects of Founding and History. *Academy of Management Journal* 32 (3): 489-515.
- Boeker, Warren. 1989b. The Development and Institutionalization of Subunit Power in Organizations. *Administrative Science Quarterly* 34 (3): 388-410.
- Boyd, Robert, Herbert Gintis, Samuel Bowles and Peter Richerson. 2003. The Evolution of Altruistic Punishment. *Proceedings of the National Academy of the United States America*, 100: 3531-3535.
- Braibanti, Ralph. 1963. Public Bureaucracy and Judiciary in Pakistan. In J. La Palombara (Eds.), *Bureaucracy and Political Development*: 360-440. Princeton: Princeton University Press.
- Brehm, John and Scott Gates. 1997. *Working, Shirking, and Sabotage*. Ann Arbor: University of Michigan Press.
- Breton, Albert and Ronald Wintrobe. 1975. The Equilibrium Size of a Budget Maximizing Bureau: A Note on Niskanen's Theory of Bureaucracy. *American Journal of Political Science* 83 (1): 195-207.
- Brinkerhoff, Derick W. 2000. Assessing Political Will for Anti-Corruption Efforts: An Analytical Framework. *Public Administration and Development* 20 (3): 239-252.
- Brint, Steven and Jerome Karabel. 1991. Institutional Origins and Transformations: The Case of American Community Colleges. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 337-360. Chicago: The University of Chicago.
- Buchanan, James M. 1949. The Pure Theory of Government Finance: A Suggested Approach. *Journal of Political Economy* 57: 496-506

Buelens, Marc and Herman Van den Broeck. 2007. An Analysis of Differences in Work Motivation between Public and Private Sector Organizations. *Public Administration Review* 67 (1): 65-74.

Bueno de Mesquita, Ethan and Matthew C. Stephenson. 2007. Regulatory Quality under Imperfect Oversight. *American Political Science Review* 101 (3): 605-620.

Burki, Shahid Javed. 1969. Twenty Years of the Civil Service in Pakistan: A Re-evaluation. *Asian Survey* 9: 239-254.

Burton, M. Diane and Christine M. Beckman. 2007. Leaving a Legacy: Position Imprints and Successor Turnover in Young Firms. *American Sociological Review* 72(2): 239-266

Burton, M. Diane and Christine M. Beckman. 2007. Leaving a Legacy: Position Imprints and Successor Turnover in Young Firms. *American Sociological Review* 72 (2): 239-266.

Calvert, Randall, Mathew D. McCubbins, and Barry R. Weingast. 1989. A Theory of Political Control and Agency Discretion. *American Journal of Political Science* 33 (3): 588-611.

Carpenter, Daniel P. and George A. Krause. 2012. Reputation and Public Administration. *Public Administration Review* 72 (1): 26-32.

Carpenter, Daniel P. and George A. Krause. 2015. Transactional Authority and Bureaucratic Politics. *Journal of Public Administration Research and Theory* 25 (1): 5-25.

- Carpenter, Daniel P., 2001. *The Forging of Bureaucratic Autonomy: Reputations, Networks, and Policy Innovation in Executive Agencies*. Princeton, NJ: Princeton University Press.
- Carpenter, Vivian L. and Ehsan H. 2001 Institutional Theory and Accounting Rule Choice: An Analysis of Four US State Government's Decisions to Adopt Generally Accepted Accounting Principles. *Accounting, Organization and Society* 26: 565-596.
- Carroll, Glenn R. and Michael T. Hannan. 2004. *The Demography of Corporations and Industries*. Princeton: Princeton University Press.
- Charness, Gary, Luca Rigotti and Aldo Rustichini. 2007. Individual Behavior and Group Membership. *American Economic Review* 97 (4): 1340-1352.
- Cheema, Ali and Asad Sayeed. 2006. Bureaucracy and Pro-Poor Change. *Working paper* Pakistan Institute of Development Economics, Islamabad, Pakistan.
- Chen, Yan and Sherry Xin Li, 2009. Group Identity and Social Preferences. *American Economic Review* 99 (1): 431-457.
- Clawson, James G. 1999. *Level Three Leadership: Getting Below the Surface*. Upper Saddle River, NJ: Prentice Hall.
- Clinton, Joshua D., Anthony Bertelli, Christian R. Grose, David E. Lewis, and David C. Nixon. 2012. Separated Powers in the United States: The Ideology of Agencies, Presidents, and Congress. *American Journal of Political Science*. 56 (2): 341-354.
- Coglianesi, Cary. 2002. Empirical Analysis and Administrative Law. *University of Illinois Law Review* 4: 1111-37.



- Cohen, Nissim. 2012. Policy entrepreneurs and the design of public policy: Conceptual framework and the case of the National Health Insurance Law in Israel. *Journal of Social Research and Policy* 3 (1): 5–26.
- Colquitt, Jason A. 2001. On the dimensionality of organizational justice: A construct validation of a measure. *Journal of Applied Psychology* 86 (3): 386-400.
- Conybeare, John A. 1984. Bureaucracy, Monopoly and Competition: A Critical Analysis of Budget Maximizing Model of Bureaucracy. *American Journal of Political Science* 28 (3): 479-502.
- Crémer, Jacques. 1993. Corporate Culture and Shared Knowledge. *Industry Corporate Change* 2 (1): 351–386.
- Crozier, Michel . 1964. Bureaucratic Phenomenon. University of Chicago Press.
- Dalton, Dan R., William D. Todor, Michael J. Spendolini, Gordon J. Fielding and Lyman W. Porter. 1980. Organization Structure and Performance. *The Academy of Management Review* 5 (1): 49-64.
- David, Paul A. 1985. Clio and the Economics of QWERTY. *American Economic Review Proceedings* 75 (2): 332-337.
- David, Paul. 1994. Why Are Institutions Carriers of History? Path Dependence and the Evolution of Conventions, Organizations, and Institutions. *Structural Change and Economic Dynamics* 5 (2): 205-220.
- Davis, John B. 2003. The Theory of Individual in Economics: Identity and Values. London: Routledge.
- Davis, John B. 2006. Social Identity Strategies in Recent Economics. *Journal of*

*Economic Methodology* 13 (3): 371-390.

Davis, John B. 2007. Akerlof and Kranton on Identity in Economics: Inverting the Analysis. *Cambridge Journal of Economics* 31 (3): 349-362.

Davis, John B. 2011. *Individuals and Identity Economics*. Cambridge: Cambridge University Press.

Deckop, John R., Robert Mangel and Carol C. Cirka. 1999. Getting More Than you Pay for: Organizational Citizenship Behaviour and Pay-for-Performance Plans. *Academy of Management Journal* 42 (4): 420-428.

Denzau, Arthur T. and Robert J. Mackay. 1976. Benefit Shares and Majority Voting. *American Economic Review* 66 (1): 69-76.

Denzau, Arthur T. and Robert J. Mackay. 1980. A Model of Benefit and Tax Share Discrimination by a Monopoly Bureau. *Journal of Public Economics* 13 (3): 341-368.

Derthick, Martha. 1979. *Policymaking for Social Security*. Washington, DC: Brookings Institution Press.

Derthick, Martha. 1990. *Agency under Stress: The Social Security Administration in American Government*. Brookings Institution Press.

Dewatripont, Mathias, Ian Jewitt and Jean Tirole. 1999. The Economics of Career Concerns, Part 11: Application to Missions and Accountability of Government Agencies. *Review of Economic Studies* 66 (1): 199-217.

DiMaggio, Paul J. 1991. Constructing an Organizational Field as a Professional Project: U.S. Art Museums, 1920-1940. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 267-92 Chicago: The University of Chicago.

- DiMaggio, Paul J. and Walter W. Powell. 1991b. The Iron Cage Revisited: Institutional Isomorphism and Collective Rationality in Organizational Fields. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 63-82. Chicago: The University of Chicago.
- DiMaggio, Paul J., and Walter W. Powell. 1991. Introduction. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 1-38. Chicago: The University of Chicago.
- Dixit, Avinash. 2002. Incentives and Organisations in the Public Sector: An Interpretative Review. *Journal of Human Resources* 37 (4): 696-727.
- Dixit, Avinash. 2012. Bureaucracy, its Reform and Development. Paper presented at the A. N. Varma Lecture, India Development Foundation.
- Dokko, Gina, Steffanie L. Wilk and Nancy P. Rothbard. 2009. Unpacking Prior Experience: How Career History Affects Job Performance. *Organization Science* 20 (1):51-68.
- Downs, Anthony. 1967. *Inside Bureaucracy*. Boston, MA: Little, Brown and Company. MA: Harvard University Press.
- Dunleavy, Patrick. 1991. *Democracy, Bureaucracy and Public Choice*. Hemel Hempstead, Harvester Wheatsheaf.
- Eisenhardt, K. M. and C.B. Schoonhoven. 1990. Organizational Growth: Linking Founding Team, Strategy, Environment and Growth among U.S. Semiconductor Ventures. *Administrative Science Quarterly* 35 (3): 504-529.
- Eisner, Marc A. 1992. *Antitrust and the Triumph of Economics*. Chapel Hill: University of North Carolina Press.

- Elster, Jon. 1989. Social Norms and Economic Theory. *Journal of Economic Perspectives* 3 (4): 99-117.
- Epstein, David and Sharyn O'Halloran. 1994. Administrative Procedures, Information, and Agency Discretion. *American Journal of Political Science* 38 (3): 697-722.
- Executive Office of the President, National Science and Technology Council, 2015. Social and Behavioral Sciences Team Annual Report. In: Washington DC.
- Fligstein, Neil. 1991. The Structural Transformation of American Industry: An Institutional Account of the Causes of Diversification in the Largest Firms, 1919-1979. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 311-336. Chicago: The University of Chicago.
- Friedland, Roger and Robert R. Alford. 1991. Bringing Society Back In: Symbols, Practices, and Institutional Contradictions. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 232-263. Chicago: The University of Chicago.
- Gailmard, Sean and John W. Patty. 2007. Slackers and Zealots: Civil Service, Policy Discretion, and Bureaucratic Expertise. *American Journal of Political Science* 51(4): 873-899.
- Gailmard, Sean and John W. Patty. 2012. Formal Models of Bureaucracy. *Annual Review of Political Science* 15 (June): 353-377.
- Gailmard, Sean. 2002. Expertise, Subversion and Bureaucratic Discretion. *Journal of Law, Economics and Organization* 18 (2): 536-555.
- Gailmard, Sean. 2009. Discretion Rather than Rules: Choice of Instruments to Control Bureaucratic Policy Making. *Political Analysis* 17 (1): 25-42.

- Gains, Francesca and Peter John. 2010. What do Bureaucrats like Doing? Bureaucratic Preferences in Response to Institutional Reform. *Public Administration Review* 70 (3): 455-463.
- Ganguly, Sumit and C. Christine Fair. 2013. The Structural Origins of Authoritarianism in Pakistan. *Commonwealth and Comparative Politics* 51 (1): 122-142.
- Garud, Raghu, Arun Kumaraswamy and Peter Karnoe. 2010. Path Dependence or Path Creation. *Journal of Management Studies* 47 (4): 760-774.
- Gerring, John and Strom C. Thacker. 2004. Political Institutions and Corruption: The Role of Unitarism and Parliamentarism. *British Journal of Political Science* 34: 295-330.
- Gill, Jeff. 1995. Formal Models of Legislative/Administrative Interaction: A Survey of the Subfield. *Public Administration Review* 55 (1): 99-106.
- Goodnow, Henry Frank. 1964. *The Civil Service of Pakistan*, New Haven: Yale University.
- Goodsell, Charles T. 1981. *The Public Encounter: Where State and Citizen Meet*. Bloomington: Indiana University Press.
- Gould, William. 2013. A Brief History of Corruption in India. Available at <http://www.theindiasite.com/a-brief-history-of-corruption-in-india>. Accessed on September 5, 2014.
- Habib, Hassan. 1973. *Babus, Brahmins and Bureaucrats: A Critique of an Administrative System in Pakistan*, Lahore: Peoples Publishing House.
- Hall, Peter. A. and Rosemary C.R. Taylor. 1996. *Political Science and the Three New*

Institutionalisms. *Political Studies* 44 (4): 936-957.

Hannan, Michael T. and John Freeman. S. 1977. The Population Ecology of Organizations. *American Journal of Sociology* 82 (5): 929-964.

Hannan, Michael T. and John Freeman. S. 1984. Structural Inertia and Organizational Change. *American Sociological Review* 49 (2): 149-164.

Haque, Nadeem and Musleh ud Din. 2006. Public Sector Efficiency: Perspectives on Civil Service Reform, Islamabad: Pakistan Institute of Development Economics.

Haque, Shamsul M. 1997. Incongruity Between Bureaucracy and Society in Developing Nations: A Critique. *Peace and Change* 22 (4): 432-462.

Heineman, Ben W. and Fritz. Heimann. 2006. The Long War against Corruption. *Foreign Affairs*. 85 (3): 75–86.

Higgins, Monica. 2005. Career Imprints: Creating Leaders across an Industry. Jossey-Bass: San Francisco.

Hoff, Karla and Joseph E. Stiglitz. 2016. Striving for Balance in Economics: Towards a Theory of the Social Determination of Behavior. *Journal of Economic Behavior and Organization* 126 (B): 25–57.

Hofstede, Geert .1985. The Interaction between National and Organizational Value Systems. *Journal of Management studies* 22 ( 4): 347-357

Horn, Murray J. and Kenneth A. Shepsle. 1989. Administrative Process and Organizational Form as Legislative Responses to Agency Costs. *Virginia Law Review* 75 (March): 499–508.

Horst, Ulrich, Alan Kirman and Miriam Teschl. 2006. Changing Identity: The

- Emergence of Social Groups. Cornell University, College of Agriculture and Life Sciences, Mimeo.
- Howlett, Michael. 2002. Do Networks Matter? Linking Policy Network Structure to Policy Outcomes: Evidence from Four Canadian Policy Sectors 1990-2000. *Canadian Journal of Political Science* 35 (2): 235-267.
- Howlett, Michael. 2009. Governance Modes, Policy Regimes and Operational Plans: A Multi-Level Nested Model of Policy Instrument Choice and Policy Design. *Policy Sciences* 42 (1): 73-89.
- Huber, John D. and Charles R. Shipan 2002. *Deliberate Discretion? The Institutional Foundations of Bureaucratic Autonomy*. New York: Cambridge University Press.
- Huber, John D. and Nolan McCarty. 2004. Bureaucratic Capacity, Delegation, and Political Reform. *American Political Science Review* 98 (Aug.): 481-494.
- Huber, John D., Charles R. Shipan, and Madelaine Pfahler 2001. Legislatures, and Statutory Control of Bureaucracy. *American Journal of Political Science* 45(2): 330-345.
- Husain, Ishrat. 1999. *Pakistan: the Economy of an Elitist State*. Oxford University Press: Karachi.
- Hussain, Asaf. 1979. *Elite Politics in an Ideological State: The Case of Pakistan*. Dawson: Folkston.
- Islam, Nasir. 1989. Colonial Legacy, Administrative Reform and Politics: Pakistan 1947-1987. *Public Administration and Development* 9 (3): 271-285.

Jaros, Stephen. J. 1997. An Assessment of Meyer and Allen's 1991 Three-Component Model of Organization Commitment and Turnover Intentions. *Journal of Vocational Behavior* 51(3): 319-337.

Jepperson, Ronald L. 1991. Institutions, Institutional Effects, and Institutionalism. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 143-163. Chicago: The University of Chicago.

Jo, Jinhee and Lawrence S. Rothenberg. 2014. The Importance of Bureaucratic Hierarchy: Conflicting Preferences, Incomplete Control, and Policy Outcomes. *Economics and Politics* 26 (1): 157-183.

Johnson, Victoria. 2007. What is Organizational Imprinting? Cultural Entrepreneurship in the Founding of the Paris Opera. *American Journal of Sociology* 113 (1): 97-127.

Kaplan, Sarah and Rebecca Henderson. 2005. Inertia and Incentives: Bridging Organizational Economics and Organization Theory. *Organization Science* 16 (5): 509-521.

Kardar, Shahid. 2006. *Reflections on Pakistan's Economy*, Lahore: Heritage Publications.

Kaufman, Bruce E. 1999. Expanding the Behavioral Foundations of Labor Economics. *Industrial and Labor Relations Review* 52 (3): 361-392.

Kelman, Steven and Sounman Hong. 2014. This Could Be the Start of Something Big: Linking Early Managerial Choices with Subsequent Organizational Performance. *Journal of Public Administration Research and Theory* 25 (1): 135-164.

Kelman, Steven. 1987. Public Choice and Public Spirit. *The Public Interest*



- Kennedy, Charles H. 1987. *Bureaucracy in Pakistan*. Oxford University Press: Karachi.
- Kenny, Paul D. 2013. *Colonial Legacies and Critical Junctures: Decolonization and Corruption in India*.
- Khan, Faheem and Musleh ud Din. 2008. Attitudes towards Civil Service of Pakistan. *The Pakistan Development Review* 47 (4): 779-790.
- Kimberly, John R. 1975. Environmental Constraints and Organizational Structures: A Comparative Analysis of Rehabilitation Organizations. *Administrative Science Quarterly* 20 (2): 191-206.
- Kranton, Rachel, Matthew Pease, Seth Sanders and Scott Huettel. 2013. Identity, Groups, and Social Preferences. *Working Paper*.
- Krause, George A. and Anne Joseph O'Connell. 2012. Bureaucratic Leadership, Institutional Policy Conflict, and the Political Calculus of Fiduciary Investment Decisions in U.S. Federal Agencies. Paper presented at 2011 the Midwest Political Science Association, Chicago, Illinois, March 31-April 3.
- Kriauciunas, Aldas and Prashant Kale. 2006. The Impact of Socialist Imprinting and Search on Resource Change: A Study of Firms in Lithuania. *Strategic Management Journal* 27 (7): 659-679.
- Laffont, Jean-Jacques and Jean Tirole. 1986. Using Cost Observation to Regulate Firms. *Journal of Political Economy* 94 (3): 614-641.
- Lane, Jan-Erik. 2013. The Principal-Agent Approach to Politics: Policy Implementation and Public Policy-Making. *Open Journal of Political Science* 3 (2): 85-89.

- Liebowitz, S. J. and Stephen E. Margolis. 1995. Path Dependence, Lock-in, and History. *Journal of Law, Economics, and Organization* 11 (1): 205-226.
- Lind, E.Allan., and Tom R. Tyler. 1988. *The Social Psychology of Procedural Justice*. New York: Plenum.
- Lindsay, Cotton M. 1976. A Theory of Government Enterprise. *Journal of Political Economy* 84 (5): 1061-1077.
- Lipsky, Michael. 1980. *Street-Level Bureaucrats: Dilemmas of the Individual in Public Services*. New York: Russell Sage Foundation.
- Macey, Jonathan R. 1992. Organizational Design and Political Control of Administrative Agencies. *Journal of Law, Economics and Organization* 8 (1): 93-110.
- Mackay, Robert J. and Carolyn L. Weaver. 1981. Agenda Control by Budget Maximizers in a Multi-Bureau Setting. *Public Choice* 37 (3): 447-472.
- Mackay, Robert J. and Carolyn L. Weaver. 1983. Commodity Bundling and Agenda Control in the Public Sector.” *The Quarterly Journal of Economics* 98 (4): 611-635.
- Maddison, Angus. 1971. *Class Structure and Economic Growth: India and Pakistan since Moghuls*. New York:
- Mahmood, Ehtsham. 2011. *Principles of Administrative Law*. Mansoor Book House: Lahore.
- Mahoney, James. 2000. Path Dependence in Historical Sociology. *Theory and Society* 29 (4): 507-548.

Malmendier, Ulrike and Stefan Nagel. 2011. Depression Babies: Do Macroeconomic Experiences Affect Risk Taking. *The Quarterly Journal of Economics* 126 (1): 373-416.

March, James G. 1999. *The Pursuit of Organizational Intelligence*, Malden, Mass.: Blackwell.

March, James G. and Herbert A. Simon. 1958. *Organizations*. New York: John Wiley and Sons, Inc.

March, James G. and Johan P. Olsen. 1984. The New Institutionalism: Organizational Factors in Political Life. *American Political Science Review* 78 (3): 734-749.

Marquis, Christopher and Cuili Qian. 2013. Corporate Social Responsibility Reporting in China: Symbol or Substance. *Working Paper*, Harvard Business School.

Marquis, Christopher and Zhi Huang. 2010. Acquisitions as Exaptation: The Legacy of Founding Institutions in the U.S. Commercial Banking Industry. *Academy of Management Journal* 53 (6): 1441-1473.

Marquis, Christopher, and András Tilcsik. 2013. Imprinting: Toward A Multilevel Theory. *The Academy of Management Journal* 7 (1): 195-245.

Marshall, P. J. 1990. The Whites of British India, 1780-1830: A Failed Colonial Society. *International History Review* 12 (1): 26-44.

Marshall, P.J. 1998. The British in Asia: Trade to Dominion, 1700-1765, in P.J. Marshall (ed). *The Oxford History of the British Empire, Volume II, the Eighteenth Century*, Oxford University Press: New York.

Masatlioglu, Yusufcan and Efe A. Ok. 2005. Rational Choice with Status Quo Bias. *Journal of Economic Theory* 121 (1): 1-29.

Masatlioglu, Yusufcan, and Efe A. Ok. 2014. A Canonical Model of Choice with Initial Endowments. *Review of Economic Studies* 81 (2): 851-883.

Mazmanian, Daniel A. and Paul A. Sabatier. 1983. Implementation and Public Policy. Palo Alto: Scott, Foresman.

McAfee, R. Preston and John McMillan. 1995. Organizational Diseconomies of Scale. *Journal of Economics and Management Strategy* 4 (3): 399-426.

McCubbins, Mathew D., Roger G. Noll, and Barry R. Weingast. 1987. Administrative Procedures as Instruments of Political Control. *Journal of Law, Economics, and Organization* 3(Fall): 243-77.

McEvily, Bill, Jonathan Jaffee and Marco Tortoriello. 2012. Not All Bridging Ties Are Equal: Network Imprinting and Firm Growth in the Nashville Legal Industry, 1933–1978. *Organization Science* 23 (2): 547-563

Meier, Kenneth J. and Laurence J. O’Toole, Jr. 2006. Political Control versus Bureaucratic Values: Reframing the Debate. *Public Administration Review* 66 (2): 177–192.

Meyer, John P., Natalie J. Allen and Catherine A. Smith. 1993. Commitment to organizations and occupations: Extension and test of a three-component conceptualization. *Journal of Applied Psychology* 78: 538-551.

Meyer, John W. and Brian Rowan. 1991. Institutionalized Organizations: Formal Structure as Myth and Ceremony. In Paul J. DiMaggio and Walter W. Powell (Eds.),

The New Institutionalism in Organizational Analysis: 41-62. Chicago: The University of Chicago.

Meyer, Marshall W. and M. Craig Brown. 1977. The Process of Bureaucratization. *American Journal of Sociology* 83 (2): 364-385

Milgrom, Paul and John Roberts .1990. Rationalizability and Learning in Games with Strategic Complementarities. *Econometrica* 58 (6): 1255-1278.

Miller, Garry J. and Terry M. Moe. 1983. Bureaucrats, Legislators, and the Size of Government. *American Political Science Review* 77 (2): 297-332.

Mintzberg, Henry and James A. Waters. 1982. Tracking Strategy in an Entrepreneurial Firm. *The Academy of Management Journal* 25 (3): 465-499.

Mitnick, Barry M. 1986. The Theory of Agency and Organizational Analysis. Paper Presented at the Annual Meeting of the American Political Science Association. Washington, DC.

Moe, Terry M. 1985. The Politicized Presidency. In John E. Chubb and Paul E. Peterson (Eds.), *The New Direction in American Politics*. Washington, D.C: The Brookings Institution.

Moe, Terry M. 1982. Regulatory Performance and Presidential Administration. *American Journal of Political Science* 26 (2): 197-224.

Moe, Terry M. 1987. Interests, Institutions, and Positive Theory: The Politics of the NLRB. *Studies in American Political Development* 2 : 236-299

Moe, Terry M. 1989. The Politics of Bureaucratic Structure. In John E. Chubb and Paul E. Peterson (Eds.), *Can the Government Govern?* : 267-329. Washington D.C.: The Brookings Institution.

- Moe, Terry M. 1990. The Politics of Structural Choice: Toward a Theory of Public Bureaucracy. In Oliver E. Williamson, ed., *Organization Theory: From Chester Barnard to the Present and Beyond*. Oxford University Press.
- Moe, Terry M. 1995. The Politics of Structural Choice: Toward a Theory of Public Bureaucracy. In Oliver E. Williamson (Eds.), *Organization theory From Chester Barnard to the Present and Beyond*: 116-153. New York: Oxford University Press.
- Moe, Terry M. and Scott A. Wislon. 1994. Presidents and Political Structure. *Law and Contemporary Problems* 57: 1-44.
- Mosher, Frederick. 1968. *Democracy and the Public Service*. New York: Oxford University Press.
- Nadvi, Khan and Asad Sayeed. 2003. *Industrial Capital and Pro-Poor Change*. Thematic Paper for DFID Pakistan Drivers of Pro-Poor Change. Mimeographed.
- Nelson, Richard R. and Sidney G. Winter. 1982. *An Evolutionary Theory of Economic Change*. Cambridge: Harvard University Press.
- Nielsen, Richard P. 2003. Corruption Networks and Implications for Ethical Corruption Reform. *Journal of Business Ethics* 42 (2): 125-149.
- Niskanen, William A. 1968. The Peculiar Economics of Bureaucracy. *The American Economic Review* 58 (2): 293-305.
- Niskanen, William A. 1971. *Bureaucracy and Representative Government*. Chicago: Aldine.
- Niskanen, William A. 1975. Bureaucrats and Politicians. *Journal of Law and Economics* 18 (3): 617-643.

- Niskanen, William A. 1991. A Reflection on bureaucracy and representative government. In Andre Blais and Stephen Dion (Eds.), *The budget maximizing bureaucrat: Appraisal and evidence*. Pittsburgh: Pittsburgh University Press.
- Nunn, Nathan. 2008a. The Long-Term Effects of Africa's slave trades. *Quarterly Journal of Economics* 123 (1): 139–176.
- O'Tool, Laurence J. Jr. and Kenneth J. Meier. 2015. Public Management, Context, and Performance: In Quest of a More General Theory. *Journal of Public Administration Research and Theory* 25 (1): 237-256.
- OECD. 2005. *OECD Guidelines on Corporate Governance of State-Owned Enterprises*. Paris: OECD Publishing.
- OECD. 2014. *Regulatory Enforcement and Inspections*. Paris: OECD Publishing.
- Olsen, Johan P. 2008. The Ups and Downs of Bureaucratic organization. *Annual Review of Political Science* 11: 13-37.
- Olsen, Johan P. 2007. The Ups and Downs of Bureaucratic Organization. *Working paper 14*, The Center for European Studies, University of Oslo.
- Pakistan, Ministry of Finance. 2015. *Pakistan Economic Survey 2015-2016*.
- Parkinson, C. Northcote and Robert C. Osborn. 1957. *Parkinson's Law and other Studies in Administration*.
- Peng, Yusheng. 2004. Kinship Networks and Entrepreneurs in China's Transitional Economy. *American Journal of Sociology* 109 (5): 1045-74.

Perkmann, Markus, and Andre Spicer. 2014. How Emerging Organizations Take Form: The Role of Imprinting and Values in Organizational Bricolage. *Organization Science* 25 (6): 1785-1806.

Perrow, Charles S. 1972. *Complex Organizations: A Critical Essay*. New York: McGraw- Hill.

Perrow, Charles. 1986. *Complex Organizations: A Critical Essay*. New York: Random House.

Perry, James L. and Lois Recasino Wise. 1990. The Motivational Bases of Public Service. *Public Administration Review* 50 (3): 367–73.

Perry, James L. 1996. Measuring Public Service Motivation: An Assessment of Construct Reliability and Validity. *Journal of Public Administration Research and Theory* 1: 5-22.

Pierson, Paul. 2006. Public Policies as Institutions. In Daniel Galvin, Ian Shapiro and Stephen Skowronek (Eds.), *Rethinking Political Institutions: The Art of the State*. New York: New York City University Press.

Pierson, Paul. 2000. Increasing Returns, Path Dependence, and the Study of Politics. *American Political Science Review* 94 (2): 251-267.

Posner, Paul and Chung-Keun Park. 2007. Role of the Legislature in the Budget Process: Recent Trends and Innovations. *OECD Journal on Budgeting* 7 (3): 1-26.

Posner, Eric A. and Adrian Vermeule. 2002. Interring the Nondelegation Doctrine. *University of Chicago Law Review* 69: 1721.



- Posthuma, Richard A., Carl P. Maertz Jr. and James B. Dworkin. 2007. Procedural Justice's Relationship with Turnover: Explaining past inconsistent findings. *Journal of Organizational Behavior* 28 (4): 381–398.
- Powell, Walter W. 1991. Expanding the Scope of Institutional Analysis. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 183-203. Chicago: The University of Chicago.
- Prendergast, C. 2007. The Motivation and Bias of Bureaucrats. *American Economic Review* 97 (1): 180-96.
- Quirk, Paul J. 1981. *Industry Influence in Federal Regulatory Agencies*. Princeton: Princeton University Press.
- Rawls, John. 1971. *A Theory of Justice*. Cambridge, MA: Belknap Press of Harvard University Press.
- Repucci, Sarah. 2014. Designing Effective Civil Service Reform: Lessons from Past Experience. *Public Administration and Development* 34: 207-2018.
- Rocheftort, David A. and Roger W. Cobb. 1994a. *The Politics of Problem Definition*. Lawrence: University Press of Kansas.
- Romer, Thomas and Howard Rosenthal. 1978. Political Resource Allocation, Controlled Agendas, and the Status Quo. *Public Choice* 33 (4): 27-43.
- Rose-Ackerman, Susan. 1988. Progressive Law and Economics – and the New Administrative Law. *Yale Law Journal* 98: 341-68.
- Rose-Ackerman, Susan. 1996. *The Political Economy of Corruption: Causes and Consequences*. World Bank: Washington D.C.

Rose-Ackerman, Susan. 2007. *The Economics of Administrative Law*. Cheltenham UK: Edward Elgar.

Rourke, Francis E. 1984. *Bureaucracy, Politics, and Public Policy*. 3rd Ed., Boston: Little, Brown.

Salancik, Gerald R. and Jeffrey Pfeffer. 1977. Who Gets Power and How They Hold Onto It: A Strategic Contingency Model of Power. *Organizational Dynamics* 5(3): 2-21.

Schatz, Florian. 2013. Fighting Corruption with Social Accountability: A Comparative Analysis of Social Accountability Mechanisms' Potential to Reduce Corruption in Public Administration. *Public Administration and Development* 33 (3): 161-174.

Schick, Allen. 2002. Can National Legislatures Regain an Effective Voice in Budget Policy? *OECD Journal on Budgeting* 1 (3): 15-42.

Schoar, Antoinette and Luo Zuo. 2011. Shaped by Booms and Busts: How the Economy Impacts CEO Careers and Management Style. *Working Paper*, National Bureau of Economic Research.

Schuck, Peter H. 1994. *Foundations of Administrative Law*. Foundation Press.

Schutte, Sofie Arjon. 2012. Against the Odds: Anti-Corruption Reform in Indonesia. *Public Administration and Development* 32 (1): 38-48.

Scott, W. Richard 1991. Unpacking Institutional Arguments. In W. Powell & P. DiMaggio (Eds.), *The New Institutionalism in Organizational Analysis*: 164-182. Chicago: University of Chicago Press.

Segal, Ilya and Michael D. Whinston. 2010. Property Rights. In Gibbons, R. and Roberts, J. (Eds.), *Handbook of Organizational Economics*. Princeton: Princeton University Press.

Shafqat, Saeed. 2014. In Pakistan Policy Making is largely done by Bureaucracy.” *The Daily News*, January 26, 2014.

Shepsle, Kenneth A. 1992. Bureaucratic Drift, Coalitional Drift, and Time Consistency: A Comment on Mackey. *Journal of Law, Economics, and Organization* 8 : 111–118.

Shepsle, Kenneth A. 1979. Institutional Arrangements and Equilibrium in Multidimensional Voting Models. *American Journal of Political Science* 23: 23-57.

Shipan, Charles R. 2004. Regulatory Regimes, Agency Actions, and the Conditional Nature of Congressional influence. *American Political Science Review* 98: 467–80.

Siers, Brians. 2007. Relationships among Organizational Justice Perceptions, Adjustment, and Turnover of United States-based Expatriates. *Applied Psychology: An International Review* 56 (3): 437-459.

Simon, Herbert A. 1947. *Administrative Behavior: A Study of Decision Making Processes in Administrative Organization*. New York: Free Press.

Simon, Herbert A. 1997. *Administrative Behavior*. 4th Edition. New York: Free Press.

Simsek, Zeki, Brian C. Fox and Ciaran Heavey. 2015. “What’s Past is Prologue”: A Framework, Review, and Future Directions for Organizational Research on Imprinting. *Journal of Management* 41 (1): 288-317.

- Smith, Belinda M. 2002. Time Norms In the Workplace: Their Exclusionary Effect and Potential for Change. *Columbia Journal of Gender and Labor* 11 (2): 271-360.
- Staw, Barry M. 1976. Knee-Deep in the Big Muddy: A Study of Escalating Commitment to a Chosen Course of Action. *Organizational Behavior and Human Performance* 16 (1): 27-44.
- Stephenson, Matthew C. 2006. Legislative Allocation of Delegated Power: Uncertainty, Risk, and the Choice between Agencies and Courts. *Harvard Law Review* 119: 1035-70
- Stephenson, Matthew C. 2007. Bureaucratic Decision Costs and Endogenous Agency Expertise. *Journal of Law, Economics and Organization* 23 (2): 469-498.
- Stephenson, Matthew C. 2008. Optimal Political Control of the Bureaucracy. *Michigan Law Review* 107: 53-110.
- Stinchcombe, Arthur L. 1965. Social Structure and Organizations. In J. March (Eds.), *Handbook of Organizations*: 142-169. Chicago: Rand McNally.
- Stocker, Frederick T. 2011. India's Anti-Corruption Cross Roads. Manufacturing Alliance for Productivity and Innovation (MAPI) Policy Analysis, December 2011. Arlington VA. Available at [https://www.mapi.net/system/files/LAR-508\\_1.pdf](https://www.mapi.net/system/files/LAR-508_1.pdf). Accessed on September 15, 2014.
- Sydow, Jorg, Georg Schreyo and Jochen Koch. 2009. Organizational Path Dependence: Opening the Black Box. *Academy of Management Review* 34 (4): 689-709.
- Taylor, Frederick Winslow. 1911. *The Principles of Scientific Management*. New York: W.W. Norton.

- Teece, David J., Gary Pisano and Amy Shuen. 1997. Dynamic Capabilities and Strategic Management. *Strategic Management Journal* 18: 509-533.
- Thornton, Philip, and William Ocasio. 2008. Institutional Logics and Institutional Change. In Royston Greenwood, Christine Oliver, Kerstin Sahlin and Roy Suddaby (Eds.), *The Sage Handbook of Organizational Institutionalism*: 99-128. CA: Sage Publications.
- Tilcsik, Andras. 2012. *Remembrance of Things Past: Individual Imprinting in Organizations*. Harvard University: Cambridge MA.
- Tinker, Hugh. 1966. Structure of the British Imperial Heritage. In Braibanti, R. (ed.) *Asian Bureaucratic Systems Emergent from the British Imperial Tradition*. Duke University Press: Durham, N.C.
- Tirole, Jean. 1986. Hierarchies and Bureaucracies: on the Role of Collusion in Organizations. *Journal of Law, Economics and Organization* 2 (2): 181-214.
- Toerell, Jan. 2007. Corruption as an Institution: Rethinking the Nature and Origin of the Grabbing Hand. *Quality of Governing Series Working Paper* no. 2007:5. Goteborg University.
- Tucker, David J., Jitendra V. Singh and Agnes G. Meinhard. 1990. Founding Characteristics, Imprinting and Organizational Change. In J. Singh (Eds.), *Organizational Evolution: New Directions*: 182-200. Newbury Park, CA: Sage.
- Tullock, Gordon. 1965. *The Politics of Bureaucracy*. Washington, D.C: The Public Affairs Press.

- Turner, J. C., M. A. Hogg, P. J. Oakes, S. D. Reicher and M. S. Wetherell. 1987. *Rediscovering the Social Group: A Self-Categorization Theory*. Oxford, UK: Blackwell.
- Vachris, Michelle A. 2004. Principal-Agent Relationships in the Theory of Bureaucracy. In C. K. Rowley and F. Schneider (Eds.), *The Encyclopedia of Public Choice*. New York: Springer.
- Vergne, Jean-Philippe and Rodolphe Durand. 2010. The Missing Link Between the Theory and Empirics of Path Dependence: Conceptual Clarifications, Testability Issue, and Methodological Implications. *Journal of Management Studies* 47 (4): 736-759.
- Volden, Craig. 2002. Delegating Power to Bureaucracies: Evidence from the States. *Journal of Law, Economics and Organization* 18 (1): 187-220.
- Walsh, James P. and Gerardo River Ungson. 1991. Organizational Memory. *Academy of Management Review* 16 (1): 57-91.
- Warren, Patrick L. 2012. Allies or Adversaries: Appointees and Policymaking under Separation of Powers. *Journal of Law, Economics and Organization* 28 (3): 407-446.
- Washbrook, D. A. 1999. India, 1818-1860: The Two Faces of Colonialism. In Andrew. Porter (Ed.), *The Oxford History of the British Empire, Volume III, The Nineteenth Century*: 395-421. New York: Oxford University Press.
- Waterman, Richard W. and Kenneth J. Meier. 1998. Principal Agent Models: An Expansion. *Journal of Public Administration Research and Theory* 8 (2): 173-202.

- Waterman, Richard W., Amelia A. Rouse, and Robert L. Wright. 1998. The Venues of Influence: A New Theory of Political Control of the Bureaucracy. *Journal of Public Administration Research and Theory* 8 : 13–38.
- Wayne, Sandy J., Lynn M. Shore and Robert C. Liden . 1997. Perceived Organizational Support and Leader-Member Exchange: A Social Exchange Perspective. *Academy of Management Journal* 40 (1): 82-111.
- Weber, Max .1922. (1978). *Economy and Society*. Edited by Guenther Roth and Claus Wittich. Reprint, Berkeley, CA: University of California Press.
- Weber, Max. 1914. (1978). *Economy and Society: An Outline of Interpretive Sociology*. Berkeley, CA: University of California Press.
- Weber, Max. 1947. *The Theory of Social and Economic Organization*. New York: Collier-Macmillan Limited.
- Weigel, Wolfgang. 2006. Why Promote the Economic Analysis of Public Law? *Homo Oeconomicus* 23 (2): 195-216.
- Weingast, Barry R. 1984. The Congressional Bureaucratic System: A Principal-Agent Perspective. *Public Choice* 44 (1): 147-191.
- Weingast, Barry R. and William J. Marshall. 1988. The Industrial Organization of Congress; on why Legislatures, Like Firms, are Not Organized as Markets. *Journal of Political Economy* 96 (1): 132-163.
- West, William F. 1997. Searching for a Theory of Bureaucratic Structure. *Journal of Public Administration Research and Theory* 7 (4): 591-613.

- Wichardt, Philipp C. 2008. Identity and Why We Cooperate with Those We Do. *Journal of Economic Psychology* 29 (2): 127-139.
- Wilder, Andrew. 2013. The Politics of Civil Service Reforms in Pakistan. *Journal of International Affairs* 63 (1): 19-37.
- Williamson, Oliver E. 1964. The Economics of Discretionary Behavior: Managerial Objectives in a Theory of the Firm. Englewood Cliffs, NJ: Prentice Hall.
- Williamson, Oliver E. 1999. Public and Private Bureaucracies: A Transaction Cost Economics Perspective. *The Journal of Law, Economics and Organization* 15 (1): 306-342.
- Wilson, James Q. 1989. Bureaucracy: What Government Agencies Do and Why They Do It. New York: Basic Books.
- Wilson, Woodrow. 1987. The Study of Administration. *Political Science Quarterly* 2 (2): 197-222.
- Wood, B. Dan and Richard W. Waterman. 1994. Bureaucratic Dynamics: The Role of Bureaucracy in a Democracy. Boulder, CO.
- World Bank. 2012. Public Office, Private Interests. Washington DC: The World Bank.
- Ziring, Lawrence and Robert LaPorte. 1974. The Pakistan Bureaucracy: Two Views. *Asian Survey* 14 (12): 1072-1073.
- Zucker, Lynne G. 1991. The Role of Institutionalization in Cultural Persistence. In Paul J. DiMaggio and Walter W. Powell (Eds.), *The New Institutionalism in Organizational Analysis*: 83-107. Chicago: The University of Chicago.



Zyglidopoulos, Stelios.1999. Initial Environmental Conditions and Technological Change. *Journal of Management Studies* 36 (2): 241-262.

## Executive Summary

This dissertation analyzes the over-arching question of how the institutional and social context of public bureaucracy impact the choices of bureaucrats. These choices are introduced in the form of inertial-preferences and identity-driven preferences in the decision-making of bureaucrats. The study proposes theoretical frameworks to explain policy drift. These frameworks determine how “context-oriented preferences” moderate the trade-off between budget maximizing motivations and the policy choice of bureaucrats.

In order to understand the context of bureaucratic choices directly stemming from organizational, institutional and social factors, the study encompasses two generic research routes that are covered in the three content chapters.

In the first research route, the impact of history on present organizational structures is investigated with the theory of organizational imprinting. This refers to the process through which economic, social and institutional factors that prevailed at the time of founding shape present organizational forms and attributes.

The second research route builds on the notion that a bureaucratic organization is a formalized social system. The bureaucrats consider it as essential to comply with organizational goals in order to be considered as a member of the organization. In order to analytically seize the social context of the bureaucratic organization, the notion of identity is conceptually integrated into the decision calculus of the bureaucrat.

Apart from the introductory chapter, which sets the stage for the dissertation, there are three content chapters and a concluding chapter.

Chapter 2 provides a long-term temporal perspective on the persistence of organizational design. The long-term view on the matter allows us to better explore and explain why corruption and rent-seeking remain entrenched in many bureaucracies, although history has provided ample chances for an organization to change its path. The chapter identifies the triggers of bureaucratic rigidity with the help of the bureaucracy in Pakistan, which has not essentially changed over the last 150 years. It also provides an account of how certain

practices during the colonial era of the Indian sub-continent led to unintended consequences in the form of bureaucratic power, corruption and control over economic policies.

Chapter 3 continues to follow the organizational imprinting theory and deals with the question of how organizational imprinting affects the choices of bureaucrats at the micro level. A rational choice model shows how the introduction of status quo/imprinting influences the policy choice of bureaucrats. They may be stuck with initial policy choices, which may lead to persistent inefficiencies. This chapter arrives at the conclusion that once bureaucracy acquires imprinted characteristics, the forces of inertia and institutionalizations contribute to policy rigidity/status quo bias in the decision-making of the bureaucrat.

Chapter 4 looks further into the choices of bureaucrats following the second research route. It builds on the theory of identity economics and uses the notion of situation-specific norms. The chapter explores the blueprints or scripts that bureaucrats internalize and which tell them how to behave in a specific situation. The analysis shows that in a game theoretic framework, a bureaucrat captures utility gains from behaving in a manner, which is in line with the established identity and experiences disutility when his behavior deviates from what is dictated by identity.

The concluding chapter provides the relevant policy insights. The analyses of the inertial and identity-driven choices point out that many well-known anomalies in the behaviour of bureaucrats are best explained with reference to contextual factors. These factors can either help to produce socially optimal choices or force policy choices that are non-optimal from a welfare point of view. Consequently, policy interventions might be necessary to enable bureaucrats to change choices, especially when these factors hinder optimal choices. However, when these factors facilitate optimal choices, no policy intervention is required; rather the focus must be to streamline the system in order for bureaucrats to act according to their organizational context. This final chapter summarizes the findings of this dissertation, points out the limitations and discusses paths for future research.

## Samenvatting

In dit proefschrift wordt de overkoepelende vraag gesteld hoe de institutionele en sociale context van de publieke bureaucratie van invloed is op de keuzen van bureaucraten. Deze keuzen worden geïntroduceerd in de vorm van inertieële voorkeuren en identiteitsgestuurde voorkeuren in het besluitvormingsproces van bureaucraten. Het onderzoek stelt theoretische kaders voor ter verklaring van beleidsdeviaties. Deze kaders bepalen hoe “op context gebaseerde voorkeuren” van invloed zijn op de afweging tussen drijfveren die gericht zijn op het optimaliseren van de begroting en de beleidskeuze van bureaucraten.

Om de context van bureaucratische keuzen die rechtstreeks voortvloeien uit organisatorische, institutionele en sociale factoren te begrijpen, maakt het onderzoek gebruik van twee generieke onderzoekstrajecten die in de drie inhoudelijke hoofdstukken worden besproken.

Het eerste onderzoekstraject bestudeert de impact van de geschiedenis op huidige organisatiestructuren aan de hand van de organisatorische inprentingstheorie (*organizational imprinting*). Dit is het proces waarbij de economische, sociale en institutionele factoren die ten tijde van de oprichting van een organisatie golden bepalend zijn voor de vorm en kenmerken van de organisatie in het heden.

Het tweede onderzoekstraject is gebaseerd op de gedachte dat een bureaucratische organisatie een geformaliseerd sociaal systeem is. De bureaucraten vinden het van wezenlijk belang om te voldoen aan de doelstellingen van de organisatie, zodat zij beschouwd zullen worden als een lid van de organisatie. Om de sociale context van de bureaucratische organisatie exact te kunnen analyseren, is het begrip identiteit theoretisch geïntegreerd in de besluitvorming van de bureaucraat.

Naast een inleidend hoofdstuk, waarin de context en hoofdlijnen van het proefschrift worden gepresenteerd, zijn er drie inhoudelijke hoofdstukken en een afsluitend hoofdstuk.

Hoofdstuk 2 biedt een langetermijnperspectief op de persistentie van organisatieontwerpen. De langetermijnvisie op deze materie stelt ons beter in staat om te onderzoeken en verklaren waarom corruptie en politieke rente zo diepgeworteld blijven in veel bureaucratieën, terwijl de geschiedenis de organisatie voldoende kansen heeft geboden om van koers te wisselen. In het hoofdstuk wordt vastgesteld door welke factoren bureaucratische starheid wordt veroorzaakt, aan de hand van de bureaucratie in Pakistan die in de afgelopen 150 jaar niet wezenlijk is veranderd. Daarnaast wordt in het hoofdstuk beschreven hoe bepaalde gedragingen op het Indiase subcontinent tijdens het koloniale tijdperk hebben geleid tot onbedoelde gevolgen in de vorm van bureaucratische macht, corruptie en controle over het economisch beleid.

In hoofdstuk 3 wordt verdere aandacht besteed aan de theorie van de organisatorische inprenting en wordt de vraag gesteld op welke manier organisatorische inprenting van invloed is op de keuzen van bureaucraten op microniveau. Een rationeel keuzemodel laat zien hoe de invoering van status quo/inprenting de beleidskeuzen van bureaucraten beïnvloedt. Ze kunnen gedwongen zijn om vast te houden aan initiële beleidskeuzen, wat tot permanente inefficiënties kan leiden. De conclusie die in dit hoofdstuk wordt bereikt is dat zodra een bureaucratie ingeprente kenmerken krijgt toebedeeld, de krachten van inertie en institutionalisering zorgen voor beleidsstarheid/een status quo bias in het besluitvormingsproces van de bureaucraat.

In hoofdstuk 4 wordt het tweede onderzoekstraject gebruikt om dieper in te gaan op de keuzen van bureaucraten. Hierbij wordt uitgegaan van de theorie van de identiteitsrendabiliteit (*identity economics*) en het begrip situatie-specifieke normen toegepast. In dit hoofdstuk worden de blauwdrukken of scripts behandeld die door bureaucraten worden geïnternaliseerd en die hen vertellen hoe zich te gedragen in een specifieke situatie. Uit de analyse blijkt dat bureaucraten in een speltheoretische context voordeel behalen door gedrag te vertonen dat in overeenstemming is met de gevestigde identiteit en nadelige gevolgen ondervinden als hun gedrag afwijkt van datgene wat door de identiteit wordt voorgeschreven.

Het afsluitende hoofdstuk biedt een overzicht van relevante beleidsinzichten. De analyses van op inertiaële en identiteitsgestuurde voorkeuren gebaseerde keuzen geven aan dat veel bekende afwijkingen in het gedrag van bureaucraten het beste kunnen worden uitgelegd aan de hand van contextuele factoren. Deze factoren kunnen ofwel bijdragen aan de totstandkoming van sociaal optimale keuzen, ofwel beleidskeuzen forceren die vanuit een welzijns oogpunt niet optimaal zijn. Bijgevolg zijn beleidsinterventies wellicht noodzakelijk om bureaucraten in staat te stellen hun keuzen te veranderen, met name wanneer deze factoren het maken van een optimale keuze verhinderen. Als deze factoren tot optimale keuzen leiden is er vanzelfsprekend geen noodzaak voor beleidsinterventies. De nadruk zou dan moeten liggen op het stroomlijnen van het systeem, zodat bureaucraten overeenkomstig hun organisatorische context kunnen handelen. Dit laatste hoofdstuk bevat de bevindingen van dit proefschrift, wijst op de beperkingen en geeft suggesties voor toekomstig (vervolg)onderzoek.



## Curriculum vitae

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Short bio	
<p>I was born and raised in Lahore, Pakistan. Following my secondary school, I studied Economics first in Lahore and later in Islamabad. I joined EDLE to pursue PhD in Law and Economics. Throughout this time, I have enjoyed the rich academic environment in European universities and working on topics in law, economics and political science. During my PhD I have developed research interests in institutional economics, economics of regulations and political economy focusing in particular on interdisciplinary approaches to analyze political economy questions.</p>	
Education	
PhD student in Law and Economics (University of Bologna, University of Hamburg and Erasmus University Rotterdam)	2013-2017
M.Phil. in Economics awarded by Pakistan Institute of Development Economics, Islamabad, Pakistan	2010-2013
Masters in Economics awarded by Quaid-e-Azam University Islamabad, Pakistan	2008-2010
Work experience	
Acting Assistant Professor at Lahore School of Economics	2017
Prizes and awards	
Centennial Center Visiting Scholar, American Political Science Association Washington Dc	2016
Erasmus Mundus Scholarship	2013-2016





## EDLE PhD Portfolio

Name PhD student	:	Shaheen Naseer
PhD-period	:	2013 – 2017
Promoters	:	Prof. Klaus Heine
	:	Prof. Jan Schnellenbach

## PhD training

<i>Bologna courses</i>	<i>year</i>
Introduction to the Italian Legal System	2013
Game Theory and the Law	2013
Economic Analysis of Law	2013
Behavioral L&E I - Game Theory	2013
Behavioral L&E II – Enforcement Mechanism	2014
Experimental L&E	2014
European Securities and Company Law	2014
European Competition Law and Intellectual Property Rights	2014
<i>Specific courses</i>	<i>year</i>
Seminar ‘How to write a PhD’	2013
Academic Writing Skills for PhD Students (Rotterdam)	2014
Subsidies, Regulation, Procurement, and Consumer Information in WTO Law: Economic and Legal Concepts	2014
Introduction to German Law	2014
The Economics of Law Enforcement	2014
Introduction to the European Legal System	2014
Seminar Series ‘Empirical Legal Studies’	2015
<i>Seminars and workshops</i>	<i>year</i>
Bologna November Seminar (attendance)	2013
BACT Seminar Series (attendance)	2015/2016
EGSL Lunch Seminars (attendance)	2015/2016
Joint Seminar ‘The Future of Law and Economics’ (attendance)	2015
Rotterdam Fall Seminar Series (peer feedback)	2014
Rotterdam Winter Seminar Series (peer feedback)	2015
<i>Presentations</i>	<i>year</i>
Bologna March Seminar	2014
Hamburg June Seminar	2014
Rotterdam Fall Seminar Series	2014
Rotterdam Winter Seminar Series	2015
Bologna November Seminar	2015

Joint Seminar ‘The Future of Law and Economics’	2016
Workshop on Organizational Behavior and Legal Development Bournemouth University, UK	2014
European Group of Organizational Studies Annual Meeting Greece, Athens	2015
European Public Choice Society Annual Meeting Freiburg, Germany	2016
Sociological Association Annual Meeting Seattle, Washington State, USA	2016
American Political Science Association Annual Meeting Philedhalipia , Pennsylvania USA	2016
European Association of Law and Economics, Annual Meeting Bologna Italy	2016
International Conference on “The Political Economy of Democracy and Dictatorship” University of Münster, Germany	2017
The Verein für Socialpolitik Annual Meeting	2017
<i>Visiting Scholar</i>	<i>year</i>
Centennial Center Visiting Scholar at The American Political Science Association (Washington Dc)	2016
<i>Teaching</i>	<i>year</i>
History of Economic Thought (Lahore School of Economic)	2017
Tutorial on Micro Economics (PIDE)	2013
Tutorial on Mathematical Economics (PIDE)	2013
<i>Membership</i>	
American Political Science Association	Since 2016
American Sociological Association	Since 2016
European Association of Law and Economics	Since 2015
European Public Choice Society	Since 2015
European Group of Organizational Studies	Since 2015
The Verein für Socialpolitik	Since 2017