

Cognitive Psychology and Optimal Government Design

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COGNITIVE PSYCHOLOGY AND OPTIMAL GOVERNMENT DESIGN

Jeffrey J. Rachlinski & Cynthia R. Farina†

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INTRODUCTION

Good government must avoid bad decisions. Because contemporary governments tend to undertake an ambitious range of social and economic regulation, they can do tremendous damage by adopting wasteful programs. Even casual observation reveals that some political systems avoid improvident public policy choices more effectively than others. Identifying institutional structures and processes that chronically produce bad decisions would both help explain why some regulatory regimes succeed where others fail, and illuminate useful reforms.

Over the last twenty years, the contemporary American administrative state has become acutely self-conscious about the nature and extent of governmental policy failure. Commentators both in the academy and in public circles identify a variety of ill-advised government programs, including ones that: achieve publicly beneficial outcomes, but at unnecessarily inflated cost;¹ aim for one outcome and in fact produce the opposite one;² relentlessly pursue relatively trivial problems while ignoring far more substantial hazards;³ and serve primarily to benefit discrete groups with no credible distributive-justice claim to publicly funded beneficence.⁴ There may be good reason to question whether the "problem" of regulatory failure is as deep and

¹ See ROBERT W. HAHN, REGULATORY REFORM: ASSESSING THE GOVERNMENT'S NUMBERS 14-23 (AEI-Brookings Joint Ctr. for Regulatory Studies, Working Paper No. 99-6, 1999), available at http://www.aei.brookings.org/publications/working/working_99_06.pdf.

² See Cass R. Sunstein, *Paradoxes of the Regulatory State*, 57 U. CHI. L. REV. 407 (1990); Robert A. Hillman, *Legal Backfires* (May 24, 2001) (unpublished manuscript, on file with Jeffrey Rachlinski).

³ See Cass R. Sunstein, *Congress, Constitutional Moments, and the Cost-Benefit State*, 48 STAN. L. REV. 247, 257-60 (1996).

⁴ See CASS R. SUNSTEIN, AFTER THE RIGHTS REVOLUTION: RECONCEIVING THE REGULATORY STATE 84-86 (1990); DENNIS C. MUELLER, PUBLIC CHOICE II 229-44 (1989); Lisa Schultz Bressman, *Disciplining Delegation After Whitman v. American Trucking Ass'ns*, 87 CORNELL L. REV. 452, 481-82 (2002).

pervasive as some critics contend,⁵ but virtually everyone agrees that some appreciable segment of regulatory policy is socially counter-productive. Moreover, the concern that government frequently does more harm than good resonates strongly with many “average” Americans.⁶ Consequently, a search for the causes of governmental failure often dominates public and academic discourse on the modern administrative state.

Many scholars and reformers identify human motivation as the principal source of bad public policy decisions.⁷ They import from neoclassical economics the utility-maximizing rational man, and construct a model in which private actors engage in self-serving lobbying efforts to persuade similarly self-serving government officials to enact and execute policies that advance individual self-interest without regard to collective cost.⁸ Consequently, it is no surprise that public programs do not reliably serve social goals. This school of thought is generally referred to in legal scholarship as public choice theory.⁹

For some public choice theorists, government is so suffused with self-interested behavior that it is inescapably rotten to the core.¹⁰ Beginning from the premise that human actors are self-interested, these scholars reach the conclusion that the only good government is less government. Under this view, bad public policy decisions can be

⁵ See DANIEL A. FARBER & PHILIP P. FRICKEY, *LAW AND PUBLIC CHOICE: A CRITICAL INTRODUCTION* 21–33 (1991); JERRY L. MASHAW, *GREED, CHAOS, AND GOVERNANCE: USING PUBLIC CHOICE TO IMPROVE PUBLIC LAW* 23–25 (1997); Lisa Heinzerling, *Regulatory Costs of Mythic Proportions*, 107 *YALE L.J.* 1981 (1998); Lisa Heinzerling & Frank Ackerman, *The Humbugs of the Anti-Regulatory Movement*, 87 *CORNELL L. REV.* 648 (2001); see also Sunstein, *supra* note 2, at 408–09 (arguing that empirical assessments of the performance of the regulatory state are primitive and inconclusive).

⁶ See, e.g., PHILLIP K. HOWARD, *THE DEATH OF COMMON SENSE: HOW LAW IS SUFFOCATING AMERICA* (1994); cf. *infra* note 146 and accompanying text (discussing Americans’ conflicting desire for, and suspicion of, government intervention).

⁷ See FARBER & FRICKEY, *supra* note 5, at 21–33.

⁸ See *id.* at 22–23.

⁹ The phrase “public choice theory” is a contentious label. Among political scientists and economists, it may be used as synonymous (in whole or part) with styles of analysis that go under the names of “rational choice theory” or “positive political theory.” Not all of those styles of analysis employ the motivational assumption (i.e., maximization of material self-interest) described in the text. A prime example is the family of critiques of collective decisionmaking based on the work of Kenneth Arrow. See generally MUELLER, *supra* note 4, at 384–407 (reviewing Arrow’s Theorem and related supporting and critical work). These critiques assess the output of democratic processes without any assumptions about the public-regardingness of the participants’ preferences. See *id.*

In legal scholarship, however, the dominant model used to critique regulatory government has prominently featured the rational, self-interest-maximizing actor. This sort of analysis, often associated with the Chicago school of economics, is almost invariably what legal scholars think of as public choice theory—although with the work of scholars like Symposium participant David Spence, the meaning of “public choice theory” even in legal scholarship may be expanding. See *infra* note 65. For further discussion of the motivational assumption in public choice theory, see *infra* text accompanying notes 62–67.

¹⁰ See FARBER & FRICKEY, *supra* note 5, at 16.

avoided only by shrinking the quantum of pervertable public power through radical deregulation, creating a minimalist night-watchman state.¹¹

Although this view has influential proponents in law and legal scholarship,¹² most scholars who employ public choice analysis have a somewhat more optimistic perspective on government. They believe that, at least in some circumstances, it is possible to co-opt individually opportunistic behavior, so that self-interest-maximizing actors further the collective good despite themselves.¹³ For these theorists, the goal of those who design government institutions should be to discover when and how individual self-serving desires can be channeled toward public-serving ends.¹⁴ Whenever such channeling cannot be accomplished, institutional design should concentrate on curbing the damage that self-regarding public and private actors will wreak with government power.¹⁵ By thus offering both a descriptive and a normative theory of government, public choice responds powerfully to the need to understand why regulatory policymaking and execution go wrong.

Nevertheless, public choice theory has both normative and descriptive problems. Many observers—including not only academic commentators but also people who have held positions in government—resist the public choice account as overly cynical and simplistic.¹⁶ They insist that those who serve in administrative agencies, the White House, the courts, and Congress are often motivated by a sincere desire to pursue some conception of the public good.¹⁷ Critics

¹¹ See, e.g., FRED S. MCCHESENEY, *MONEY FOR NOTHING: POLITICIANS, RENT EXTRACTION, AND POLITICAL EXTORTION* 170 (1997) ("The one unambiguous solution for reducing rent extraction is reducing the size of the state itself and its power to threaten, expropriate, and transfer."); MUELLER, *supra* note 4, at 245 ("[T]he best and simplest way to avoid the rent-seeking problem is to avoid establishing the institutions that create rents, that is, the regulations and regulatory agencies that lead to rent seeking.").

¹² See, e.g., MCCHESENEY, *supra* note 11; Richard A. Epstein, *The Proper Scope of the Commerce Power*, 73 VA. L. REV. 1387 (1987); Richard A. Epstein, *Toward a Revitalization of the Contract Clause*, 51 U. CHI. L. REV. 703 (1984).

¹³ See *infra* notes 90–94 and accompanying text; see also ROBERT D. COOTER, *THE STRATEGIC CONSTITUTION* 3–5 (2000) (arguing that constitutions are best viewed as ways of channeling private interest); FARBER & FRICKEY, *supra* note 5, at 22 (discussing same in the context of legislation).

¹⁴ See FARBER & FRICKEY, *supra* note 5, at 11.

¹⁵ See Jonathan R. Macey, *Promoting Public-Regarding Legislation Through Statutory Interpretation: An Interest Group Model*, 86 COLUM. L. REV. 223, 225–27 (1986).

¹⁶ See, e.g., DONALD P. GREEN & IAN SHAPIRO, *PATHOLOGIES OF RATIONAL CHOICE THEORY: A CRITIQUE OF APPLICATIONS IN POLITICAL SCIENCE* 47–71 (1994); RICHARD L. HALL, *PARTICIPATION IN CONGRESS* 157–61 (1996); Mark Kelman, *On Democracy-Bashing: A Skeptical Look at the Theoretical and "Empirical" Practice of the Public Choice Movement*, 74 VA. L. REV. 199, 217–23 (1988); Abner J. Mikva, *Foreword*, 74 VA. L. REV. 167 (1988); see also MASHAW, *supra* note 5, at 25–27 (reviewing arguments); FARBER & FRICKEY, *supra* note 5, at 33 (same).

¹⁷ See Mikva, *supra* note 16, at 167.

can point to a number of public-spirited governmental programs, typically in the environmental and civil rights areas, that are difficult to explain using public choice premises.¹⁸ Furthermore, several empirical studies suggest that public officials often make choices that are more consistent with their ideological beliefs than their self-interests.¹⁹ Finally, both political philosophers and public administrators worry that widespread devotion to a cynical theory of government can become a self-fulfilling prophesy.²⁰ If the dominant cultural story is that government primarily serves private ends rather than the public good, then citizens have no reason to regard their government as anything other than illegitimate and contemptible, while public officials have no reason to regard their time in office as anything other than an opportunity to feather their own nests.

Still, it takes a theory to beat a theory.²¹ The notion that bad government decisions happen randomly is both descriptively unlikely and theoretically unacceptable. Public choice offers a parsimonious theory that, its proponents believe, explains and predicts the situations that lead to such failure. Its ambitious explanatory agenda has clearly contributed to its influence on law. What can those who seek a less relentlessly cynical theory of human civic behavior offer as an alternative to account for the admittedly bad choices that governments sometimes make?

We contend that bad public policy can often be traced to flaws in human judgment and choice among governmental actors.²² Aligning and channeling self-interest toward pursuing the public interest will not guarantee good policy outcomes. Regulatory programs that arise from both good and ill intentions often fail to accomplish their intended goals. Governmental actors can make mistaken choices that,

¹⁸ See, e.g., Daniel A. Farber, *Politics and Procedure in Environmental Law*, 8 J.L. ECON. & ORG. 59 (1992); Richard L. Revesz, *The Race to the Bottom and Federal Environmental Regulation: A Response to Critics*, 82 MINN. L. REV. 535, 542–43 (1997); Peter H. Schuck, *Against (and for) Madison: An Essay in Praise of Factions*, 15 YALE L. & POL'Y REV. 553, 565–66 (1997); see also MASHAW, *supra* note 5, at 33–34 (discussing such programs).

¹⁹ See FARBER & FRICKEY, *supra* note 5, at 24–25, 28–33 (reviewing this evidence).

²⁰ See *infra* text accompanying notes 213–17.

²¹ As Jon Macey observed in a critique of Jerry Mashaw's *Greed, Chaos, & Governance*. In the social sciences, theories survive until a competing theory more accurately rationalizes the real-world phenomena the theories were designed to describe.

From this perspective, it is difficult to know what to make of Professor Mashaw's plea not to take public choice too seriously. He offers no alternative theory with which to replace the doctrine he criticizes.

Jonathan R. Macey, *Public Choice and the Legal Academy*, 86 GEO. L.J. 1075, 1076 (1998) (reviewing MASHAW, *supra* note 5).

²² Others have traced bad policy to cognitive errors made by the public. See, e.g., Cass R. Sunstein, *Cognition and Cost-Benefit Analysis*, 29 J. LEGAL STUD. 1059, 1060–61 (2000) (discussing the relationship between cognitive errors and regulatory mistakes).

despite the best of intentions, produce improvident policy.²³ Essentially, we argue that self-interest is not the only, and perhaps not even the primary, reason that good government programs go bad. Rather, we propose, poor decisions are often the result of fallibility rather than culpability.

Fallibility, however, is not a sufficient foundation on which to construct a theory of government failure unless mistaken judgment can be reliably modeled and, at least in broad patterns, predicted.²⁴ We begin such a process here. Relying on insights from cognitive psychology, we identify categories of errors that regularly inhere in human decisionmaking. Psychologists have found that identifiable circumstances can lead people to make bad choices. To the extent that the structures and processes of government put decisionmakers in such circumstances, the odds of bad policy increase. Wasteful government, we contend, often occurs because people with good motives are in positions that facilitate, or at least fail to counteract, bad judgment. As a corollary, good public policy is most likely to result when governmental actors operate within decisionmaking institutions structured to reduce the incidence of judgmental errors.

The public choice model of government is therefore incomplete. A key lesson of cognitive psychology is that even people with good motives tend to make bad choices in certain, predictable circumstances. Identifying those circumstances is at least as significant to diagnosing public policy failures as is focusing on the motives of key regulatory actors. Attending to the influence of cognitive errors facilitates an understanding of why some governmental structures are generally successful while others persistently fail. Without such attention to the institutions and practices of regulatory decisionmaking, even programs conceived with the purest motives and executed by the most selfless and professional staffs may be plagued by inefficient and counterproductive outcomes.

This Article articulates and defends our thesis. First, we outline the cognitive psychological theory of human decisionmaking and its applicability to governmental actors. Part II sketches out and contrasts the public choice model of governmental error with a psychological model. In Part III, we discuss both the descriptive and normative implications of the two models. Part IV summarizes the

²³ Our argument necessarily implies that government programs motivated by socially wasteful goals may also fail to accomplish their desired ends, making them doubly flawed.

²⁴ Some scholars have made efforts in this regard in the particular area of comparing the performance of courts and agencies as risk regulators. See, e.g., Clayton P. Gillette & James E. Krier, *Risk, Courts, and Agencies*, 138 U. PA. L. REV. 1027 (1990); Peter Huber, *Safety and the Second Best: The Hazards of Public Risk Management in the Courts*, 85 COLUM. L. REV. 277 (1985); Roger G. Noll & James E. Krier, *Some Implications of Cognitive Psychology for Risk Regulation*, 19 J. LEGAL STUD. 747 (1990).

relative merits of the contrasting theories. Finally, we offer some concluding thoughts on why the choice of model for government error matters.

I

HUMAN JUDGMENT AND CHOICE

A. The Basic Cognitive Model

Over the past thirty years, cognitive psychologists have created a well-developed model of human judgment and choice.²⁵ Basic principles of this model have begun to inform legal scholarship.²⁶ Those principles are well described by others, and only a brief review is needed here.

The core premise of cognitive psychological theory is an understanding that the human brain is a limited information processor that cannot possibly manage successfully all of the stimuli crossing its perceptual threshold.²⁷ The complexity of many tasks exceeds the brain's capacity to process information, and as a result decisionmakers are bound to make mistakes.²⁸ Nevertheless, people effectively negotiate their environments most of the time.²⁹ To perform as well as they do in day-to-day living, humans must allocate their scarce cognitive resources efficiently. They must ignore information that is not important, and attend closely to information that is. Good decisionmaking by government officials similarly requires learning to allocate scarce cognitive resources well.

Psychologists have found that people rely on two primary strategies to make the most of their cognitive abilities. First, they rely on mental shortcuts, which psychologists call heuristics.³⁰ These shortcuts consist largely of simple rules of thumb that facilitate rapid, almost reflexive, information processing. Second, people rely on organizing principles, which psychologists call schema, to process information.³¹ These schema consist of a scripted set of default information and organizational themes that help people focus on the

²⁵ See Jeffrey J. Rachlinski, *The "New" Law and Psychology: A Reply to Critics, Skeptics, and Cautious Supporters*, 85 CORNELL L. REV. 739, 743-45 (2000).

²⁶ See BEHAVIORAL LAW AND ECONOMICS (Cass R. Sunstein ed., 2000).

²⁷ See Daniel Kahneman & Amos Tversky, *On the Reality of Cognitive Illusions*, 103 PSYCHOL. REV. 582, 583 (1996).

²⁸ *Id.*

²⁹ See generally GERD GIGERENZER ET AL., *SIMPLE HEURISTICS THAT MAKE US SMART* (1999) (discussing the advantages of relying on heuristics).

³⁰ See Amos Tversky & Daniel Kahneman, *Judgment Under Uncertainty: Heuristics and Biases*, 185 SCIENCE (n.s.) 1124, 1124 (1974).

³¹ SUSAN T. FISKE & SHELLEY E. TAYLOR, *SOCIAL COGNITION* 97-99, 136-39 (2d ed. 1991).

information most likely to be relevant, thereby allowing them to ignore information likely to be irrelevant.

Reliance on heuristics and schema allows people to process an amazing array of complex stimuli efficiently. These devices serve people well most of the time, but can lead to systematic errors in judgment, which psychologists often refer to as "cognitive illusions."³² For example, when making judgments about the frequency of events, people often rely on the ease with which an instance of a target event can be called to mind—a process that psychologists call the "availability heuristic."³³ Although useful, the availability heuristic can also systematically skew judgment in circumstances in which ease of recollection does not correspond to actual frequency.³⁴ As a consequence of relying on this heuristic, people often overestimate the frequency of disasters, such as airplane crashes, that tend to get extra attention from the news media.³⁵

Like heuristics, cognitive schema facilitate good judgment most of the time, but can lead people astray.³⁶ For example, in a fancy restaurant when a well-dressed person walks over to the table with leather-bound folders, most people will, without thinking, recognize that person as the waiter coming to hand out menus. Prior experience with the setting conveys the expectations and cues that facilitate this conclusion without further processing, thereby allowing people to devote their limited cognitive resources to other tasks,³⁷ such as continuing their conversation with their dinner companion. Once again, however, reliance on schema can lead to problems; in fact, psychologists attribute racial prejudice to the brain's reliance on schema.³⁸

Furthermore, schema can be misleading. For example, the class of phenomena that cognitive psychologists call "framing effects" can

³² See Kahneman & Tversky, *supra* note 27, at 584. The reference to illusions is meant as a direct analogy to perceptual illusions, which arise from patterned ways of processing visual information: Just as a brain gets used to the presence of certain cues to depth perception, and thereby can get fooled by some arrangements of these cues, so it can be fooled by cognitive illusions. See *id.* at 583–84; see also Tversky & Kahneman, *supra* note 30, at 1124 ("In general, these heuristics are quite useful, but sometimes they lead to severe and systematic errors.")

³³ Tversky & Kahneman, *supra*, note 30, at 1127.

³⁴ *Id.* at 1127–28.

³⁵ See Paul Slovic et al., *Facts Versus Fears: Understanding Perceived Risk*, in JUDGMENT UNDER UNCERTAINTY: HEURISTICS AND BIASES 463, 467–68 (Daniel Kahneman et al. eds., 1982); see also Timur Kuran & Cass R. Sunstein, *Availability Cascades and Risk Regulation*, 51 STAN. L. REV. 683, 706–07 (1999) (arguing that this heuristic creates errors in the general public's perception of risk).

³⁶ See FISKE & TAYLOR, *supra* note 31, at 97.

³⁷ *Id.* at 97, 119.

³⁸ See *id.* at 132–33.

be attributed to schema.³⁹ Framing effects are the tendency to treat potential gains differently from potential losses.⁴⁰ Notably, people make risk-averse decisions in the face of potential gains and risk-seeking decisions in the face of potential losses.⁴¹ These effects result from the tendency to associate different problem-solving strategies for gains than for losses.⁴² Specifically, people associate risks involving gains with risk-averse decisionmaking strategies.⁴³ Because “a bird in the hand is worth two in the bush,” people prefer a certain receipt of fifty dollars to a fifty-percent chance of winning one hundred dollars. By contrast, people are used to struggling to avoid any losses, and so find themselves attracted to gambles that involve the possibility of losing nothing: People prefer a fifty-percent chance of losing one hundred dollars to a certain loss of fifty dollars because the first prospect includes the possibility of losing nothing. The structure of the problem invokes a different set of associations and imagery when described as involving gains than when described as involving losses, even though most decisions can be characterized in either way.

For example, consider the well-known “Asian flu vaccine” problem that Tversky and Kahneman used to illustrate framing effects.⁴⁴ Tversky and Kahneman asked people to suppose that the United States “is preparing for the outbreak of an unusual Asian disease, which is expected to kill 600 people.” They then ask people to choose between two programs “to combat the disease,” one of which saves two hundred people for sure and the other has a one-third chance of saving all six hundred people (and a two-thirds chance of saving none). When the problem presents the choices as lives saved, people tend to prefer the sure option; when it presents the choices as lives lost, people tend to prefer the riskier option. Although either choice is normatively defensible, changing preferences with frame is not, inasmuch as the frame is entirely arbitrary. The gains frame highlights the fact that the less risky option saves two hundred people, making it seem like the sensible choice. By contrast, the loss frame highlights the fact

³⁹ See Daniel Kahneman, *Preface to CHOICES, VALUES, AND FRAMES*, at ix, xiii–xvi (Daniel Kahneman & Amos Tversky eds., 2000).

⁴⁰ See *id.* at xiv.

⁴¹ Daniel Kahneman & Amos Tversky, *Choices, Values, and Frames*, 39 *AM. PSYCHOLOGIST* 341, 342–44 (1984); Daniel Kahneman & Amos Tversky, *Prospect Theory: An Analysis of Decision Under Risk*, 47 *ECONOMETRICA* 263, 268–69 (1979); Amos Tversky & Daniel Kahneman, *Rational Choice and the Framing of Decisions*, 59 *J. Bus.* S251, S257–S260 (1986); Amos Tversky & Daniel Kahneman, *The Framing of Decisions and the Psychology of Choice*, 211 *SCIENCE* (n.s.) 453, 453–55 (1981) [hereinafter Tversky & Kahneman, *The Psychology of Choice*].

⁴² Tversky & Kahneman, *The Psychology of Choice*, *supra* note 41, at 454.

⁴³ *Id.* at 453.

⁴⁴ The example is taken from Tversky & Kahneman, *The Psychology of Choice*, *supra* note 41, at 453.

that the less risky option results in four hundred deaths, making it seem unattractive. In short, the different descriptions lead people to think differently about the problem.

Thus, although heuristics and schema are essential to negotiating an information-saturated environment, they come at the cost of systematic errors in judgment. People sometimes use heuristics that are inappropriate for the task at hand. Relying on cognitive availability to assess the likelihood of a disaster, for example, leads to an inaccurate assessment of the underlying threat. Similarly, people are often unaware that a particular schema is affecting their assessment of a problem. Failing to recognize that a decision can be characterized as a gain or as a loss, for example, limits the way in which people think about risky prospects.

B. The Role of Expertise in Decisionmaking

Governments, of course, do not rely exclusively on ordinary, inexperienced decisionmakers; they rely, to a great extent, on experts. Consequently, determining the relative strengths and weaknesses of lay and expert decisionmaking is fundamental to designing processes that minimize the damage cognitive limitations will wreak on a society's ability to govern itself wisely. Indeed, the choice between expert and lay decisionmaking may be the most crucial design decision to be made in a government engaged in extensive social and economic regulation.

Experts clearly have advantages over laypersons in decisionmaking. By virtue of their training and experience, they obviously have more knowledge. By itself, however, knowledge is not enough; in fact, extra information feeds certain prevalent cognitive illusions.⁴⁵ For example, in one study, expert analysts estimated that the likelihood of "a dramatic increase in oil prices and a 30% drop in the consumption of oil in the United States" was greater than the likelihood of "a 30% drop in the consumption of oil in the United States."⁴⁶ The greater detail in the former event made it seem more likely (an example of the phenomenon that psychologists call the "representativeness heuristic").⁴⁷

If experts rely on heuristics that lead them astray, the extra knowledge they bring to a problem may become useless, even counterproductive. Thus, at least as important as knowledge is an awareness of judgmental pitfalls that are common to the types of

⁴⁵ Colin Camerer et al., *The Curse of Knowledge in Economic Settings: An Experimental Analysis*, 97 J. POL. ECON. 1232 (1989).

⁴⁶ See Amos Tversky & Daniel Kahneman, *Extensional Versus Intuitive Reasoning: The Conjunction Fallacy in Probability Judgment*, 90 PSYCHOL. REV. 293, 308 (1983).

⁴⁷ See *id.*

problems experts encounter. Only if experts also develop decision-making competence to complement their knowledge can they reliably make better decisions than lay persons.

Experts have two opportunities for developing such decisionmaking competence that are typically unavailable to lay decisionmakers: experience and training. By repeatedly making the same types of decisions, experts encounter the same problems and often (although not always) obtain useful feedback on their mistakes. Experience accompanied by feedback allows experts to identify situations in which they are using inappropriate heuristics or are trapped by misleading schema. Thus, experts can develop different ways of thinking about frequently encountered problems when previous ways of thinking are not producing desirable results.

Furthermore, experience with decisionmaking, even without good feedback, can be helpful. Psychologists have noted that when people perceive a problem as unique—a one-of-a-kind judgment call—they tend to rely on intuition and mental shortcuts that lead them astray.⁴⁸ For example, psychologists have found that people often express an overconfidence in their ability to answer trivia questions; when people say that they are 95% confident in their answer to a question, they are generally right about 85% of the time.⁴⁹ At the same time, however, people have a fairly accurate sense of how many questions they can answer correctly in a set of questions.⁵⁰ Determining one's confidence in ability to answer a trivia question as an isolated instance increases vulnerability to cognitive error, whereas seeing it as part of a set leads to an accurate assessment. Seeing a problem as one of a type of problems generally leads to less reliance on misleading thought processes and more accurate decisionmaking.

Experience thus facilitates what psychologists call "stepping outside" of a decisionmaking problem to assess decisionmaking strategies.⁵¹ Experienced decisionmakers have had more of an opportunity to evaluate *how* they make decisions. With feedback, they can determine when the mental strategies upon which they rely produce positive results. Even without feedback, experienced decisionmakers acquire the ability to see commonalities across problems and to recognize new relationships between the characteristics of a problem and a sensible choice.

⁴⁸ See Daniel Kahneman & Dan Lovallo, *Timid Choices and Bold Forecasts: A Cognitive Perspective on Risk Taking*, 39 MGMT. SCI. 17, 23 (1993).

⁴⁹ See Slovic et al., *supra* note 35, at 473.

⁵⁰ See Gerd Gigerenzer, *How to Make Cognitive Illusions Disappear: Beyond "Heuristics and Biases,"* 2 EUR. REV. SOC. PSYCHOL. 83 (1991) (reviewing this research).

⁵¹ See Kahneman & Lovallo, *supra* note 48, at 23.

Furthermore, experts have training in how to make decisions. Over time, professions tend to develop adaptations to cognitive limitations that impair professional judgment.⁵² For example, a number of cognitive biases make it difficult for civil engineers to identify precisely the necessary degree of structural support for a building.⁵³ Nevertheless, very few buildings collapse as a result of lack of structural support. The reason is that norms of good civil engineering practice call for building in much more structural support than appears necessary, as a safety precaution.⁵⁴ Without even identifying cognitive limitations as the problem, civil engineers have managed to develop an adaptation that keeps those limitations from producing disastrous consequences.

Even with these advantages over lay decisionmakers, however, experts can still fall prey to illusions of judgment. The psychological literature is replete with case studies of erroneous or foolish expert judgments.⁵⁵ Feedback that experts receive may be biased, or subject to biased interpretation, thereby making it difficult for individuals and their professions to learn from past mistakes.⁵⁶

More significantly, expertise introduces its own biases. Notably, experts tend to be overconfident about their decisions. Experts are "often wrong but rarely in doubt."⁵⁷ People in general tend to overestimate their own abilities in areas about which they believe themselves to have some greater-than-average knowledge. This tendency is more pronounced in experts, who also tend to have great faith that their profession has identified most of the problems they are likely to face and equipped them with the ability to surmount these problems. Moreover, experts may myopically focus on issues within their area of expertise and thereby fail to recognize that a decision would benefit from accessing other bodies of knowledge or ways of thinking.⁵⁸ Expertise produces a useful set of schema to guide decisionmaking, but like all schema, they limit a decisionmaker's ability to think differently about a problem and to recognize the limitations inherent in the schema. In short, the mental shortcuts that experts use produce more accurate results than those upon which laypersons rely, but experts are less likely to question whether they have made a good decision.

⁵² See Chip Heath et al., *Cognitive Repairs: How Organizational Practices Can Compensate for Individual Shortcomings*, 20 RES. ORGANIZATIONAL BEHAV. 1, 2-3 (1998).

⁵³ *Id.* at 4.

⁵⁴ *Id.*

⁵⁵ See Slovic et al., *supra* note 35, at 475-78.

⁵⁶ See RICHARD NISBETT & LEE ROSS, HUMAN INFERENCE: STRATEGIES AND SHORTCOMINGS OF SOCIAL JUDGMENT 97-101 (1980).

⁵⁷ Dale Griffin & Amos Tversky, *The Weighing of Evidence and the Determinants of Confidence*, 24 COGNITIVE PSYCHOL. 411, 412 (1992).

⁵⁸ See Slovic et al., *supra* note 35, at 477.

Thus, although experts often have knowledge, experience, and training that protect them from some serious errors that plague the lay decisionmaker, they are still predictably fallible. Experts in many situations do not receive reliable feedback, which inhibits their opportunity to learn from experience. Additionally, they tend to be overconfident in their judgments, placing too much faith in their abilities. Therefore, expertise can have similar consequences to heuristics in laypersons: clearly useful, but dangerous if overused.

C. The Role of Institutional Design in Avoiding Decisionmaking Traps

When decisions are made in an organizational setting—the typical practice in modern regulatory government—institutional design can counter the effect of cognitive limitations. Of particular interest to regulatory policymaking, organizations can be structured to optimize the benefits and costs of expert decisionmaking.

One such structural choice involves putting experts with certain kinds of knowledge and experience in charge of some aspects of the decision, and different kinds of experts in charge of other aspects. For example, banks separate the people who make decisions on primary loans from those who work with loans in default.⁵⁹ The first group tends to develop social connections and cognitive attachments to the borrower that can cloud judgment about whether and when to foreclose. Indeed, psychologists have identified a strong tendency in businesspeople to throw good money after bad (“escalating commitment”).⁶⁰ By transferring the management of a loan from the initial lender to a workout specialist, banks avoid the error introduced by escalating commitment and obtain a fresh perspective on the questions whether, and how long, to give the borrower a chance to work through a difficult period.

Furthermore, a group of experts can be subjected to a set of ground rules for decisionmaking that reduce the effects of cognitive errors. For example, after suffering the consequences of poor decisionmaking by his national security team in the Bay of Pigs incident, President Kennedy redefined how his team would operate. In the Bay of Pigs invasion, Kennedy’s advisors had quickly coalesced around an initial strategy towards Cuba, without considering alternatives.⁶¹ Once they convinced themselves that this strategy was sound, they became

⁵⁹ 4 BAXTER DUNAWAY, *THE LAW OF DISTRESSED REAL ESTATE* § 33.06[5][a], at 33-59 (2001) (discussing separation of lending and workout groups in real estate loans).

⁶⁰ Barry M. Staw, *Knee-Deep in the Big Muddy: A Study of Escalating Commitment to a Chosen Course of Action*, 16 *ORGANIZATIONAL BEHAV. & HUM. PERFORMANCE* 27 (1976).

⁶¹ See IRVING L. JANIS, *GROUPTHINK: PSYCHOLOGICAL STUDIES OF POLICY DECISIONS AND FIASCOES* 139–42 (2d ed. 1982).

overconfident about its success, making wild assumptions about how the plan would operate. When the Cuban Missile Crisis arose, Kennedy arranged different procedural rules. He divided his decisionmakers into different groups of experts and appointed his brother as a "devil's advocate." This arrangement forced his advisors continually to critique and defend their assumptions and to consider creative alternative responses to the crisis.

D. Summary of the Psychological Model

The portrait psychologists paint of human judgment is one of constant effort to stretch limited cognitive resources. At an individual level, people develop heuristics to enable them to manage the stimuli they encounter; these heuristics serve them well, but lead to systematic errors. Experts have knowledge, training, and experience that enable them to identify situations in which they cannot trust ordinary heuristics, and to approach problems from a different perspective. These advantages can indeed produce better decisions than laypeople make, but can also lead to overconfidence and a failure adequately to consider alternatives beyond the boundaries of their expertise.

In light of this, a government that seeks to avoid bad decisions must be structured carefully to avoid predictable errors in judgment. The psychological model of judgment and choice provides both a normative and a positive framework for assessing public policymaking structures. Experts are essential to complex decisions, but must be relied upon for their knowledge while reined in for their confidence. To the extent that a policymaking structure relies on lay judgments that are likely to be erroneous, fails to provide experts with unbiased feedback to which they must attend, or allows expert overconfidence to go unchecked, it will produce poor decisions.

II

TWO MODELS OF GOVERNMENTAL ERROR

Against this background, it becomes possible to identify two contrasting accounts of why bad regulatory policy occurs: The (familiar) public choice model and the (novel) psychological model. As subpart A describes, public choice theorists worry that government decision-making is the product of self-interest: most immediately, the self-interest of the people who occupy public office; derivatively, the self-interest of the individuals and groups who can deliver votes, campaign contributions, and lucrative private-sector employment. The regulatory policy generated through such a system will further the collective good only by happy chance—or, perhaps, if extraordinarily acute institutional design can channel the energetic pursuit of self-interest to-

ward public-regarding goals and dissipate whatever self-serving energy cannot be so diverted.

Psychological theory generates a novel account of undesirable government decisionmaking. As subpart B explains, psychologists worry that cognitive limitations of the human brain tend to produce bad choices in precisely the sort of circumstances in which much regulatory policy is formulated. The goal of institutional design in this account is not to trick or defeat selfish human instinct but rather to correct, or at least minimize, flawed human judgment.

A. The Public Choice Model of Governmental Policy Failure

As others have noted,⁶² public choice is not a neatly unitary theory. Common to all analyses labeled “public choice” is the core concept, taken from economic thought, of instrumental rationality: The individual will order his behavior so as to maximize the likelihood of achieving his individually defined goals.⁶³ Some public choice theorists make no further motivational assumptions. Such accounts, usefully dubbed “thin-rational[ity]” models by John Ferejohn,⁶⁴ refuse to specify the kinds of goals the individual pursues. For these theorists—exemplified by the work of Symposium participant David Spence⁶⁵—the analysis can proceed without regard to whether individuals are motivated by self-interest, selflessness, or some shifting combination of the two. We do not consider here either the theoretical defensibility or prescriptive utility of such accounts.⁶⁶ Although thin-rationality accounts flourish in (and perhaps dominate) the contemporary public choice analyses of political scientists and economists,⁶⁷ they have been the exception rather than the norm in legal scholarship.

⁶² E.g., FARBER & FRICKEY, *supra* note 5, at 6, 12–13; GREEN & SHAPIRO, *supra* note 16, at 13–30; Jeffrey Friedman, *Introduction: Economic Approaches to Politics*, in *THE RATIONAL CHOICE CONTROVERSY: ECONOMIC MODELS OF POLITICS RECONSIDERED* 1, 1–2 (Jeffrey Friedman ed., 1996).

⁶³ See GREEN & SHAPIRO, *supra* note 16, at 14; MASHAW, *supra* note 5, at 11; Edward L. Rubin, *Public Choice, Phenomenology, and the Meaning of the Modern State: Keep the Bathwater, but Throw Out That Baby*, 87 CORNELL L. REV. 309, 313–14 (2002).

⁶⁴ John Ferejohn, *Rationality and Interpretation: Parliamentary Elections in Early Stuart England*, in *THE ECONOMIC APPROACH TO POLITICS: A CRITICAL REASSESSMENT OF THE THEORY OF RATIONAL ACTION* 279, 282 (Kristen Renwick Monroe ed., 1991); see also GREEN & SHAPIRO, *supra* note 16, at 17–18 (discussing Ferejohn’s models); Christopher H. Schroeder, *Rational Choice Versus Republican Moment—Explanations for Environmental Laws, 1969–73*, 9 DUKE ENVTL. L. & POL’Y F. 29, 39 (1998) (same).

⁶⁵ See David B. Spence, *A Public Choice Progressivism, Continued*, 87 CORNELL L. REV. 397 (2002); David B. Spence & Frank Cross, *A Public Choice Case for the Administrative State*, 89 GEO. L.J. 97 (2000).

⁶⁶ For such an assessment, see GREEN & SHAPIRO, *supra* note 16, at 18, 33–46 (methodological critique); Rubin, *supra* note 63 (epistemological critique).

⁶⁷ See William N. Eskridge, Jr. & John Ferejohn, *Structuring Lawmaking to Reduce Cognitive Bias: A Critical View*, 87 CORNELL L. REV. 616, 618–21 (2002); Terry M. Moe, *Cynicism and Political Theory*, 87 CORNELL L. REV. 362, 369 (2002). But see GREEN & SHAPIRO, *supra*

Here, we focus on what has been the paradigmatic public choice theory of legal analyses. This account adds to the assumption of instrumental rationality the further assumption that the goal of human actors is advancing individual material self-interest. Apparently—for the point is rarely discussed explicitly—there is a range of views about whether this motivational assumption of universal self-interest is a heuristic rather than an assertion of fact.⁶⁸ For present purposes, it makes no difference whether the public choice account rests on the descriptive conclusion that self-interest really is the exclusive human motivation, or on the prescriptive judgment that analysis of government institutions should proceed *as if* this were so.

1. Congress

The legislature is the governmental institution that historically has received most attention from economic theorists. In the public choice account, the primary goal of legislators is to maintain their position, i.e., to get reelected.⁶⁹ Ancillary objectives may include increasing the power of their office or achieving higher office.

To ensure reelection, the rational legislator will produce bills that transfer resources from the public fisc, or from some discrete group, to his electoral constituency.⁷⁰ Because the self-interest-maximizing voters back home will not be impressed by legislative results that benefit them only to the same extent as all (or most) other citizens, the rational legislator understands that he must deliver legislation that offers his constituents benefits relatively greater than those gained by all

note 16, at 19 ("Much of the [political science] rational choice literature rests on unambiguously thick-rational assumptions."); cf. Friedman, *supra* note 62, at 21 n.1 (arguing that many ostensibly thin-rationality economic analyses in fact slip into thick-rationality assumptions).

⁶⁸ See, e.g., MASHAW, *supra* note 5, at 25–26 (discussing, inter alia, Brennan and Buchanan's statement that "[w]e model man as a wealth maximizer, not because this model is necessarily the most descriptive empirically, but because we seek a set of rules that will work well independently of the behavioral postulates introduced" (quoting Geoffrey Brennan & James M. Buchanan, "Is Public Choice Immoral?" *The Case for the 'Nobel' Lie*, 74 VA. L. REV. 179, 188 (1988)). See generally GREEN & SHAPIRO, *supra* note 16, at 20–32 (comparing various theoretical approaches).

⁶⁹ See, e.g., DAVID R. MAYHEW, CONGRESS: THE ELECTORAL CONNECTION 121–22 (1974); Jonathan R. Macey, *Public Choice: The Theory of the Firm and the Theory of Market Exchange*, 74 CORNELL L. REV. 43, 46–49 (1988); William H. Riker & Barry R. Weingast, *Constitutional Regulation of Legislative Choice: The Political Consequences of Judicial Deference to Legislatures*, 74 VA. L. REV. 373, 396 (1988); Kenneth A. Shepsle, *Prospects for Formal Models of Legislatures*, 10 LEGIS. STUD. Q. 5, 12–13 (1985); Barbara Sinclair, *Purposive Behavior in the U.S. Congress: A Review Essay*, 8 LEGIS. STUD. Q. 117, 118 (1983). See generally FARBER & FRICKEY, *supra* note 5, at 21–24 (explaining the economic theory of legislation).

⁷⁰ See, e.g., Steven G. Calabresi, *Some Normative Arguments for the Unitary Executive*, 48 ARK. L. REV. 23, 34–36, 84–86 (1995); Macey, *supra* note 15, at 230–32; Sam Peltzman, *Constituent Interest and Congressional Voting*, 27 J.L. & ECON. 181, 192–206 (1984); Barry R. Weingast et al., *The Political Economy of Benefits and Costs: A Neoclassical Approach to Distributive Politics*, 89 J. POL. ECON. 642 (1981).

(or most) others. Similarly, he must resist legislation that would impose perceptible costs on his constituents to achieve widely shared benefits.

Even more important than the typical voter—who faces significant information costs in monitoring the legislator's actions, and for whom the act of voting per se is of problematic rationality—are interest groups.⁷¹ These groups can finance his reelection bid and, possibly, mobilize a bloc of voters by alerting them to the legislator's efforts on their behalf. He will procure the support of groups both by offering legislation that benefits them at the expense of competing groups or the public as a whole, and by threatening legislation that imposes costs on them for the benefit of competing groups or the public as a whole.

2. *The Courts*

Unlike the clear incentive structure of legislative behavior, judicial behavior has been more difficult for public choice to model.⁷² Many American judges—and, most important for regulatory government, all federal judges—face no significant risk of losing their office, or even of suffering a diminution in compensation or status. In systems in which the judiciary is constantly dependent on politicians for access to more desirable assignments and positions, the rational judge will procure support by rendering decisions that favor the party in power.⁷³ In the federal system, however, appointment is for life, the perquisites of office are fairly constant, and advancement, although dependent upon the favor of the President and the Senate, is a relatively rare opportunity.

Hence, the rational federal judge has no significant incentive to render decisions that favor a particular geographical or political con-

⁷¹ See, e.g., MCCHESENEY, *supra* note 11, at 133–56; Gary S. Becker, *A Theory of Competition Among Pressure Groups for Political Influence*, 98 Q.J. ECON. 371, 371–73 (1983); William M. Landes & Richard A. Posner, *The Independent Judiciary in an Interest-Group Perspective*, 18 J.L. & ECON. 875, 877 (1975); Macey, *supra* note 15, at 231–32; George J. Stigler, *The Theory of Economic Regulation*, 2 BELL J. ECON. & MGMT. SCI. 3, 11–12 (1971); Robert D. Tollison, *Public Choice and Legislation*, 74 VA. L. REV. 339 (1988). See generally FARBER & FRICKEY, *supra* note 5, at 23–24 (discussing interest group models).

⁷² See LAWRENCE BAUM, *THE PUZZLE OF JUDICIAL BEHAVIOR* (1997); Jonathan R. Macey, *Competing Economic Views of the Constitution*, 56 GEO. WASH. L. REV. 50, 70 (1987); Richard L. Revesz, *Congressional Influence on Judicial Behavior? An Empirical Examination of Challenges to Agency Action in the D.C. Circuit*, 76 N.Y.U. L. REV. 1100 (2001).

⁷³ See, for example, the work of Professors Ramseyer and Rasmusen on the Japanese judiciary: J. Mark Ramseyer & Eric B. Rasmusen, *Judicial Independence in a Civil Law Regime: The Evidence from Japan*, 13 J.L. ECON. & ORG. 259 (1997); J. Mark Ramseyer & Eric B. Rasmusen, *Why Are Japanese Judges So Conservative in Politically Charged Cases?*, 95 AM. POL. SCI. REV. 331 (2001); J. Mark Ramseyer & Eric B. Rasmusen, *Why Is the Japanese Conviction Rate So High?*, 30 J. LEGAL STUD. 53 (2001); J. Mark Ramseyer & Eric B. Rasmusen, *Why the Japanese Taxpayer Always Loses*, 72 S. CAL. L. REV. 571 (1999).

stituency, or that procure (through solicitation or extortion) the support of interest groups.⁷⁴ As a corollary, he has little incentive to expand the authority of the judiciary. Relatively independent of external public and private actors, he does not need to create opportunities to bargain for their support; indeed, authority-enlarging decisions may undesirably increase his workload.⁷⁵

3. *The President*

The Presidency initially played a very subsidiary role in public choice theorizing, modeled only sketchily and largely as an adjunct to the legislative process.⁷⁶ However, with the rise of interest in the "Unitary Executive" conception of how government power should be allocated, the President has emerged as a key actor in public choice analyses of public policymaking institutions.⁷⁷

Like legislators, the rational president is motivated by the desire for reelection and, as a corollary, for expansion of the authority of his office. Significantly, however, his constituency is the entire nation. His actions are easier for voters to monitor than are the actions of any

⁷⁴ See, e.g., Macey, *supra* note 15, at 263–64; see also Jonathan R. Macey, *Separated Powers and Positive Political Theory: The Tug of War over Administrative Agencies*, 80 GEO. L.J. 671, 675–92 (1992). This standard public choice account of independence from political forces has been challenged. See, e.g., Calabresi, *supra* note 70, at 60–65 (arguing that federal judges are regionally and geographically biased toward state and local preferences); Frank B. Cross, *Shattering the Fragile Case for Judicial Review of Rulemaking*, 85 VA. L. REV. 1243, 1314–22 (1999) (arguing that judicial review favors special interests); Einer R. Elhauge, *Does Interest Group Theory Justify More Intrusive Judicial Review?*, 101 YALE L.J. 31 (1991) (same).

⁷⁵ See, e.g., RICHARD A. POSNER, *OVERCOMING LAW* 117–20 (1995) (considering such factors as salary, leisure-seeking, reputation, prestige, and reversal avoidance as part of the "judicial utility function"); cf. Neil S. Siegel, *Sen and the Hart of Jurisprudence: A Critique of the Economic Analysis of Judicial Behavior*, 87 CAL. L. REV. 1581 (1999).

⁷⁶ See Terry M. Moe & Scott A. Wilson, *Presidents and the Politics of Structure*, LAW & CONTEMP. PROBS., Spring 1994, at 1, 1–2; see also Joseph A. Pika, *Interest Groups: A Doubly Dynamic Relationship*, in *PRESIDENTIAL POLICYMAKING: AN END-OF-CENTURY ASSESSMENT* 59, 59 (Steven A. Shull ed., 1999) (noting that while "[i]nterest groups have long been viewed as an integral part of the congressional and bureaucratic policymaking processes," their significance in presidential action has only recently been recognized).

⁷⁷ The Unitary Executive conception insists that control over the execution of all federal law (and, in particular, regulatory statutes) should be centralized exclusively in the President. See, e.g., Calabresi, *supra* note 70, at 31–33. As a corollary, it employs an expansive conception of "execution" that comprises all activity implementing a statute after completion of the lawmaking process. Its principle remedial prescription (the precise details of which vary with the particular advocate) is eliminating all formal barriers of "independence" between the President and agency officials exercising policymaking authority. See, e.g., *id.* at 82–85.

The Unitary Executive concept is typically justified as the best interpretation of the original intent of Article II, but the constitutional argument is often buttressed by pragmatic claims that centralized presidential control will yield superior regulatory policy along a variety of dimensions. See Cynthia R. Farina, *The Consent of the Governed: Against Simple Rules for a Complex World*, 72 CHI.-KENT L. REV. 987, 989–991 (1997) (collecting and reviewing these claims).

single legislator. Thus, it will be more difficult for him to deliver, undetected, public policy that benefits particular groups or geographical areas at public expense. Analogously, interest groups will find it far more difficult and costly to purchase compliant presidential behavior than to strike a mutually beneficial deal with individual legislators.⁷⁸

All of this, of course, applies only to first-term presidents. The behavior of the second-term president is harder to model because, like the federal judiciary, he exists outside the familiar incentive framework of reelection. Public choice thus far has not significantly explored the extent to which the second-term president perceives his self-interest to be aligned with the success of his party in retaining the Presidency. If that were the case, second-term presidents would behave much like first-term ones. Also largely unexplored is the question of how the rational second-term president uses his office to enhance his position after leaving office.⁷⁹ Although some theorists assert that presidents, once reelected, are motivated primarily to build reputational capital so as to secure "their place in history,"⁸⁰ the sort of behavior that furthers this goal remains largely unspecified.

4. *Administrative Agencies*

Finally, public choice has generated a fairly detailed model of administrative agency behavior.⁸¹ The rational administrator will act to

⁷⁸ See, e.g., Calabresi, *supra* note 70, at 34–35; Steven G. Calabresi & Saikrishna B. Prakash, *The President's Power to Execute the Laws*, 104 YALE L.J. 541 (1994); Frank H. Easterbrook, *Unitary Executive Interpretation: A Comment*, 15 CARDOZO L. REV. 313, 318–19 (1993); Lawrence Lessig & Cass R. Sunstein, *The President and the Administration*, 94 COLUM. L. REV. 1, 93–106 (1994); Geoffrey P. Miller, *The Unitary Executive in a Unified Theory of Constitutional Law: The Problem of Interpretation*, 15 CARDOZO L. REV. 201, 212–18 (1993); Moe & Wilson, *supra* note 76, at 11.

⁷⁹ This appears to be fertile ground for public choice analysis. A new range of employment opportunities for former presidents has been opened by the Carlyle Group, a private equity firm whose clientele are the very rich seeking global investment prospects. See Leslie Wayne, *Elder Bush in Big G.O.P. Cast Toiling for Top Equity Firm*, N.Y. TIMES, Mar. 5, 2001, at A1 (reporting former President Bush's meetings with top Saudi and Korean officials on behalf of Carlyle's ventures in those countries, activity that falls outside the scope of U.S. ethics restrictions).

⁸⁰ Moe & Wilson, *supra* note 76, at 11–13.

⁸¹ See, e.g., PETER H. ARANSON, *AMERICAN GOVERNMENT: STRATEGY AND CHOICE* (1981); *THE BUDGET-MAXIMIZING BUREAUCRAT: APPRAISALS AND EVIDENCE* (André Blais & Stéphane Dion eds., 1991); WILLIAM A. NISKANEN, JR., *BUREAUCRACY AND REPRESENTATIVE GOVERNMENT* (1971); GEORGE J. STIGLER, *Can Regulatory Agencies Protect the Consumer?*, in *THE CITIZEN AND THE STATE: ESSAYS ON REGULATION* 178 (1975); *TOWARD A THEORY OF THE RENT-SEEKING SOCIETY* (James M. Buchanan et al. eds., 1980); Peter H. Aranson et al., *A Theory of Legislative Delegation*, 68 CORNELL L. REV. 1, 37–62 (1982); Edna Earle Vass Johnson, *Agency "Capture": The "Revolving Door" Between Regulated Industries and Their Regulating Agencies*, 18 U. RICH. L. REV. 95 (1983); Sam Peltzman, *Toward a More General Theory of Regulation*, 19 J.L. & ECON. 211 (1976); Richard A. Posner, *Theories of Economic Regulation*, 5 BELL J. ECON. & MGMT. SCI. 335 (1974). See generally MASHAW, *supra* note 5, at 118–19, 140–42 (summarizing this work); Steven P. Croley, *Public Interested Regulation*, 28 FLA. ST. U. L. REV. 7, 9–15 (2000) (explaining the role of interest group theory).

maintain his position and to expand the authority of his agency. To the extent he is not a career administrator, he will also work to ensure lucrative employment opportunities on leaving government.

In pursuit of these goals, he will make alliances with influential politicians (especially in congressional oversight committees) and procure the support of interest groups using the same basic strategies employed by legislators. Where agency officials differ from Congress is their ability to accomplish the goal of expanding institutional authority. Although *legislatures* have the incentive to expand their authority so as to increase opportunities for members to extract reelection support, *legislators* face a collective action problem when they attempt to do so: No individual legislator has an incentive to spend time, energy, and political capital on activities that will benefit all members equally. Agencies, having a more hierarchical structure, avoid this problem. The agency head can mobilize subordinate staff in efforts to expand the agency's budget or jurisdiction or both, thus consolidating both the costs and benefits of such an effort into one institutional structure.⁸² Subordinate staff will engage in these efforts even though the civil service system substantially removes the risk of job loss. They also have an individual interest in augmenting the authority and importance of the agency. In addition, they may work to advance the goals of senior agency officials who control access to upgrades in their compensation and status.

5. *The Reasons for, and General Strategies Against, Bad Public Policy*

In the public choice account, the most important source of bad government decisions is self-interest. Private interest groups lobby for regulatory policies that advance the material well-being of their members—at best without regard to whether these policies serve the larger public interest, and often with the precise object of profiting at the expense of the public or some competing group. These groups work primarily through the institution most vulnerable to their efforts: the legislature.

The legislature's vulnerability stems directly from its members' need for periodic reelection, and derivatively from the geographical base of the franchise.⁸³ The smaller the size of the constituency whose support must be obtained, the greater the likelihood that the legislator will work to produce legislation that decreases overall welfare. Thus, the House of Representatives is the most likely source of subop-

⁸² See THE BUDGET-MAXIMIZING BUREAUCRAT: APPRAISALS AND EVIDENCE, *supra* note 81; NISKANEN, *supra* note 81, at 197.

⁸³ See, e.g., Calabresi, *supra* note 70, at 58–60 (relying heavily on geographical nature of electoral base).

timal public policy, as its members scramble to produce locally beneficial programs underwritten by the public fisc ("pork") and to block any measures that impose discernable local costs in the process of producing widely shared benefits. Given the House's two-year election cycle, the process of procuring campaign contributions and currying local voter support is virtually constant. The Senate's six-year election cycle moderates this pressure somewhat, but the need to appeal to the voters of a single state creates a similar policy bias in favor of discrete geographical interests relative to the national welfare.

The perceived inverse relationship between size of constituency and production of nationally optimal regulatory policy leads some public choice theorists to prefer a strict textualist approach to interpreting legislation.⁸⁴ Legislative history is often drafted by small groups of legislators, perhaps even at the subcommittee level, that are especially vulnerable to capture by self-serving interest groups. By enforcing only the language upon which the entire Congress could agree, courts provide at least marginally greater assurance that statutes will advance broadly beneficial policies rather than particular private-interest-favoring deals.

Agencies, dependent upon Congress for budgetary and jurisdictional aggrandizement, will respond to the preferences of influential legislators, thus carrying regional and interest-group-favoring biases into the regulatory process.⁸⁵ These biases become further entrenched as agencies develop mutually beneficial relationships with certain interest groups (e.g., "capture") that advance the immediate and long-term self-interest of agency officials.⁸⁶ These dynamics disfavor broad application of *Chevron* deference.⁸⁷ If agencies are given wide discretion to construe regulatory statutes, their interpretations will likewise be more subject to capture, directly and through the in-

⁸⁴ See, e.g., Frank H. Easterbrook, *Statutes' Domains*, 50 U. CHI. L. REV. 533 (1983); Frank H. Easterbrook, *The Supreme Court, 1983 Term—Foreword: The Court and the Economic System*, 98 HARV. L. REV. 4, 42–58 (1984); see also FARBER & FRICKEY, *supra* note 5, at 89–102 (surveying public choice advocacy of textualism in general, and detailing Justice Scalia's views in particular); MASHAW, *supra* note 5, at 89–93 (examining Judge Easterbrook and Professor Macey's views); Daniel A. Farber & Philip P. Frickey, *Legislative Intent and Public Choice*, 74 VA. L. REV. 423 (1988) (critiquing such approaches).

⁸⁵ See sources cited *supra* note 81.

⁸⁶ See, e.g., BARRY M. MITNICK, *THE POLITICAL ECONOMY OF REGULATION: CREATING, DESIGNING, AND REMOVING REGULATORY FORMS* 38 (1980); Lessig & Sunstein, *supra* note 78, at 96–99; see also BRUCE M. OWEN & RONALD BRAEUTIGAM, *THE REGULATION GAME: STRATEGIC USE OF THE ADMINISTRATIVE PROCESS* 2–9 (1978).

⁸⁷ In *Chevron U.S.A. Inc. v. Natural Resources Defense Council, Inc.*, 467 U.S. 837, 843–45 (1984), the Court held that when a regulatory statute is ambiguous, the judiciary must defer to a reasonable interpretation offered by the agency, even if this is not the construction the court would have reached on its own. "Clearly, the case is troubling for those who view the proper role of the judiciary as increasing rather than decreasing the costs to interest groups of implementing special interest oriented legislation." Macey, *supra* note 74, at 679.

fluence of members of Congress, than an interpretation declared by the independent judiciary.⁸⁸

In the most internally consistent public choice analyses, bad government decisionmaking—i.e., the subversion of public power to further private gain with a net loss in aggregate welfare and/or unjustifiable wealth transfers between groups—is regarded as so inevitable that the ameliorative strategy is radical downsizing of the regulatory apparatus.⁸⁹ Less dogmatic (or perhaps more pragmatic) public choice analyses emphasize moving responsibility for regulatory policy to institutions *relatively* less likely to make self-serving decisions that harm the public interest. These institutions include (depending on the account) the judiciary,⁹⁰ the few agencies that are, in established political practice, relatively impervious to legislative blandishment or retaliation,⁹¹ and the President.⁹²

Moving power to the judiciary and such unusually politically autonomous agencies as the Federal Reserve Bank Board of Governors is a favored general remedial strategy because these institutions tend to be indifferent to the electoral and budgetary processes. Moving power to the President is favored on the theory that his national electoral constituency disassociates his self-interest from that of geographically discrete groups of voters. He can support policies that target benefits to particular regions only by jeopardizing the votes and contributions of all regions not so favored. Similarly, while the President needs the support of many interest groups to accomplish his reelection goals, the sheer magnitude of the electoral coalition he must assemble ensures that the President will be beholden to many but captured by none. As a result, he is the one elected official whose self-interest in reelection is aligned with the interests of the whole, rather than any discrete part, of the nation.⁹³ The Unitary Executive move-

⁸⁸ See, e.g., Macey, *supra* note 15, at 263 (arguing for reconsideration of “the commonly held view that prior interpretations of statutes by administrative agencies should be afforded great deference”).

⁸⁹ See Cynthia R. Farina, *Faith, Hope, and Rationality or Public Choice and the Perils of Occam's Razor*, 28 FLA. ST. U. L. REV. 109, 111–14 (2000) (explaining why radical deregulation is the only rigorously logical conclusion from public choice premises); see *supra* note 11.

⁹⁰ See, e.g., Macey, *supra* note 15, at 263–64; Macey, *supra* note 74, at 675–92.

⁹¹ See, e.g., Lessig & Sunstein, *supra* note 78, at 106–08; Miller, *supra* note 78, at 215–16.

⁹² See, e.g., Calabresi, *supra* note 70, at 48–57; Lessig & Sunstein, *supra* note 78, at 85–86, 91–106.

⁹³ This same description applies to the Vice President. Although traditionally that office has not had much independent influence over regulatory policy, the role of Dan Quayle in the first Bush Administration's Competitiveness Council, Al Gore in the Clinton Administration's National Performance Review initiative, and Dick Cheney, ubiquitously, in the second Bush Administration may signal a new era for the vice presidency.

We emphasize that we are reporting, not endorsing, these propositions about presidential incentives and motives. For criticism of this model on the merits, see, for example,

ment relies on this model (in conjunction with arguments about original constitutional intent) to advocate expansive presidential authority over regulatory decisionmaking as the only effective means of countering the interest group pandering produced by legislative oversight of agencies.⁹⁴

To be sure, remaining true to the universal motivational premise requires assuming that judges, Federal Reserve Board members, and presidents will behave in self-interested ways. But freedom from the imperative to procure support from narrowly drawn self-interested constituencies means that their self-serving behavior will not be *systematically* tilted by the inexorable incentives of electoral politics. Having no need to sell out the public good to particular private interests, their judgments might—at least some of the time—coincide with the public interest.

B. A Psychological Model of Governmental Policy Failure

Psychological research suggests that humans' inevitable cognitive reliance on heuristics creates a fundamental vulnerability to error. Although "heuristics . . . make us smart,"⁹⁵ they also lead to predictable patterns of mistakes. Consequently, policymaking structures and practices that fail to acknowledge the threat posed by illusions of judgment, and to employ measures that counteract human cognitive limitations, will generate improvident regulatory policy.

Lay decisionmakers head American government. Members of Congress, the President, and judges constantly make decisions in areas in which they have no expert training. Even more troublesome than lack of knowledge is lay decisionmakers' lack of the training and experience that would help them recognize when they should not rely

Farina, *supra* note 89, at 125–30; and Peter M. Shane, *Political Accountability in a System of Checks and Balances: The Case of Presidential Review of Rulemaking*, 48 *ARK. L. REV.* 161 (1995). Cf. Steven A. Shull, *Presidential Policymaking: An Introduction*, in *PRESIDENTIAL POLICYMAKING: AN END-OF-CENTURY ASSESSMENT*, *supra* note 76, at 3, 11 ("[M]any political scientists . . . see no reason to believe that any proposed reforms to strengthen the presidency vis-à-vis Congress will further general as opposed to more specific interests or public policies.")

⁹⁴ See, e.g., Calabresi, *supra* note 70, at 59–70, 81–90; Lessig & Sunstein, *supra* note 78, at 105–06; see also Calabresi & Prakash, *supra* note 78 (detailing the textualist-originalist argument for the Unitary Executive theory).

If meaningful presidential control of agency policymaking were so assured, then *Chevron* deference would become a favored allocation of statutory interpretive power. See, e.g., Steven G. Calabresi, *The Structural Constitution and the Countermajoritarian Difficulty*, 22 *HARV. J.L. & PUB. POL'Y* 3, 6–8 (1998); see also Dan M. Kahan, *Reallocating Interpretive Criminal-Lawmaking Power Within the Executive Branch*, *LAW & CONTEMP. PROBS.*, Winter 1998, at 47, 54–56 (recommending deference to Department of Justice legal interpretations but not to those of U.S. Attorney's Offices, because the latter are more independent of presidential control); Miller, *supra* note 78, at 214–15 (advocating, in many contexts, giving the President "a high degree of interpretive power" because he is less prone to factional capture).

⁹⁵ GIGERENZER ET AL., *supra* note 29.

on mental shortcuts. By contrast, administrative agencies are filled with experts. Experts have the capacity to bring to policymaking not only specialized substantive knowledge, but also the training and experience that provide tools for avoiding cognitive traps. At the same time, however, they will be overconfident in their judgment, trapped within particular ways of solving problems that arise from their training, and generally unable to temper their enthusiastic belief in their professions and abilities.

Because government is apt to make bad choices when government decisionmakers rely on misleading heuristics, a successful system of regulatory policymaking must recognize and take account of the strengths and weaknesses of expert and lay judgment.

1. *Congress*

At first assessment, Congress does not appear to be a promising source of good public policy decisions. Both houses comprise people who typically lack the sort of training that would create expertise in making the vast array of decisions required in an ambitious regulatory government. Members seem vulnerable to the cognitive illusions that typically go unrecognized and unremediated by lay decisionmakers: being more attuned to potential harm than to forgone benefits (framing effects); overestimating the prevalence of events that are easy to remember (the availability heuristic); and disregarding the prevalence of an event altogether in evaluating its importance (the representativeness heuristic). These cognitive biases might readily produce unwise regulatory choices. They can divert the legislative agenda to the wrong set of problems and confine legislative thinking about solutions.

Congress, however, is a more complicated institution than this initial assessment suggests. Both houses delegate significant power, in identifying problems and in constructing solutions, to committees.⁹⁶ The committee system provides a structural opportunity for Congress to compensate for the limitations of lay membership.⁹⁷ Members who do have some expertise in particular economic or social areas can be given committee assignments that institutionally amplify this knowledge.⁹⁸ Committees can hold hearings at which outside experts, both

⁹⁶ For a general discussion of how committees can function to stabilize and inform the decisionmaking of the legislature, see FARBER & FRICKEY, *supra* note 5, at 56.

⁹⁷ See KEITH KREHBIEL, *INFORMATION AND LEGISLATIVE ORGANIZATION* (1991); ARTHUR MAASS, *CONGRESS AND THE COMMON GOOD* 39–43 (1983); see also Nelson W. Polsby, *The Institutionalization of the U.S. House of Representatives*, 62 *AM. POL. SCI. REV.* 144 (1968) (arguing that the House responded to growing federal regulatory ambitions by developing a complex system of formal division of labor).

⁹⁸ We are not suggesting that this specialization and expertise-building is the only function committees serve. Richard Fenno's well-known study in the 1970s found that

partisan and neutral, provide further insights.⁹⁹ Finally, committee members gain experience over time, allowing them to learn the pitfalls of intuitive decisionmaking. The reports issued by committees on proposed legislation can make this expertise accessible to other Members.¹⁰⁰

In other words, two of the institutional characteristics of Congress that incite the most criticism from public choice analysts—(1) the reliance upon a highly reticulated committee and subcommittee structure, and (2) the high incumbency rate that reliably sends more than ninety percent of legislators back to the institution in each election cycle—are, from the cognitive perspective, among the most promising of its institutional decisionmaking adaptations.¹⁰¹

three goals motivated the committee assignments that Members sought: good public policy, influence within the chamber, and reelection, see RICHARD F. FENNO, JR., CONGRESSMEN IN COMMITTEES 1 (1973), and more contemporary accounts concur, see ROGER H. DAVIDSON & WALTER J. OLESZEK, CONGRESS AND ITS MEMBERS 206–12 (7th ed. 2000). At the more formal level, three models of committee function have emerged in the political science literature: the chamber-dominated model, which emphasizes the information and expertise function we discuss here; the party-dominated model, which emphasizes the role of committees in promoting the agenda of the majority party; and the committee autonomy model, which emphasizes the familiar public choice behavior of pork production and log-rolling. FORREST MALTZMAN, COMPETING PRINCIPALS: COMMITTEES, PARTIES, AND THE ORGANIZATION OF CONGRESS 13–30 (1997). There is widespread agreement among political scientists that “each model has some validity, but each provides only a partial picture of the committee system.” *Id.* at 5.

⁹⁹ Again, we are observing what is institutionally possible. We are not suggesting that information gathering is the *only* function of committee hearings. See DAVIDSON & OLESZEK, *supra* note 98, at 217 (identifying the “overlapping purposes” served by hearings as exploring the need for legislation, building a public record, providing publicity for members, reviewing executive branch behavior, and providing a forum for grievances). Neither do we suggest that committee hearings are *invariably* balanced, openminded exercises in information gathering. See Neal Devins, *Congressional Factfinding and the Scope of Judicial Review: A Preliminary Analysis*, 50 DUKE L.J. 1169, 1183–84 (2001) (describing ways in which committee chairs and staff can manipulate hearings).

¹⁰⁰ See WILLIAM N. ESKRIDGE, JR. ET AL., LEGISLATION AND STATUTORY INTERPRETATION 72 (2000) (committee reports “are often the only documents that legislators or their staffs read before a vote of the full house on a bill”); ERIC REDMAN, THE DANCE OF LEGISLATION 140 (1973) (“Within the Senate itself, reports are important chiefly because many Senators read nothing else before deciding how to vote on a particular bill.”); cf. JOHN W. KINGDON, CONGRESSMEN’S VOTING DECISIONS 73–83 (3d ed. 1989) (reporting Members’ statements that cues from fellow Members are most influential in determining how to vote); DONALD R. MATTHEWS & JAMES A. STIMSON, YEAS AND NAYS: NORMAL DECISION-MAKING IN THE U.S. HOUSE OF REPRESENTATIVES 49–51 (1975) (finding from a study of House voting that cues from committee leaders are a significant determinant of Members’ decisions).

¹⁰¹ Committees—and their chairs—tend to be the most demonized players in public choice accounts of legislative action, portrayed as opportunistic entrepreneurs of regional and special interest pandering whose preferences are likely to depart wildly from those of the median legislator. See, e.g., Calabresi, *supra* note 70, at 84–85; Barry R. Weingast & William J. Marshall, *The Industrial Organization of Congress; or, Why Legislatures, Like Firms, Are Not Organized as Markets*, 96 J. POL. ECON. 132 (1988); see also Kenneth A. Shepsle & Barry R. Weingast, *Legislative Politics and Budget Outcomes*, in FEDERAL BUDGET POLICY IN THE 1980s 343 (Gregory B. Mills & John L. Palmer eds., 1984) (arguing that fiscal concerns are a by-product of legislators’ programmatic pursuit of power and election).

Congress also has expanded its institutional access to expertise on regulatory issues. A growing array of staff can supplement internal knowledge and decisionmaking skills at both the Member and committee levels.¹⁰² External sources of expertise include both the reports that Congress frequently requires from agencies and the Office of Management and Budget (OMB), and the analyses that the Gen-

Considerable theoretical and empirical work challenges this picture as inaccurate or, at least, highly oversimplified. *See, e.g.*, D. RODERICK KIEWIET & MATHEW D. MCCUBBINS, *THE LOGIC OF DELEGATION: CONGRESSIONAL PARTIES AND THE APPROPRIATIONS PROCESS* (1991) (arguing that parties use committee appointments to align their preferences and those of pivotal members); GARY W. COX & MATHEW D. MCCUBBINS, *LEGISLATIVE LEVIATHAN: PARTY GOVERNMENT IN THE HOUSE* (1993) (extending this theory by discussing means through which the majority party structures incentives to retain policy control, including distributing desired committee transfers according to party loyalty); KREHBIEL, *supra* note 97 (interpreting the committee system as a means by which the House rewards development of expertise and specialization); *cf.* HALL, *supra* note 16, at 246 (finding that lack of representativeness tended to occur in legislation with district-concentrated benefits but not in other legislation and concluding that “if the bias of an interested few sometimes subverts the will of an indolent majority, this is not a robust empirical regularity insofar as I am able to determine”). Forrest Malzman, studying the committee appointment rules and practices used in the House from 1975 to 1993, has demonstrated that these procedures both enhanced the appointment of representative members to salient committees and provided members of salient committees with greater incentives to act as agents of the party caucus and the chamber. His analysis of roll call votes concluded that “most committees act in a manner acceptable to both the chamber and the majority-party caucus,” with the highest responsiveness shown by members of salient committees. MALTZMAN, *supra* note 98, at 7–8, 106–07. In the Senate, where decisionmaking tends to be less dominated by the committee structure, Malzman found that committees were even more likely to act as faithful agents of the chamber majority. *See id.* at 143–56.

Incumbency facilitates the development of legislators known as “policy entrepreneurs,” influential members who specialize in particular issues and are “recognized for ‘stimulating more than . . . responding’ to outside political forces in a given field.” DAVIDSON & OLESZEK, *supra* note 98, at 259 (quoting DAVID E. PRICE, *WHO MAKES THE LAWS?: CREATIVITY AND POWER IN SENATE COMMITTEES* 297 (1972) (omission in original)). For example, Senator and physician Bill Frist of Tennessee has tremendous influence on his colleagues on issues requiring scientific or medical expertise, as was recently demonstrated in the debate over stem-cell research. *See Morning Edition: Attention to Stem-Cell Research* (NPR radio broadcast, July 19, 2001), available at 2001 WL 9328213.

¹⁰² “Congressional legislative staff . . . often times represent a thread of continuity, institutional memory, and expertise within the institution.” Barbara S. Romzek & Jennifer A. Utter, *Congressional Legislative Staff: Political Professionals or Clerks?*, 41 AM. J. POL. SCI. 1251, 1252 (1997) (concluding, from study of staff in the 104th Congress, that legislative staff represent “an emerging profession” with a specialized substantive and institutional knowledge base, an ethic of service, and various norms of loyalty, responsiveness, and hard work); *see also* HALL, *supra* note 16, at 89 (“Often a member will hire a particular staffer who can bring relevant experience to the enterprise.”). Although most of the increase in personal staff is devoted to constituent service, *see* NORMAN J. ORNSTEIN ET AL., *VITAL STATISTICS ON CONGRESS 1999–2000*, at 126 (2000), research and policy initiatives are a large part of staff responsibilities, *CONGRESSIONAL QUARTERLY’S GUIDE TO CONGRESS 596–97* (5th ed. 2000); DAVIDSON & OLESZEK, *supra* note 98, at 219–21. Moreover, most of the post-World War II increase in nonpersonal staff is attributable to information support services such as the Congressional Research Service, the General Accounting Office, the Congressional Budget Office, and (until its abolition in 1995) the Office of Technology Assessment. ORNSTEIN ET AL., *supra*, at 126.

eral Accounting Office (GAO), the Congressional Budget Office, and the Congressional Research Service generate.¹⁰³ These expert bodies will likely adopt a different decisionmaking perspective on the problems they are asked to address, providing at least the opportunity for Congress to expose itself to novel perspectives "outside" the immediate decisions it must make.

2. *The President*

The President is also a lay decisionmaker. To the extent that he personally makes a decision, it is likely to be in an area in which he has no personal expertise. Furthermore, the time that the modern President has available to devote to any single decision is quite limited.¹⁰⁴ Consequently, much more so than Congress, the President is likely to rely on heuristics in evaluating the options. In fact, the President fits the pattern that most concerns cognitive psychologists: the decisionmaker who must make complex choices quickly, based on imperfect information, in areas in which he has no expertise or training.

Like Congress, the President has numerous advisers to provide expertise. Moreover, as exemplified by the evolution of national security decisionmaking during the Kennedy Administration, the President can organize executive staff in decisionmaking configurations that minimize the adverse effects of heuristics. Finally, to varying degrees Presidents delegate decisionmaking to subordinates, who might have both the expert knowledge and training to enable them to avoid cognitive pitfalls in their area of responsibility.

Several factors, however, mitigate the President's ability to escape the cognitive vulnerabilities of lay decisionmaking. First, in contemporary practice, a President's close advisers are more apt to be political experts and time-tested personal allies than true experts in substantive policy areas.¹⁰⁵ Furthermore, the President cannot specialize and develop decisionmaking expertise in a substantive area.

¹⁰³ See DAVIDSON & OLESZEK, *supra* note 98, at 220–21; JAMES W. FESLER & DONALD F. KETTL, *THE POLITICS OF THE ADMINISTRATIVE PROCESS* 279–81 (1991); HALL, *supra* note 16, at 90–91.

¹⁰⁴ "[T]he [P]resident's time is the scarcest commodity in the White House . . ." Richard Rose, *Organizing Issues In and Organizing Problems Out*, in *THE MANAGERIAL PRESIDENCY* 105, 107 (James P. Pfiffner ed., 1991); see Hugh Hecl, *The Changing Presidential Office*, in *THE MANAGERIAL PRESIDENCY*, *supra*, at 33.

¹⁰⁵ See, e.g., LYN RAGSDALE, *VITAL STATISTICS ON THE PRESIDENCY: WASHINGTON TO CLINTON* 252–53 (1996) (describing the pattern of presidential reliance on "small groups of loyal advisers" and quoting Nixon personnel advisor Frederic Malek as saying "[y]ou don't get the best people[;] [y]ou get the people you know"); James P. Pfiffner, *Can the President Manage the Government? Should He?*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 1, 8 ("[I]n the second half of the twentieth century power has slipped from the cabinet to the White House staff" who have the President's trust and support "because of long and close association.").

With responsibility for the full range of foreign and military affairs in addition to domestic policy issues, the modern President bears a burden of policy judgment and management even broader than that of Congress.¹⁰⁶ Yet the same steeply pyramidal structure that gives the President the advantage in decisional speed and coordination sacrifices the collegial opportunity to become institutionally smarter through division of labor. Finally, the President and his advisers do not have the legislative luxury of time to learn from experience. He will have barely established a stable and functioning administration when he must attend to the crucial midterm legislative elections that may force him to adapt to a shift in the balance of political power, or at least in the prevailing political mood of the country.¹⁰⁷ His own reelection bid looms shortly thereafter and, unlike the average member of Congress, he is highly vulnerable to being defeated. And, if he does secure reelection, his second term is unalterably his last.

This analysis supports two observations commonly made about the presidency. First, Presidents who have relatively hands-off managerial styles are often rated as more effective than Presidents who overwork themselves trying to be personally involved in all significant decisions.¹⁰⁸ As the ultimate lay decisionmaker with high vulnerability to the cognitive pitfalls of heuristics, the President who personally makes a large number of policy decisions is likely to make a significant number of judgmental errors. Second, new administrations will make

¹⁰⁶ See, e.g., BERT A. ROCKMAN, *THE LEADERSHIP QUESTION: THE PRESIDENCY AND THE AMERICAN SYSTEM* 168 (1984) (“[Modern] [t]rends have made more difficult for presidents that which was always difficult but less aspired to—command of the instrumentalities of government and control over policy.”); Hecló, *supra* note 104, at 38 (“Presidential power has increased by becoming more extended, scattered, and shared; it has decreased by becoming less of a prerogative, less unilateral, and less closely held by the man himself.”).

¹⁰⁷ The now-familiar pattern of the president’s party losing at least one house of Congress at the midterm election is part of the larger post-World War II phenomenon of “divided government”—the election of a president of one party and simultaneously (or within two years) a Congress dominated by the opposite party. See Farina, *supra* note 77, at 999 & n.51 (providing statistics). This phenomenon has generated intense scholarly, as well as practical, interest but very little generally accepted explanatory or predictive theory. See generally MORRIS FIORINA, *DIVIDED GOVERNMENT* (2d ed. 1996) (identifying divided government as one of the central analytical challenges for contemporary American political science).

¹⁰⁸ Ronald Reagan’s first term has become the poster child for the former style of presidential leadership, just as Jimmy Carter’s presidency (at least in its early years) is generally cited as exemplifying the latter. See, e.g., Bruce Buchanan, *Constrained Diversity: The Organizational Demands of the Presidency*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 78 (reviewing various positive assessments of Reagan’s first-term management approach, although ultimately proposing modifications); James P. Pfiffner, *Presidential Constraints and Transitions*, in *PRESIDENTIAL POLICYMAKING: AN END-OF-CENTURY ASSESSMENT*, *supra* note 76, at 19, 19–23 (identifying unwillingness to delegate significant authority to chief of staff as source of early Carter and Clinton administration problems); see also Hecló, *supra* note 104, at 40–42 (describing various staff management practices); Pfiffner, *supra* note 105, at 1 (noting “the rising importance of the institutional staff of presidents”).

mistakes that seem quite foolish in hindsight.¹⁰⁹ The decisionmaking strategies of a new White House staff are invariably unsettled, as the President's advisers struggle to determine how best to make decisions. Although political scientists and historians urge new presidents to learn from the organizational experience of earlier Chief Executives,¹¹⁰ the fact that a new administration typically enters office with an emphatic conviction of its predecessor's errors (and a consequent determination to "clean house") poses formidable obstacles to the development of a robust institutional memory in the White House.¹¹¹ Lacking the structural and personnel continuity of Congress, the presidency tends to reinvent its decisionmaking processes every four or eight years.

3. *The Courts*

From the psychological perspective, the courts are probably the institution least well-suited to making policy decisions that avoid cognitive traps.¹¹² With a few exceptions (e.g., the Court of International Trade, and the Federal Circuit to some extent), the federal judiciary has remained a body of generalists despite recurring arguments for the creation of specialized courts. Hence, judges will be experts in procedure and law and, as members of an expert profession, will have learned a variety of adaptations to minimize erroneous judgments on these points.¹¹³ With respect to substantive issues, however, they almost invariably occupy the position of lay decisionmakers. Although experts do play a role in judicial decisionmaking, the American com-

¹⁰⁹ See, e.g., George C. Edwards III, *Evaluating Clinton's Performance in Congress*, in *PRESIDENTIAL POLICYMAKING: AN END-OF-CENTURY ASSESSMENT*, *supra* note 76, at 119, 128 (assessing early Clinton Administration problems, including "self-inflicted wounds"); Pfiffner, *supra* note 108, at 19–23 (analyzing and contrasting Carter and Clinton early failures and Reagan first-year success).

¹¹⁰ E.g., Buchanan, *supra* note 108, at 78–79; Heclo, *supra* note 104, at 33–34; Richard E. Neustadt, *Does the White House Need a Strong Chief of Staff?*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 29; Richard E. Neustadt, *Memorandum on Staffing the President-Elect*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 19.

¹¹¹ "Each president in recent times has begun office with the supposition that the government has no organic past. At each turn, the wheel is to be reinvented anew. At their core, arguments for [strong presidential control over policymaking] conclude that leadership is equivalent to the introduction of novelty . . ." Joel D. Aberbach & Bert A. Rockman, *Mandates or Mandarins? Control and Discretion in the Modern Administrative State*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 158, 163; see also ROCKMAN, *supra* note 106, at 207 (observing that administrations that emphasize strong presidential control tend to see career administrators as sources of policymaking problems, rather than solutions; "[w]hatever limited memory government possesses and whatever constraints this imposes upon rashness are treated as obstacles to be overcome"); Pfiffner, *supra* note 105, at 8–12 (reviewing how presidents since the 1950s have reacted against the management style of their predecessors).

¹¹² See Gillette & Krier, *supra* note 24, at 1058–61.

¹¹³ See Jeffrey J. Rachlinski, *Heuristics and Biases in the Courts: Ignorance or Adaptation?*, 79 *OR. L. REV.* 61, 62–66 (2000).

mitment to an adversarial rather than an inquisitorial system for ad-
ducing evidence, as well as strictures in the rules of evidence
themselves, give judges far less flexibility than either Congress or the
President in using experts to supplement their decisional process.¹¹⁴
Finally, to the extent that juries are involved, the decision rests in the
hands of those who are experts neither in the substance nor in the
application of law.¹¹⁵

Courts also decide problems one case at a time. Although this
approach has virtues,¹¹⁶ it also raises the possibility that judges will be
more prone to the influence of cognitive illusions than will either
Congress or the President.¹¹⁷ As noted above,¹¹⁸ several cognitive illu-
sions can be avoided by stepping outside of a decisionmaking problem
and seeing similarities between the issue at hand and other related
problems. If the case seems unique, adopting an outsider perspective
will be difficult.

To some extent, the judiciary has compensated for this by adopt-
ing a decisional paradigm that emphasizes precedent. Litigants, law
clerks, and judges are accustomed by professional training to search-
ing for other cases and discerning relevant similarities and differ-
ences. It is far from clear, however, that this professional adaptation
serves courts as well in the context of contemporary regulatory policy
as it does in the common-law context in which it developed. Regula-
tory issues often present a high level of technical and factual complex-
ity, and cases involving any given issue are likely to be relatively
infrequent. Particularly for courts and litigants that are not repeat
players in the particular substantive area, selecting appropriate analog-
ies and making apt distinctions may be quite difficult. More broadly,
the paradigmatic judicial mindset of deciding cases one at a time in
whatever order the litigants bring them makes it less likely that
courts—as compared with the other decisional institutions of govern-
ment—will take an outsider perspective. Although Congress, the
President, and agencies often attend to a problem because a specific
event makes it politically salient, these actors can more readily escape
the procedural constraints and professional enculturation that contin-
ually focus judicial attention on the situation of the parties in the par-
ticular case.

¹¹⁴ For a comprehensive review of the institutional factors that may give Congress the
advantage over courts in finding “social facts,” see Devins, *supra* note 99, at 1177–82.

¹¹⁵ See, e.g., Reid Hastie & W. Kip Viscusi, *What Juries Can't Do Well: The Jury's Performance
as a Risk Manager*, 40 ARIZ. L. REV. 901 (1998).

¹¹⁶ See, e.g., CASS R. SUNSTEIN, *ONE CASE AT A TIME: JUDICIAL MINIMALISM ON THE SU-
PREME COURT* (1999).

¹¹⁷ See Gillette & Krier, *supra* note 24, at 1058–61.

¹¹⁸ See *supra* notes 48–51 and accompanying text.

4. *Administrative Agencies*

The only real experts in the government are found in administrative agencies. They have the training and experience to avoid cognitive traps commonly encountered in their area of specialty; they will know when and how to adopt different perspectives on decisionmaking problems.

To be sure, the *heads* of agencies are political appointees who typically are not true experts in their fields. Like the President, such lay decisionmakers will face many demands on their time and, consequently, be vulnerable to making quick decisions based on imperfect information. Still, even agency heads have several cognitive advantages over the President. First, they have a limited domain of substantive responsibility, which allows for the possibility of specialization. Second, most come to their positions not just because of political suitability but also because of some experience (acquired in the private sector, academia, or other government service) with the substantive problems their agency is supposed to address.¹¹⁹ Finally, they make policy judgments through a closer institutional relationship with the expertise of a permanent staff where most regulatory decisions originate. The institutional drag of career staff is frequently bemoaned by a new administration anxious to sweep clean with its new broom. But, once again, a frequently attacked feature of contemporary government structure has decided virtues from the psychological perspective: The agency's career staff provide an ongoing repository not only of substantive knowledge but also of decisionmaking experience, so that agencies (unlike their White House overseers) need not reinvent the wheel every four or eight years.

The problem with administrative agencies is the problem that all experts face: They are apt to be overconfident in their decisionmaking. Experts fail to look beyond the factors that their training and experience predispose them to consider; they tend not to test thoroughly their assumptions. Experts are right more often than laypersons, but not as often as they think. Furthermore, experts in administrative agencies are unlikely to mirror the range of values and priorities of the larger society they are supposed to serve. Most of the staff of the Army Corps of Engineers or the Environmental Protection Agency (EPA) will not have arrived at their employment at random. Those who join an agency with the principal mission of building dams probably do so because they like the prospect of building dams. Those who seek work at an agency charged with responsibility for the

¹¹⁹ See G. CALVIN MACKENZIE, *THE POLITICS OF PRESIDENTIAL APPOINTMENTS* 114–17 (1981); William G. Ross, *The Senate's Constitutional Role in Confirming Cabinet Nominees and Other Executive Officers*, 48 SYRACUSE L. REV. 1123, 1152–59 (1998).

environment probably have strong views about the appropriate goals and means of environmental regulation. Consequently, agencies can become myopically focused on their missions.

5. *The Reasons for, and General Strategies Against, Bad Public Policy—with an Important Initial Caveat About Scope*

The model of government based on cognitive psychology proposes that bad public policy occurs when decisionmaking structures and protocols fail to counteract human cognitive limitations. Particularly with respect to regulatory issues, poor judgments are likely to occur if the components of the policymaking process are not designed to exploit the distinctive strengths, and antidote the distinctive weaknesses, of expert and lay decisionmakers.

At this point, it is important to be more specific about the kinds of poor government judgments we are addressing. We do not contend that a cognitive psychological model can explain every sort of “bad” regulatory policy choice. Many people considered the abortion gag order regulation¹²⁰ adopted by the Department of Health and Human Services in the first Bush Administration to have been very bad policy, while others reserved that characterization for the Clinton Administration’s reversal of the rule.¹²¹ Regulation that efficiently and effectively pursues its announced objective is outside the scope of our thesis, even if that objective can be persuasively criticized on moral, ethical, or philosophical grounds.

Similarly beyond our scope is regulation that intentionally redistributes wealth or otherwise deliberately values one social interest at the expense of others *so long as* it actually furthers such distributional preferences. Thus, price subsidies targeted to farm families or development restrictions to protect the spotted owl would come within our thesis only if the regulations either did not in fact further these objectives, or imposed costs out of proportion to the benefit conferred on the favored interest. We recognize that using the criteria of efficiency and cost-benefit proportionality potentially undermines the distinctions we wish to draw. If a regulation designed to control the health risks of arsenic in fact reduces arsenic levels in drinking water but at a cost of about \$7 million per life saved,¹²² is it the sort of “bad” policy

¹²⁰ Statutory Prohibition on Use of Appropriated Funds in Programs Where Abortion Is a Method of Family Planning; Standard of Compliance for Family Planning Services Projects, 53 Fed. Reg. 2922 (Feb. 2, 1988).

¹²¹ See Memorandum on the Title X “Gag Rule,” 1 PUB. PAPERS 10 (1993).

¹²² EPA’s data supporting the proposed arsenic regulation, which was suspended for several months by the Bush Administration, estimated a savings of 28 lives at a cost of \$210 million. A competing analysis, by the AEI-Brookings Joint Center for Regulatory Studies, asserted that only 11 lives, at best, would be saved—at a cost of about \$19 million per life. Cass Sunstein’s careful assessment of both analyses concludes that defensible assumptions

choice that we address? Our tentative answer is: "It depends." When regulation attains its objectives at a cost beyond what the overall regulatory context establishes as the "normal" valuation of the interest pursued,¹²³ then the regulatory choice falls within our thesis *unless and until* the premium above normal value has become sufficiently politically salient that its continuation can be considered a deliberate (even if arguably misguided) social choice.¹²⁴

Later in the discussion, we suggest additional ways in which the undifferentiated mass of "regulatory failure" claims must be more thoughtfully sorted if successful remedial strategies are to be discovered.¹²⁵ For the moment, though, the foregoing set of distinctions is sufficient to allow us to recognize the broad outlines of a policymaking process that, under the psychological model, minimizes bad decisions: It will recognize that lay decisionmakers are vulnerable to relying on misleading heuristics, particularly when required to make a large number of factually complex or predictive decisions. It will rely upon experts for their knowledge and for their decisionmaking competence, but will provide mechanisms that counteract their hyperconfidence and tunnel vision. It will have protocols that force decisionmakers to view issues from different perspectives. It will have practices that take problems that appear to be unique, one-of-a-kind judgment calls, and move them from the illusion-filled realm of intuition into the more disciplined regime of a broader class of problems approached through deductive reasoning.

These insights, when compared with the premises of public choice theory, provide a very different perspective on how the various American institutions of government contribute to poor regulatory decisions. Public choice places blame for bad policy at the doorstep of a Congress obsessed with geographical favoritism and subservient

produce estimates ranging from 6 to 112 lives saved—yielding, under EPA cost assumptions, a range of \$1.1 to \$33 million per life saved. CASS R. SUNSTEIN, *THE ARITHMETIC OF ARSENIC 33* (AEI-Brookings Joint Ctr. for Regulatory Studies, Working Paper No. 01-10, 2001), available at http://www.aei.brookings.org/publications/working/working_01_10.pdf.

¹²³ At present, agencies currently value a human life in the range of \$2.5 to \$5.9 million. See ROBERT W. HAHN & ROBERT E. LITAN, *AN ANALYSIS OF THE THIRD GOVERNMENT REPORT ON THE BENEFITS AND COSTS OF FEDERAL REGULATIONS 10 & n.37* (AEI-Brookings Joint Ctr. for Regulatory Studies, Regulatory Analysis No. 00-1, 2000), available at http://www.aei.brookings.org/publications/reganalyses/reg_analysis_00_01.pdf.

¹²⁴ A very different category of "bad" government choices that fall outside our thesis are policies adopted *despite* their lack of support by the majority of decisionmakers because of procedural flaws in collective decisionmaking. As we understand the literature on cycling and other Arrow problems, there is considerable debate about how often these theoretically worrisome possibilities of democratic decisionmaking in fact eventuate. See, e.g., FARBER & FRICKEY, *supra* note 5, at 38–42, 47–55; GREEN & SHAPIRO, *supra* note 16, at 11, 98–146; MASHAW, *supra* note 5, at 12–15, 40–44.

¹²⁵ See *infra* Part III.B.1.

to rent-seeking private interests. That model tends to laud the independence of the judiciary and the President's supposed loyalty to the interests of a nationwide constituency. The psychological model, by contrast, is highly skeptical of policymaking by the President and the courts, viewing them as overworked perpetual amateurs likely to rely on erroneous heuristics. It sees in Congress the capacity to counteract the cognitive vulnerabilities of lay decisionmaking through institutional structures and practices that can develop both substantive and decisional expertise.

The psychological perspective on agencies' role in poor regulatory choices is also quite different from that of public choice theory, although the differences tend to be more nuanced. Public choice assumes that agencies, operating largely outside the public view, will produce bad policy because of capture by interest groups. Congressional oversight only exacerbates the problem; judicial review and presidential oversight can impose some checks on rampant rent-seeking and interest group pandering. The psychological model places much more confidence in agencies. It assumes that when they err, the reason is likely to be expert overconfidence and myopia. Oversight relationships with all three branches can help agencies minimize such errors, but only if the nature of the oversight is tailored to the relative virtues and weaknesses of expert and lay decisionmaking. In particular, from this perspective, intensive presidential involvement in regulatory policymaking appears more likely to introduce error than correct it. The next Part develops in more detail specific implications of the psychological model.

III

IMPLICATIONS OF THE TWO MODELS

One reason public choice theory so profoundly affects contemporary legal thinking about government structure is the ingenuity with which its proponents have argued that their model explains and justifies the institutional design choices in the Constitution. In particular, the concern expressed by prominent Framers about the mischief caused by overactive legislatures,¹²⁶ and the Madisonian anxiety about "faction,"¹²⁷ are said to presage contemporary insights about interest groups, rent extraction, and generally self-serving political behavior.¹²⁸ In this way, originalist constitutional interpretation and Chi-

¹²⁶ *E.g.*, THE FEDERALIST NOS. 37, 62 (James Madison). *See* Farina, *supra* note 77, at 1010-15.

¹²⁷ THE FEDERALIST NO. 10 (James Madison).

¹²⁸ *E.g.*, THE FEDERALIST PAPERS AND THE NEW INSTITUTIONALISM (Bernard Grofman & Donald Wittman eds., 1989); PUBLIC CHOICE AND CONSTITUTIONAL ECONOMICS (James D. Gwartney & Richard E. Wagner eds., 1988); Richard A. Epstein, *Self-Interest and the Constitution*, 37 J. LEGAL EDUC. 153 (1987) [hereinafter Epstein, *Self-Interest and the Constitution*];

cago-school economic theory come together to authenticate public choice as the best descriptive model of American government. In turn, such claims about descriptive “fit” are offered to confirm the model’s superior qualifications for generating prescriptions for further action.¹²⁹

In subpart A, we suggest that, if the goal is explaining the design choices of the structural Constitution, the insights from cognitive theory actually provide a better descriptive model than public choice. We are *not* making the strong explanatory claim that the Framers were proto-cognitive theorists. Moreover, we are agnostic about whether a theory’s capacity to explain the decisions of the Framers enhances its contemporary prescriptive credentials. We are simply observing that, to *whatever* extent it is significant that a model of optimal government design can be overlaid upon the Constitution’s specifications of governing institutions and practices, cognitive theory is in fact a better fit than public choice theory. In subpart B, we begin to develop some of the prescriptive implications of the psychological model for the structures and processes of regulatory policymaking.

A. Positive Implications

1. Legislation

The public choice model is essentially pessimistic about the capacity of government to further the public good.¹³⁰ Deeply suspicious of Congress as obsessed with furthering geographically parochial interests and prey to rent-seeking interest groups, it is profoundly skeptical that legislative policymaking will increase the general welfare.¹³¹ The less legislation produced, the better. The model thus lauds those mechanisms in the Constitution that curb legislatures by making law-making cumbersome.¹³² Bicameralism is valued for increasing the requisite level of political consensus, and hence decreasing the amount of legislation that even the most enthusiastically wealth-trans-

Richard A. Epstein, *Toward a Revitalization of the Contract Clause*, 51 U. CHI. L. REV. 703, 710–17 (1984); Lessig & Sunstein, *supra* note 78, at 93–106; Macey, *supra* note 21; Jonathan R. Macey, *Transaction Costs and the Normative Elements of the Public Choice Model: An Application to Constitutional Theory*, 74 VA. L. REV. 471 (1988); Geoffrey P. Miller, *Rights and Structure in Constitutional Theory*, SOC. PHIL. & POL’Y, Spring 1991, at 196; Cass R. Sunstein, *Naked Preferences and the Constitution*, 84 COLUM. L. REV. 1689, 1690–91 (1984).

¹²⁹ See, e.g., Lessig & Sunstein, *supra* note 78, at 93–106 (using asserted parallel between original structural choices and contemporary concern about rent-seeking and faction as justification for several public choice–based changes to regulatory decisionmaking).

¹³⁰ See, e.g., Jonathan R. Macey, *Cynicism and Trust in Politics and Constitutional Theory*, 87 CORNELL L. REV. 280 (2002).

¹³¹ See *supra* Part II.B.1.

¹³² See, e.g., Macey, *supra* note 69, at 52–59; Macey, *supra* note 128, at 493–95; Miller, *supra* note 128, at 202.

ferring legislature can enact.¹³³ The presentment requirement is praised as erecting not simply an additional hurdle to lawmaking, but a hurdle virtually proof against being undermined by factional pressure.¹³⁴ The creation of a judiciary independent of the legislature through life tenure and salary protection is explained as designed to protect private liberty and property from violence and expropriation.¹³⁵

Yet, on the model's own terms, these are strangely inadequate choices about institutional design *if* the object is controlling destructive, rent-seeking legislative behavior and channeling government power to decisional entities whose self-interest may be more aligned with the public good.

In the first place, the President—modeled to be the most likely source of truly public-regarding policy because he has the least incentive to favor narrowly regional interests and the greatest resistance to capture by interest groups—is given only a limited role in the principal process through which domestic public policy is made. His constitutional prerogative to propose legislation¹³⁶ is merely the opportunity, not the right, to control the legislative agenda. The prerogative to veto is, to be sure, a different matter and can give him significant leverage with Congress. But, in terms of institutional design, the veto is a curiously blunt tool to give the elected decisionmaker with (under the model's assumptions) the best incentives to make good policy choices. The President can block legislation, not rewrite it. With no constitutional provision for a line-item veto, Congress remains free to immunize measures that pander to regional constituents and interest groups by packaging them with measures that the President strongly desires.

Similarly, the courts—whose independence from regional and interest group pressures is modeled as allowing the possibility of decisions aligned with the public interest—are given only limited opportunity to work against suboptimal legislation. Proposals for a Council of Revision, that would have given judges a role in writing

¹³³ See, e.g., Macey, *supra* note 15, at 247–48; Macey, *supra* note 128, at 500–02; see also JAMES M. BUCHANAN & GORDON TULLOCK, *THE CALCULUS OF CONSENT: LOGICAL FOUNDATIONS OF CONSTITUTIONAL DEMOCRACY* 233–48 (1965) (for a mathematical analysis of this issue); ROBERT E. MCCORMICK & ROBERT D. TOLLISON, *POLITICIANS, LEGISLATION AND THE ECONOMY: AN INQUIRY INTO THE INTEREST-GROUP THEORY OF GOVERNMENT* 45–57 (1981) (same).

¹³⁴ Jonathan R. Macey, *Packaged Preferences and the Institutional Transformation of Interests*, 61 U. CHI. L. REV. 1443, 1465 (1994); cf. Calabresi, *supra* note 70, at 78–81 (arguing for expansive presidential line-item veto power as a faction control device).

¹³⁵ See, e.g., Macey, *supra* note 15, at 250–56; Macey, *supra* note 128, at 496–500; Miller, *supra* note 128, at 209–17, 221–22.

¹³⁶ U.S. CONST. art. II, § 3.

statutes, were rejected in the constitutional drafting process.¹³⁷ Thus, like the President, the judiciary is confined to a reactive role. Unlike the President, who can veto legislation because he deems it bad policy, judges are limited by conventional canons of judicial review to invalidating statutes only for unconstitutionality. Beyond that, judicial tools for controlling bad policy choices are the relatively marginal ones of refusing to rely on legislative history and strictly interpreting the text of statutes.

Finally (and most important to our inquiry), the ability of the legislature to enact statutes that delegate enormous power to agencies appears to be an enormous constitutional design defect. Regulatory statutes enable members of Congress to set up vast policymaking enterprises outside the repressive bounds of the Article I, Section 7 process.¹³⁸ Unless agencies are so autonomous of legislative control that they do not need to pander to members of Congress or interest groups in order to preserve their budget and jurisdiction—i.e., unless they are like the Federal Reserve Board—they simply replicate all the dangers of legislatures without even the limited curbs of bicameralism and presentment. And if they *are* so autonomous, it becomes difficult as a theoretical matter to square their existence with the three-branch constitutional structure.

Unitary Executive theorists attempt to save the day by patching together a number of clauses in Article II to discern a basis for placing agencies squarely under the exclusive direction of the President.¹³⁹ The goal is to allow him to avert the dangers of delegation by harnessing regulatory policymaking power to his own, more public-regarding control. But this solution has all the earmarks of a desperate salvage mission. It produces the interpretive incongruity that the vast bulk of important government decisionmaking goes on *outside* the principal constitutional design framework for policymaking (i.e., Article I). Instead, it is squeezed into a constitutional paradigm (law execution), the practices and processes of which are remarkably underspecified given their asserted centrality in determining the domestic public policy of the nation.

¹³⁷ See JACK N. RAKOVE, *ORIGINAL MEANINGS: POLITICS AND IDEAS IN THE MAKING OF THE CONSTITUTION* 261–62 (1996).

¹³⁸ See, e.g., Macey, *supra* note 128, at 514 (“The very existence of such agencies is a glaring contradiction of the carefully constructed lawmaking procedures articulated in article I . . .”); see also Epstein, *Self-Interest and the Constitution*, *supra* note 128, at 156 (arguing that delegation is therefore unconstitutional); William T. Mayton, *The Possibilities of Collective Choice: Arrow’s Theorem, Article I, and the Delegation of Legislative Power to Administrative Agencies*, 1986 DUKE L.J. 948, 964–65 (same).

¹³⁹ The principal textual elements of the argument are the Article II Vesting Clause, the Opinions Clause, and the Take Care Clause, U.S. CONST. art. II, § 1, cl. 1, § 2, cl. 1, § 3. See, e.g., Calabresi & Prakash, *supra* note 78, at 570–72, 582–85; cf. Lessig & Sunstein, *supra* note 78 (disputing this interpretation on textual and contextual grounds).

The psychological model offers a contrasting perspective. Less relentlessly pessimistic about the capacity of humans to establish public institutions and practices that produce good policy decisions, it more comfortably explains many structural features of American government policymaking.

First and perhaps most essential, the psychological model does not proceed from hostility to legislatures and their decisional product. As a group of largely lay decisionmakers, Congress can make mistakes, but it also has greater potential than any of the other key constitutional actors for creating expertise within itself and structuring its processes to correct for errors.¹⁴⁰ If principal policymaking responsibility is assigned to a collegial body of any appreciable size, a committee structure can be reasonably expected quickly to emerge. And, indeed, this was exactly what happened in the early Congresses.¹⁴¹ Committees provide the opportunity for an efficient allocation of work and, most important for present purposes, the development of expert knowledge and experience. Particularly in the design of the Senate (which incorporates not only the longest term of any elected federal official but also provision for staggered elections), an institutional memory both of substantive knowledge and decisionmaking competence was ensured. At the same time, because legislation cannot pass without the votes of members not in the responsible originating committee(s), the body as a decisional whole has some protection against proposals generated by overconfident experts. Bicameralism provides even further protection. Requiring debate and approval by two chambers—with different constituencies, different repositories of expertise, and different procedures—helps ensure that problems are examined from different perspectives and may help moderate the influence of various cognitive illusions.

Similarly, in this model the relatively modest role of the President in the lawmaking process is easier to understand. The President can be a supplementary institutional defense against errors that elude corrective mechanisms within the legislature itself. Experts are sometimes wrong, and if the repositories of expertise in Congress have managed to lead their colleagues into error, the presentment requirement offers yet another perspective on the substantive problem. But, because he is a perpetual layperson in the system, the President's formal constitutional role in lawmaking does not extend beyond this checking function into a prerogative to rewrite the content of legislation. The exception to this preference for placing primary decisional

¹⁴⁰ See *supra* Part II.B.1.

¹⁴¹ See, e.g., DAVIDSON & OLESZEK, *supra* note 98, at 200 ("About 350 ad hoc committees were formed during the Third Congress (1793–1795) alone."); GEORGE B. GALLOWAY, HISTORY OF THE HOUSE OF REPRESENTATIVES 70–108 (2d ed. 1976).

responsibility in the elected body most capable of developing expertise is presidential authority in the context of military matters and some foreign affairs. Here, the requirements of rapid action and highly centralized decisionmaking necessarily trump concerns about vulnerability to cognitive illusions.

In the psychological model, the courts are not expected to constrain a perpetually untrustworthy legislature with the meager tools of minimum rationality review and grudging interpretive techniques. Rather, the judiciary performs the subsidiary (though important) function of making statutes work in specific contexts. Overconfident legislatures might fail to spot issues incompletely resolved or problems inadequately addressed. Just as civil engineers know that, despite their expertise, they cannot anticipate all of the ways in which their buildings might fail in practice, so thoughtful designers of government decisional structures would know that legislatures cannot anticipate all of the ways in which statutes might fall short when applied. Consequently, a gap-filling institution must be provided. For *this* purpose, the courts' "one case at a time" methodology is not so troublesome. So long as the statute is relatively clear in its substantive objectives and methodological choices, judges can reason their way incrementally toward completing the details within the master legislative plan.

In other words, rather than modeling the President and the judiciary as designed to counteract the rampant rent-seeking of a voracious legislature with a limited set of relatively feeble reactive tools—an institutional design about as astute as asking Hercules to clean out the Augean stables with a spoon and a water pistol—the psychological model sees these actors as sensibly situated to respond to the kinds of mistakes or shortcomings of judgment that Congress might be predicted to make. Their powers and practices are well-suited to multiplying the perspectives from which a problem is viewed, checking the overconfidence of expertise, and filling the voids inevitable in prospective judgment.

Finally, in the psychological model, legislation that broadly delegates the job of solving complex regulatory problems to administrative agencies presents an opportunity for better decisionmaking, rather than an occasion for constitutional hand-wringing. If well-structured—designed to exploit the cognitive superiority of true expertise while compensating for its cognitive vulnerabilities—a system of administrative agencies is the best institutional recipient of the responsibility to particularize regulatory goals and means, within general policy outlines supplied by the legislature. Moreover, as the next section explains, the relationships between agencies and the courts and the President need not be radically discontinuous with the role of

judges and the Chief Executive when policy emerges directly from Congress. Rather, what the judiciary and the White House bring to the administrative decisional process is quite similar in objective to their role in legislation although, in the case of agency decisionmaking, a more intensive methodology may be justified.

2. *Review of Administrative Action*

In the public choice model, agencies are only slightly less trustworthy than legislatures, pandering to interest groups either directly or derivatively through the influence of powerful members of Congress. Two significant developments in administrative law in the 1970s—(1) the expansion of participation rights that opened both agency rulemaking and (to a lesser extent) adjudication to a wide range of groups representing the public as well as narrower interests, and (2) the intensification of judicial review from the traditionally deferential version of rationality review to the searching scrutiny of “hard look”—might be understood to address the problem of agency capture by counteracting agency alliances with powerful political insiders.¹⁴²

As with legislation, however, the remedy is not very well tailored to the public choice diagnosis. There is little chance that compulsory exposure to other points of view during the policymaking process will redeem an agency that has sold out to an interest group. Even under the regime of hard-look review, an agency determined to adopt a policy favoring a particular political constituency has abundant opportunities, in how it creates the record and explains its decision, to disguise its pandering. Only in the marginal case in which the interest-group-favoring policy cannot be even plausibly justified within the typically capacious boundaries of the statutory delegation and the typically conflicting contents of the administrative record, will public participation and judicial review defeat agency capture.

By contrast, public participation and judicial supervision are excellent cures for an agency pursuing its public-interested mandate in good faith, but predictably vulnerable to expert myopia and overconfidence. Hard-look review forces an agency to articulate the factors it considers relevant to its decision, engage in some perceptible assessment of alternative courses of action, and respond to meaningful comments by outsiders. Cognitive psychological research indicates that one of the best mechanisms for reducing overconfident judgments is forcing oneself to consider alternatives and carefully review arguments against one's position. Having to assess the force of criti-

¹⁴² See Richard B. Stewart, *The Reformation of American Administrative Law*, 88 HARV. L. REV. 1669 (1975).

cisms coming from a variety of perspectives, and craft a persuasive response to those criticisms that are (or may be viewed by a reviewing court as) significant, helps an agency to step outside of the decision-making process. In other words, under an assumption that agencies are attempting to make good decisions, rather than determined to get away with bad ones, structuring administrative decisionmaking to provide meaningful public participation and to culminate in hard-look review is a thoroughly sensible debiasing strategy.¹⁴³

As a general matter then, the psychological model sees judicial oversight of agencies as parallel to the judicial role in legislative decisionmaking. The primary responsibility for judgment rests with those who have developed some expertise; review by a generalist judiciary is available to moderate problems of expert overconfidence. What differs in the case of agency decisionmaking is the *intensity* of the oversight. Judicial review makes far more demands—in terms of process, sufficiency of record, and explanation—of agencies than of Congress. Several institutional factors could account for this difference. Agency decisional protocols typically do not replicate the broad multi-perspectivity provided by bicameralism and presentment. Moreover agencies, unlike Congress, are not routinely called upon to solve problems outside a particular regulatory area; although they gain in depth of expertise from this concentrated focus, they pay a price in breadth of vision. These institutional differences may justify more concern for external debiasing of agency decisionmaking, and so could explain the emergence of more assertive judicial review.

Significantly, however, all of the intensity of hard-look review is directed toward identifying flaws in the agency's decisional process. *So long as the practice accords with the theory*, hard-look review is not a direction for judges to take a more aggressive substantive role in policymaking by displacing the agency's judgment. Much of the gain from delegation to a body of experts would be lost if the oversight process were structured to allow their judgment to be readily supplanted by the vulnerable judgment of laypersons.

This latter observation may explain the fact that the President has a less direct role in agency policymaking than he has in the legislative process. The veto power has historically been understood to allow (perhaps even encourage) the President to block legislation because he deems it bad policy. Some Unitary Executive theorists have argued that the President should have the identical prerogative with respect to agency decisionmaking.¹⁴⁴ However, mainstream administrative

¹⁴³ See Mark Seidenfeld, *Cognitive Loafing, Social Conformity, and Judicial Review of Agency Rulemaking*, 87 CORNELL L. REV. 486, 490–91 (2002) (arguing that judicial review of rulemaking improves “the overall quality of rules”).

¹⁴⁴ See, e.g., Calabresi & Prakash, *supra* note 78, at 595–96.

law theory and conventional practice do not give the President this degree of authority to substitute his judgment for the agency's. Rather, White House oversight—again, *to the extent that practice accords with theory*¹⁴⁵—is aimed at countering expert overconfidence and myopia. Particularly with respect to the latter problem (i.e., failure of the agency to recognize the implications of its decision for other areas), presidential oversight can bring something to the decisional process that judicial oversight cannot. Courts are good at focusing on how well the agency has thought through a particular problem within the confines of a particular administrative record. Presidents, sharing with Congress the need to attend to the universe of public policy problems, are good at focusing on how well the agency's proposed solution fits into the larger framework of national regulatory policy.

B. Normative Implications

The foregoing suggests that, in terms of optimal institutional design, American government has gotten it pretty much right. More specifically, it suggests that the U.S. public policymaking process does not have the sort of deep, systemic flaws that produce pervasive, inevitable regulatory failure. And, indeed, we place ourselves squarely in the camp of those who think that the failure thesis is often overstated.

Still, regulation goes wrong more often than contemporary Americans are willing to accept.¹⁴⁶ What insights can the psychological model offer to decrease the incidence of poor regulatory judgments?

¹⁴⁵ See *infra* text accompanying notes 158–67.

¹⁴⁶ Revealing a robust capacity for paradox, Americans continue to demand government solutions to environmental, social, and economic problems while condemning government action as incompetent and wasteful. For example, in 1997 Paul C. Light, political scientist and first director of the Center for Public Service at the Brookings Institution, reported bleakly that “[a]n overwhelming majority of Americans . . . believe that government wastes their money and causes more problems than it solves.” Paul C. Light, *The ‘Quiet Crisis,’ 10 Years Later*, GOV'T EXECUTIVE, Dec. 1997, at 53. Yet poll data from the 1980s and 1990s show that not only did the majority not support decreased government spending on domestic programs, but it consistently favored *more* federal spending on education, the environment, health, and the poor. *E.g.*, GEORGE C. EDWARDS III, *AT THE MARGINS: PRESIDENTIAL LEADERSHIP OF CONGRESS* 139, 149–57 (1989); BENJAMIN I. PAGE & ROBERT Y. SHAPIRO, *THE RATIONAL PUBLIC: FIFTY YEARS OF TRENDS IN AMERICANS' POLICY PREFERENCES* 169–70, 373–74 (1992); MARTIN P. WATTENBERG, *THE RISE OF CANDIDATE-CENTERED POLITICS: PRESIDENTIAL ELECTIONS OF THE 1980s*, at 101–10, 123–29 (1991); Shane, *supra* note 93, at 197 & n.156; *cf.* John Mark Hansen, *Individuals, Institutions, and Public Preferences over Public Finance*, 92 AM. POL. SCI. REV. 513, 515 tbl.1 (1998) (reporting strong popular preference for cuts in defense spending but *not* spending on domestic programs to lower taxes and balance the budget, and for cutting defense to increase spending on domestic programs).

1. *An Elaboration on Our Initial Caveat—Deconstructing Claims of Regulatory Failure*

Before offering some preliminary answers to that question, we return to the issue of what constitutes “bad” public policymaking, in order to advocate a more critical dissection of the concept of regulatory failure.

Others, including Symposium participant Lisa Heinzerling, have begun to respond to regulatory failure claims by showing that the data relied upon are often inaccurate, exaggerated, or poorly analyzed.¹⁴⁷ This work aims at inducing a healthy skepticism, *based on the data itself*, about whether regulatory policy is as inefficient or counterproductive as critics contend. We wish to suggest another sort of skepticism about claims of regulatory failure. Cognitive biases can operate as insidiously in the *evaluation* of regulatory policy as in its *design*. In particular, the contemporary predilection for toting up the list of regulatory fiascos (i.e., occasions when government should have known—or, under public choice assumptions, did know—better than to think that a certain regulatory policy would further the public good) is an invitation for hindsight bias to run wild.¹⁴⁸

But, one might object, if a regulatory program *in fact* fails to further its announced social welfare objective, does it matter whether the

¹⁴⁷ Heinzerling, *supra* note 5; Heinzerling & Ackerman, *supra* note 5. Other literature challenging the various regulatory failure stories includes Hillman, *supra* note 2; and Jeffrey J. Rachlinski, *Protecting Endangered Species Without Regulating Private Landowners: The Case of Endangered Plants*, 8 CORNELL J.L. & PUB. POL'Y 1 (1998).

¹⁴⁸ Recent criticism of the choice, in the Energy Policy and Conservation Act (EPCA), Pub. L. No. 94-163, 89 Stat. 871 (1975), to deal with the energy crisis by forcing manufacturers to design more fuel-efficient automobiles is a good example. More than twenty-five years after the imposition of the corporate average fuel economy (CAFE) requirements, the United States imports a larger percentage of its oil than when the statute was enacted. Two factors appear to explain this. First, as both higher fuel efficiency and lower gasoline prices brought down the cost of driving, Americans increased the number of miles driven. Second, fifty percent of consumer auto purchases now involve minivans, sport-utility vehicles (SUVs), or light trucks, all of which fall within a single regulatory category that was originally exempted from the most stringent fuel requirements because of concern for farmers and ranchers who were, back in 1975, their principal consumers. See Hillman, *supra* note 2, at 12–14 (recounting details of this situation).

Was the CAFE approach a “bad” government decision in 1975? Only if policymakers trying to recover from the political and economic chaos caused by the OPEC embargo should have anticipated (1) that Americans’ romance with the road would lead them to spend all the savings of higher fuel efficiency and lower gas cost on more vehicle miles, and (2) that the light truck market—traditionally the territory of farmers and ranchers—would be transformed first by Yuppies whose need to transport their children induced the evolution of van into minivan, and then by Generation Xers whose generous endowment of money and self-confidence craved the power and invulnerability promised by the SUV. Blaming those who enacted and implemented EPCA for poor regulatory judgment seems to us a classic example of the hindsight bias. For an argument that retrospective policy assessment using the public choice model systematically encourages mischaracterization of the reasons for regulatory failure, see Farina, *supra* note 89.

story told about the failure reflects a cognitive bias or two? We suggest that it matters a great deal *if* the objective is improving the quality of regulatory decisionmaking, rather than discrediting the entire regulatory enterprise. A serious commitment to decreasing the incidence of regulatory failure requires not only careful verification of the “facts” of a policy’s miscarriage but also careful assessment of the causes. Regulatory failure sometimes occurs because the initial policy judgment was reasonable but wrong, and refusing to acknowledge the role of human fallibility in producing bad government decisions is just the collective version of the egocentric bias. No system of institutional design will give regulators perfect prescience. Institutional designers can, however, attempt to build in requirements of data collection and analysis, as well as incentives for periodic policy reassessment.¹⁴⁹ As we discuss below, devising effective strategies for overcoming the “stickiness” of imperfect regulatory decisions turns out to be a particularly difficult challenge for the institutional designer.¹⁵⁰ However, this challenge will never be met without recognizing that the goal is a process design that facilitates conscious adaptive evolution—i.e., that increases the odds of a program recovering from initial errors (no matter how reasonable) by becoming smarter.

Finally, a serious commitment to diagnosing the causes of regulatory failure must also include some acknowledgment of operative democratic constraints. Institutional design (at least, the sort of institutional design we are discussing) is not about trying to short-circuit democracy. When public policymaking institutions “badly” choose a second-best strategy because the first-best strategy has been taken off the table by strongly held public opinion, the policy scientist’s regulatory failure may be the political philosopher’s success story.¹⁵¹ Having said this, we are *not* suggesting that institutions of democratic governance are, or should be, powerless whenever “good” regulatory choices

¹⁴⁹ In other words, although the EPCA approach cannot reasonably be criticized for not being perfect, it can fairly be criticized for not learning from its mistakes. Whatever the reasonableness of the original exemption for light trucks, failing to adjust regulatory strategy to respond to the craze for gas-guzzling SUVs is, indubitably, bad decisionmaking.

¹⁵⁰ See *infra* Part III.B.3.

¹⁵¹ Again, the EPCA is a good example. The “best” regulatory response to the problem of U.S. dependence on foreign oil might be to force consumers to internalize the costs of such dependence by allowing the market to determine gas prices and vehicle redesign. However, *laissez faire* in the face of steeply escalating fuel prices was even less politically acceptable during the oil embargo than it is today. A comprehensive understanding of how the CAFE approach emerged as our national regulatory strategy must take into account the policy alternatives that were realistically available. A citizenry that broadly and firmly resists higher fuel prices may be reasonably pursuing a normative judgment that allowing the costs of heat and transportation to rise is unacceptably regressive. Or it may be just foolishly self-indulgent and shortsighted. But responsible regulatory policy critique should openly acknowledge the tension between technocratic rationality and democratic responsiveness.

encounter the political barrier of strongly held public opinion. We do not believe that policymaking processes should be designed on the assumption that citizen preferences are endogenous, stable, and immutable. Again, our point is that different species of regulatory failure must be distinguished in order to identify the appropriate design objective. When it would be "bad" policy to give people what they want, the institutional designer needs to think about how government can either (1) facilitate an educational process through which citizens' views might become more enlightened, and/or (2) employ regulatory strategies that dampen or evade the worst effects of harmful preferences.

We do not mean to imply that this will be easy. Devising strategies for changing or neutralizing unwise collective preferences may present even more vexed problems for institutional design than overcoming the "stickiness" of imperfect regulatory solutions. Moreover, deliberate efforts at preference modification raise complex normative questions about how much government *should* engage in efforts to shape, rather than respond to, the will of the people. One thing, however, is certain: For the species of regulatory failure attributable to government responding to unwise preferences of the citizenry, satisfactory solutions are unlikely to be found if the right questions are not being asked.

With this caveat against viewing regulatory failure as a generic problem susceptible to a one-size-fits-all solution, it is possible to outline several general principles and components of a policymaking process that minimizes the damage done by cognitive errors.

2. *The Fundamental Insight: Effectively Allocating Policymaking Responsibility Between Experts and Lay Decisionmakers*

Probably the key insight of the cognitive psychological model is that the policymaking process should be designed to exploit the distinctive strengths, and compensate for the distinctive weaknesses, of experts and laypersons. In contemporary administrative government, this means that setting regulatory policy should be primarily the domain of administrative agencies making judgments through a process of information-gathering and vetting, within the parameters of legislation that has received full substantive deliberation by Congress and its committees.

The President and the judiciary should play the important but decidedly supplementary role of keeping an eye on the experts. They should be watching for instances in which the expert body fails to tap its specialized knowledge and decisional competence (e.g., rapidly passed legislation) or seems to have succumbed to overconfidence (e.g., a rulemaking record that fails adequately to respond to signifi-

cant critical comments). They should not mistake themselves for experts.

Several specific propositions follow from this general allocation of responsibility.

a. *Deference to Congress and Openness to Its Legislative History*

Because the cognitive model is far more optimistic about the policymaking capacity of Congress than is the public choice model, it does not share the latter's hostility to the use of legislative history in statutory interpretation. To the extent that legislative materials are written by committees and others with expertise, they can help convey an expert's view of the underlying policy concerns.¹⁵² Of course, courts

¹⁵² Justice Scalia, in particular, has expressed concern that committee reports accompanying legislation are more representative of the views of staff than members of Congress. See, e.g., *Hirschey v. FERC*, 777 F.2d 1, 7-8 (D.C. Cir. 1985) (Scalia, J., concurring). From a public choice perspective, this is a peculiar argument. A model that maintains that "committees are engines of *rent-seeking*, or the distribution of unjustified benefits to interest groups," *ESKRIDGE ET AL.*, *supra* note 100, at 71, cannot simultaneously complain that members do not keep up with the principal product the committee produces. But, in any event, Justice Scalia's concern seems overstated.

The role of burgeoning congressional staff has been controversial, e.g., MICHAEL J. MALBIN, *UNELECTED REPRESENTATIVES: CONGRESSIONAL STAFF AND THE FUTURE OF REPRESENTATIVE GOVERNMENT* (1980), but the numbers should be kept in perspective: Most of the increase in personal staff has gone to constituent service, while the bulk of other staff increases reflect growth of support services such as the GAO, see *supra* note 102. Moreover, in the 1990s the growth trend reversed, and both personal and committee staff members declined significantly by the century's end. See *ORNSTEIN ET AL.*, *supra* note 102, at 126, 132 fig.5-1. It is certainly true that members of Congress do not attend all proceedings of, and read all documents generated by, each committee and subcommittee to which they belong. Not surprisingly, members of Congress deliberately make choices about the issues and intensity of their committee engagement, choices that Richard Hall's study of participation in Congress revealed to be variously motivated: "what [active members] variously want is to serve district interests (service that presumably enhances their reelection chances), pursue personal policy interests or ideological agendas, or promote the agenda of a president from their own party." *HALL*, *supra* note 16, at 174. Committees have mechanisms for controlling principal-agent problems with staff. See, e.g., Roger H. Davidson, *What Judges Ought to Know About Lawmaking in Congress*, in *JUDGES AND LEGISLATORS: TOWARD INSTITUTIONAL COMITY* 90, 107-08 & nn.37-38 (Robert A. Katzmann ed., 1988) (noting House Judiciary Committee rule requiring three-day notice to all members prior to issuance of a proposed report, with opportunity to file supplements or dissents, and Committee on Science and Technology rule restricting post hoc alterations in hearing transcripts). Moreover, the knowledge that fellow legislators will look primarily to committee reports as background to voting, see *supra* note 100, provides strong incentives, at least in major bills, for committee members to monitor the contents of those reports, see McNollgast, *Legislative Intent: The Use of Positive Political Theory in Statutory Interpretation*, *LAW & CONTEMP. PROBS.*, Winter 1994, at 3, 11 n.23.

The observation that committees and their staffs do most of the legislative work and that the floor majority rarely inspects all of their efforts implies nothing about whether the floor majority has abdicated its formal role. If the floor has created effective incentives for its committees and staff in its structure and process, it need not constantly monitor their work product to assure compliance with the interests of the floor majority.

should not ignore the possibility that legislative history has been surreptitiously doctored by interests that could not succeed openly in the lawmaking process.¹⁵³ Nevertheless, the absolute rejection of legislative history demanded by the strict-textualist movement can undermine the respective institutional strengths of courts and Congress.

In the first place, strict textual interpretation of statutes by judges is almost guaranteed to create perverse outcomes. Even a Congress that has fully realized its potential for expertise in drafting a regulatory statute will have difficulty foreseeing, and hence controlling, precisely how the text will function across the gamut of particular applications to which the statute speaks.¹⁵⁴ Consequently, strict adherence to text, without a sympathetic attempt to discern and implement the underlying purposes of a statute, is almost certain to undermine the statutory goals.

In addition, purportedly literalist interpretation almost invariably involves considerable discretion to select among possible meanings.¹⁵⁵ Although more traditional and eclectic methods of interpretation also require judicial choices (e.g., how to value and resolve conflicting items in legislative history), the exercise of discretion in such methods is undisguised. Hence, it is subject to the discipline of being explained and justified as effective in discerning the legislative purpose. In contrast, strict textualism wraps judicial discretion in the guise of “just” reading the text. Hence, it allows judges to make policy choices *sub rosa*, without either the cognitively valuable exercise of justification

Id. For a review of the House and Senate rules establishing content and notice requirements for committee reports, see PHILIP P. FRICKEY & STEVEN S. SMITH, JUDICIAL REVIEW AND THE LEGISLATIVE PROCESS: SOME EMPIRICAL AND NORMATIVE ASPECTS OF DUE PROCESS OF LAWMAKING 24–25 (UC Berkeley Sch. of Law, Public Law and Legal Theory Working Paper No. 63, 2001), available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=279433.

¹⁵³ See, e.g., Devins, *supra* note 99, at 1184. This concern, another frequent argument of textualists, may also be overstated: “[B]ecause legislation today often involves numerous conflicting interest groups, the possibility of ‘pulling a fast one’ in the legislative history is somewhat remote. What one group smuggles into the history, other groups have an incentive to find and counter. Thus, competition between interest groups helps keep the system honest.” FARBER & FRICKEY, *supra* note 5, at 98 (footnote omitted).

¹⁵⁴ Nature has a nasty habit of creating situations in which the applicability of a statute is unclear. But even if nature were not unkind, the meaning of statutes would still be problematic because language is inherently imprecise and because rational political actors, having numerous competing ways to occupy their time, would never devote the effort necessary to minimize the indeterminacy of statutory language.

McCubbins et al., *supra* note 152, at 13.

¹⁵⁵ For a perceptive explication of how textualism is a “more creative, less deferential style of judging,” see Thomas W. Merrill, *Textualism and the Future of the Chevron Doctrine*, 72 WASH. U. L.Q. 351, 372 (1994); and WILLIAM N. ESKRIDGE, JR., DYNAMIC STATUTORY INTERPRETATION 42–47, 133–35 (1994). For critique of the indeterminacy of public choice–inspired textualism in the context of a particular regulatory scheme, see Rand E. Rosenblatt, *Statutory Interpretation and Distributive Justice: Medicaid Hospital Reimbursement and the Debate over Public Choice*, 35 ST. LOUIS U. L.J. 793, 807–14 (1991).

or the restraining mindset of a faithful agent seeking to implement the goals of the legislative principal.¹⁵⁶

To be sure, *appropriate* use of legislative history can be a challenge for courts. It is often fragmentary, sometimes conflicting, and always potentially tilted by the views of congressional outliers. Nevertheless, it is a potential window into expert assessment of the problem that the statute attempts to address. As such, cognitive theory provides theoretical support for more traditional styles of interpretation: Legislative history is a tool judges should thoughtfully employ, not reject out-of-hand in favor of a literalist approach that too easily camouflages inexperienced judicial policymaking.¹⁵⁷

b. *The Potential Value of External Review*

External review of administrative agencies has become a fixture of the modern administrative state. Judicial review, particularly since the procedural enhancement of notice-and-comment rulemaking and the correlative emergence of hard-look review in the 1970s, is a significant final step in the adoption of most significant regulatory policy. More recently, a series of Executive Orders, the details of which have varied with administration, have required executive agencies to submit their regulatory agendas and proposed major rules to the OMB, specifically the Office of Information and Regulatory Affairs (OIRA), for intensive White House review.¹⁵⁸

From a psychological perspective, processes for external review fit the model of sensible governance well. Agency experts are allocated the task of drafting detailed substantive policy, but their proposals must be examined by another entity (or entities) with a different perspective on the underlying problem. Such examination can counter-

¹⁵⁶ Cf. Merrill, *supra* note 155, at 373 (arguing that textualism is inconsistent with the model of the courts as “faithful agents of the politically accountable branches”).

¹⁵⁷ As Professors Farber and Frickey note, the best advocates of traditional approaches, such as Henry Hart and Henry Friendly, have had a sophisticated understanding of the need “to sort the wheat from the chaff,” FARBER & FRICKEY, *supra* note 5, at 99, and have taken a carefully nuanced approach to the use of legislative history, *see id.* at 99–100. For a very different sort of effort to identify when and how to use legislative history, see Devins, *supra* note 99, at 1213 (suggesting a model in which judicial deference would be contingent on identifying “the circumstances in which Congress has the incentives to take factfinding seriously”); and McNollgast, *supra* note 152 (using positive political theory to suggest ways in which courts can separate meaningful evidence about legislation’s intended effects from “cheap talk” that should be disregarded). Cf. FRICKEY & SMITH, *supra* note 152, at 29 (warning that “when [as is often the case in Congress] policy is . . . constructed through a competitive process of coalition building, bargaining, and voting,” it is unrealistic to expect “that inherently political process” to conform to the model of “a hypothetical rational policy-making process”).

¹⁵⁸ The independent agencies have been exempt from these requirements. *See* Lessig & Sunstein, *supra* note 78, at 107 & n.438 (arguing that this exemption is neither constitutionally required nor sound).

act the overconfidence and tunnel vision of expertise without displacing the primary role of experts in policy formulation.

In theory, OMB review and judicial review are sound complements. Ideally, the former allows a technically sophisticated vetting of the agency's analysis before a group of examiners sufficiently adept to understand it but uninvested, either personally or professionally, in the particular proposal. Again ideally, the latter brings the lay perspective back into the policymaking process: As the culmination of the notice-and-comment process, it pushes the agency to articulate the relevant decisional factors, engage in some perceptible assessment of alternative courses of action, and respond to meaningful comments by outsiders. The question is whether the actual practice of OMB review and judicial review sufficiently matches the ideal to realize the potential benefits of external review.

With respect to OMB review, the practice has varied across administrations. Regulatory review under the Reagan Administration differed in very significant ways from review under the Clinton Administration.¹⁵⁹ (During the intervening Bush Administration, OIRA had become the focus of a Democratic Congress's displeasure and, as appointment of a new director became mired in political stalemate, principal responsibility for regulatory review shifted to the Council on Competitiveness.)¹⁶⁰ Assessments of OMB's performance over time are, not surprisingly, conflicting.¹⁶¹ Still, it appears reasonably safe to say that the agency's effectiveness in providing technically sophisticated external review was compromised whenever it was perceived as engaged in the very different function of reviewing policy proposals for conformity with the President's political or ideological agenda. This perception was highest in the first term of the Reagan Administration and abated somewhat in the Clinton Administration.¹⁶² In any

¹⁵⁹ See SHELLEY LYNNE TOMKIN, *INSIDE OMB: POLITICS AND PROCESS IN THE PRESIDENT'S BUDGET OFFICE* 184–90, 196–283 (1998); Shane, *supra* note 93, at 174–92.

¹⁶⁰ TOMKIN, *supra* note 159, at 213–16; Shane, *supra* note 93, at 167–68.

¹⁶¹ See, e.g., NAT'L ACAD. OF PUB. ADMIN., *THE EXECUTIVE PRESIDENCY: FEDERAL MANAGEMENT FOR THE 1990s* (1988); NAT'L ACAD. OF PUB. ADMIN., *REVITALIZING FEDERAL MANAGEMENT: MANAGERS AND THEIR OVERBURDENED SYSTEMS* (1983); Christopher C. DeMuth & Douglas H. Ginsburg, *White House Review of Agency Rulemaking*, 99 HARV. L. REV. 1075 (1986); E. Donald Elliott, *TQM-ing OMB: Or Why Regulatory Review Under Executive Order 12,291 Works Poorly and What President Clinton Should Do About It*, LAW & CONTEMP. PROBS., Spring 1994, at 167; Alan B. Morrison, *OMB Interference with Agency Rulemaking: The Wrong Way to Write a Regulation*, 99 HARV. L. REV. 1059 (1986); Richard H. Pildes & Cass R. Sunstein, *Reinventing the Regulatory State*, 62 U. CHI. L. REV. 1 (1995); Sidney A. Shapiro, *Political Oversight and the Deterioration of Regulatory Policy*, 46 ADMIN. L. REV. 1 (1994).

¹⁶² See THOMAS O. MCGARITY, *REINVENTING RATIONALITY: THE ROLE OF REGULATORY ANALYSIS IN THE FEDERAL BUREAUCRACY* 286–87 (1991) (reporting “a strong sense among most agency analysts that a good analysis will not save a decision with which [Reagan-era] OMB disagrees and a poor analysis will not slow down a decision with which OMB agrees”); TOMKIN, *supra* note 159, at 95, 102, 210, 216, 220–21, 256–57; Matthew Holden, Jr., *Why Entourage Politics is Volatile*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 61, 75 (re-

event, the pattern of staffing OIRA with "'desk officers,' who are typically young economists, lawyers, or policy analysts with little prior experience in government or with the programs they oversee,"¹⁶³ seems ill-suited to providing technically adept expert review.¹⁶⁴

Some commentators have argued vehemently that OMB pressure on agencies to conform to the President's policy agenda is a thoroughly appropriate—indeed, highly desirable—infusion of democratic control into regulatory decisionmaking.¹⁶⁵ Others have as vigorously disputed the claim that presidential elections represent a regulatory policy mandate from the people that is carried out through White House review.¹⁶⁶ We take no position, in this Article, on that debate. We simply observe that *whatever* the democratic value of review designed to achieve ideological or political influence over the regulatory policy process, such review is unlikely simultaneously to realize the potential of external review to catch and correct the cognitive illusions of agency experts.¹⁶⁷

In sum, although the White House is a thoroughly sensible location for evaluating proposed policy for consistency with the President's political and ideological agenda, it may not be the best locus for a technically sophisticated review process aimed at countering the cognitive errors of agency experts.¹⁶⁸

porting agency perceptions that the Reagan OMB sided with and passed information along to industrial interests, and was "'vindictive" towards dissenting agencies); Terry M. Moe, *The Politicized Presidency*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 135, 151–52 (describing the role that "a new OMB unit, staffed by presidential partisans" played in the Reagan Administration's strategy for controlling regulatory policymaking).

¹⁶³ Harold H. Bruff, *Presidential Management of Agency Rulemaking*, 57 *GEO. WASH. L. REV.* 533, 557 (1989).

¹⁶⁴ See HAHN, *supra* note 1, at 32 (analyzing OMB's own data to conclude that OIRA review did not have a significant effect on the cost-effectiveness of regulations); MCGARITY, *supra* note 162, at 281 (reporting agencies' "almost uniformly negative" assessment of technical quality of OIRA staff analyses); WALTER WILLIAMS, *MISMANAGING AMERICA: THE RISE OF THE ANTI-ANALYTIC PRESIDENCY* 4–8, 94–95 (1990) (concluding that, because of OIRA staff members' administrative and programmatic inexperience, agencies often produced better analyses than it did); Shapiro, *supra* note 161, at 24 (criticizing the technical quality of OMB review because responsible staff "have had little or no scientific or technical expertise"; moreover, OMB did not reliably counter agency myopia because "lack of expertise and experience" and "distrust of the agencies they were reviewing" caused reviewers to miss important issues and fight about unimportant ones).

¹⁶⁵ See, e.g., DeMuth & Ginsburg, *supra* note 161; Lessig & Sunstein, *supra* note 78, at 102–03, 106–07.

¹⁶⁶ See, e.g., Farina, *supra* note 77; Shane, *supra* note 93, at 197–200.

¹⁶⁷ Cf. ROCKMAN, *supra* note 106, at 207 (noting the "conflict between . . . pervasive presidential centrism . . . on the one hand, and knowledgeable decision making, on the other," and observing that, in administrations that emphasize strong presidential control over policymaking, decisions are then "imposed to be legitimized and accepted by experts rather than to be shaped by them or sharply debated between them").

¹⁶⁸ Cf. ROBERT W. HAHN & ROBERT E. LITAN, *IMPROVING REGULATION: START WITH THE ANALYSIS AND WORK FROM THERE*, TESTIMONY BEFORE THE SUBCOMMITTEE ON REGULATORY REFORM AND PAPERWORK REDUCTION, HOUSE COMMITTEE ON SMALL BUSINESS 7 (AEI-Brook-

There *are* other design options. Congress can legislate in external evaluation as part of specific regulatory programs; versions of this strategy currently exist in some environmental and safety regulation.¹⁶⁹ Proposals to implement a generally applicable requirement of peer review have played a prominent role in recent regulatory reform bills.¹⁷⁰ A related strategy, which shares some of the cognitive virtues of external review, is legal requirements that the agency consider some factor outside the normal range of its expertise (e.g., environmental impact) during the decisional process. Such requirements force the agency to adopt a different perspective, helping it to transcend the myopia and overconfidence that experts may experience.¹⁷¹

Apart from such externally imposed obligations, agencies themselves have sometimes recognized the value of expert review and voluntarily incorporated it into their decisionmaking.¹⁷² A related strategy involves the agency deliberately dividing responsibility for policy formation among staff from different internal subunits. Sometimes these staff work as a team on a model of collaborative, interdisciplinary decisionmaking; other times, a more confrontational relationship—on the model of the Kennedy national security team—

ings Joint Ctr. for Regulatory Studies, Testimony No. 00-1, 2000) (recommending that Congress create “a congressional office of regulatory analysis . . . or a separate agency outside of the executive branch” to check the regulatory analysis done by OIRA), *available at* http://www.aei.brookings.org/publications/testimony/testimony_00_01.pdf.

¹⁶⁹ See, e.g., 7 U.S.C. § 136w(e) (1994) (EPA; pesticide studies); 42 U.S.C. § 9604(i) (13) (1994) (certain Superfund studies); 42 U.S.C. § 2039 (1994 & Supp. V 1999) (Nuclear Regulatory Commission; reactor licensing); 49 U.S.C. § 44912(c) (1994) (Federal Aviation Administration; antiterrorist strategies).

¹⁷⁰ E.g., Regulatory Improvement Act of 1999, S. 746, 106th Cong. (1999); Science Integrity Act, H.R. 574, 106th Cong. (1999); see Fred Anderson et al., *Regulatory Improvement Legislation: Risk Assessment, Cost-Benefit Analysis, and Judicial Review*, 11 DUKE ENVTL. L. & POL'Y F. 89 (2000). For useful discussion of the current interest in peer review, as well as thoughtful assessment of how external review could be integrated into the existing practices of administrative decisionmaking so as to “help administrative agencies aspire to the deliberative ideal recently espoused by civic republican scholars,” see Lars Noah, *Scientific “Republicanism”: Expert Peer Review and the Quest for Regulatory Deliberation*, 49 EMORY L.J. 1033, 1034–37 (2000).

¹⁷¹ See, e.g., STEPHEN G. BREYER ET AL., *ADMINISTRATIVE LAW AND REGULATORY POLICY: PROBLEMS, TEXT, AND CASES* 120–24 (4th ed. 2000) (reviewing the effect of the new forms of executive control of agencies).

¹⁷² For discussion of the voluntary use of outside experts by agencies, see, for example, Noah, *supra* note 170, at 1034, 1049 (EPA, FDA); and Sidney A. Shapiro, *Biotechnology and the Design of Regulation*, 17 *ECOLOGY L.Q.* 1, 63–69 (1990) (discussing several agencies responsible for regulating biotechnology). See generally BRUCE L.R. SMITH, *THE ADVISERS: SCIENTISTS IN THE POLICY PROCESS* 1 (1992) (estimating that scientific advisory panels constitute about half of the approximately one thousand federal advisory committees used by the executive branch); SHIELA JASANOFF, *THE FIFTH BRANCH: SCIENCE ADVISERS AS POLICY-MAKERS* (1990) (discussing growing impact of expert advisory committees on regulatory decisions).

is created.¹⁷³ The common element, though, is bringing diverse perspectives to bear in decisionmaking. Such *self-generated* agency use of external and internal strategies for multiplying professional perspectives is highly desirable. One of the cognitive model's prime contributions is its ability to provide a framework for understanding decisional error that minimizes defensiveness—thereby increasing policymakers' willingness to take steps to improve their own decisional processes. By explaining such steps as sensible de-biasing strategies, rather than correctives for incompetence or checks against self-serving behavior, the model encourages an agency to build them into its policymaking process at the points where they can do the most good.¹⁷⁴

With respect to judicial review, a lively debate continues about the extent to which judicial ideology colors the practice of review.¹⁷⁵ We make no attempt to resolve this empirical question here. Rather, we simply observe that (as we have previously explained,¹⁷⁶ and as is further developed in Mark Seidenfeld's paper¹⁷⁷) hard-look review is well designed, from a cognitive perspective, to serve a debiasing function. Moreover, the judiciary seems the best institutional location for this function.

Whether the practice of judicial review realizes its theoretical potential depends, in the end, on whether judges heed the long-standing professional norms against substituting their judgment for that of the agency—and, perhaps, on whether appointing presidents resist the temptation to mold the judiciary into another avenue for pursuing ideological control over regulation. The cognitive model provides strong additional support for these norms, and underscores the value of conscious judicial self-discipline in this area. Just as it can function to reorient an agency's thinking about the value of external review, so too the psychological model can help a judge apprehend the nature—and the limits—of what she can add to the regulatory policymaking process.

¹⁷³ Thomas O. McGarity, *The Internal Structure of EPA Rulemaking*, LAW & CONTEMP. PROBS., Autumn 1991, at 57, 90–94, 99–102. For an extraordinarily thoughtful assessment (supported by case studies) of the strengths and weaknesses of various models agencies use to conduct regulatory analysis in the policymaking process, see MCGARITY, *supra* note 162, at 191–267.

¹⁷⁴ Cf. Elliott, *supra* note 161, at 169 (observing that when OMB review *did* raise important issues, it happened “very late in the process, when it is virtually impossible to do anything productive about them”).

¹⁷⁵ For a recent review of the literature on this point, see Revesz, *supra* note 72, at 1105–15.

¹⁷⁶ See *supra* note 143 and accompanying text.

¹⁷⁷ Seidenfeld, *supra* note 143.

c. *Skepticism About "Presidentializing" Regulatory Policymaking*

The most significant structural reform of regulation advocated by contemporary administrative law scholars is enhancing the role of the President in regulatory decisionmaking.¹⁷⁸ The cognitive model raises serious doubts about whether centralizing decisional control in the President is likely to improve the quality of regulatory policy.

The President is the most overworked and underinformed decisionmaker in the American policymaking system.¹⁷⁹ Bombarded with a breadth and depth of data that no human brain could effectively verify and process, he epitomizes the need to allocate scarce cognitive resources efficiently. The optimal institutional role for the President is to make decisions that must necessarily occur rapidly and decisively on whatever information is at hand. Attempting to involve him significantly in the range of policy decisions that can be more deliberative is likely to be inefficiently distracting and substantively counterproductive.

We recognize that many current proposals for increased presidential control over regulatory policy are based on the conviction that the President is the decisionmaker least susceptible to factional influence and most likely to represent the views of the national majority.¹⁸⁰ Whether or not this conviction is empirically well founded, from the psychological perspective, the proposal is positively perverse. The design of regulatory government in an increasingly global era should concentrate on husbanding the Chief Executive's cognitive resources, not further overextending them.

¹⁷⁸ See, e.g., Elena Kagan, *Presidential Administration*, 114 HARV. L. REV. 2245 (2001) (arguing that presidential control of administrative action advances the core values of accountability and effectiveness); accord Calabresi, *supra* note 70; Lessig & Sunstein, *supra* note 78.

¹⁷⁹ Presidential scholar Hugh Heclo compellingly captured the myth and reality of the modern American presidency:

Our most familiar image of the presidency finds a man, sitting alone, in the dimly lit Oval Office. Against this shadowy background the familiar face ponders that ultimate expression of power, a presidential decision.

It is a compelling and profoundly misleading picture. Presidential decisions are obviously important. But a more accurate image would show a presidency composed of at least a thousand people—a jumble of personal loyalists, professional technocrats, and bureaucratic staff with one man struggling, often vainly, to stay abreast of it all. What that familiar face ponders in the Oval Office is likely to be a series of conversations with advisers or a few pages of paper containing several options. These represent the last distillates produced from immense rivers of information flowing from sources—and condensed in ways—about which the president probably knows little.

Heclo, *supra* note 104, at 34.

¹⁸⁰ See, e.g., Kagan, *supra* note 178, at 2361 (noting that "the President's concern for maintaining the support of a national constituency . . . should curb the extent to which he attends only to narrow interests"); *supra* note 78.

The psychological model similarly cautions against the related trend of "presidentializing the bureaucracy."¹⁸¹ Pursued most aggressively in the first Reagan Administration, the goal has been to extend presidential influence over delegated regulatory decisionmaking through a strategy in which "the bureaucracy . . . is to be either short-circuited or penetrated by the White House."¹⁸² The strategy has relied on three elements: (1) increasing the number of political appointees within regulatory agencies; (2) displacing the historical discretion of cabinet secretaries to make subcabinet level appointments in their agencies with direct White House control over noncareer appointments; and (3) emphasizing, in those appointment decisions, personal and ideological loyalty to the President over expertise and management credentials.¹⁸³ Political scientists and scholars of public administration who study this trend have pointed out that the goal of "direction (the political impetus)" can diminish institutional access to "knowledge (the civil servant's know-how to make things work)."¹⁸⁴ "Presidentializing the bureaucracy has often meant the downgrading of expert professional advice in resolving policy questions"¹⁸⁵—a shift in decisionmaking responsibility that has consequences both for the

¹⁸¹ The phrase comes from Francis Rourke, *Presidentializing the Bureaucracy: From Kennedy to Reagan*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 123.

¹⁸² ROCKMAN, *supra* note 106, at 207.

¹⁸³ See Patricia W. Ingraham, *Political Direction and Policy Change in Three Federal Departments*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 180, 181; Pfiffner, *supra* note 105, at 12–15; see also Aberbach & Rockman, *supra* note 111, at 161–62 ("More and more, however, what the White House wants of civil servants, as ex-White House aide . . . John Ehrlichman so picturesquely put it, is the following: 'When we say jump, the answer should be "how high?"'); Moe, *supra* note 162, at 151 (describing the systematic replacement of career staff with loyalist appointees in the Reagan Administration); James P. Pfiffner, *Political Appointees and Career Executives: The Democracy-Bureaucracy Nexus*, in *THE MANAGERIAL PRESIDENCY*, *supra* note 104, at 167, 171 (describing advice in Heritage Foundation manual for Reagan political appointees on how to block career staff access to information and minimize their role in policy formation).

¹⁸⁴ ROCKMAN, *supra* note 106, at 235. Professor Rockman goes on to conclude: The administrative presidency, first proclaimed under Nixon and greatly amplified under Reagan, however, is not the reciprocal relationship [between direction and knowledge] urged by Hecló. Instead, it is an imposed set of controls (personnel and organizational) deriving from the White House designed to deny, rather than make use of, the skills and experience of the career civil service.

Id.

¹⁸⁵ Rourke, *supra* note 181, at 134.

substance of public policy and administration¹⁸⁶ and for personnel management.¹⁸⁷

In contrast to the legal academy's predilection for improving government performance by increasing presidentialization, scholars in these other disciplines tend to urge a balance between political direction and bureaucratic expertise—with a strong concern that recent administrations have too much devalued the role of the latter in policymaking.¹⁸⁸ Cognitive theory suggests that, in this area, the political scientists and public administrators may have the better argument.

3. *Challenges for Institutional Design: "Stickiness" of Imperfect Solutions and Unwise Citizen Preferences*

The cognitive-psychological theory also highlights important impediments to sensible regulation that might otherwise go unnoticed or misanalyzed. Notably, framing effects¹⁸⁹ provide an explanation for the "stickiness" of some regulatory programs.¹⁹⁰ As scholars and public commentators have noted, regulatory programs often long outlast their usefulness.¹⁹¹ The Interstate Commerce Commission, for

¹⁸⁶ See, e.g., ROCKMAN, *supra* note 106, at 236 (noting that "inattentiveness to the perspectives of career personnel jeopardizes effectiveness in government, unless the operational definition of effectiveness is government by presidential fiat"); Hecl, *supra* note 104, at 41 ("Political staff work tends to drive out longer-term, institutional interests in policy and administration."); Patricia W. Ingraham, *Building Bridges or Burning Them? The President, the Appointees, and the Bureaucracy*, 47 PUB. ADMIN. REV. 425, 432 (1987) (concluding that the presidentialization trend has led not to more political control, but to a management void); Rourke, *supra* note 181, at 134 ("While to many observers, this decline in the influence of bureaucrats over executive policy making may be a welcome development, it should be remembered that bureaucrats frequently provide the best-informed and most disinterested advice available for coping with major issues of domestic and foreign policy."); see also COLIN CAMPBELL, *MANAGING THE PRESIDENCY: CARTER, REAGAN, AND THE SEARCH FOR EXECUTIVE HARMONY* 19 (1986) ("*Politicized incompetence* results when exceptionally partisan, ideological, and/or egocentric presidents choose to ignore the state apparatus and do whatever they can get away with politically.>").

¹⁸⁷ For concerns about problems with morale, recruiting, and retention of talented career personnel in this sort of environment, see, for example, Pfiffner, *supra* note 183, at 177–79; Elliot L. Richardson, *Civil Servants: Why Not the Best?*, WALL ST. J., Nov. 20, 1987, at A28.

¹⁸⁸ A good summary of this viewpoint comes from Joel Aberbach and Bert Rockman: Politics provides energy and revitalization while bureaucracy brings continuity, knowledge, and stability. One can exist without the other but only to the detriment of effective government. The problem for government and, in our view, the public interest is not to have one of these values completely dominate the other, but to provide a creative dialogue or synthesis between the two. In recent times the dialogue has turned into monologue as deinstitutionalization and centrist command have grown apace.

Aberbach & Rockman, *supra* note 111, at I63 (footnote omitted).

¹⁸⁹ See *supra* text accompanying notes 39–44.

¹⁹⁰ See generally FARBER & FRICKEY, *supra* note 5, at 47–55 (discussing stability of legislation).

¹⁹¹ See Joseph P. Tomain, *networkindustries.gov.reg*, 48 U. KAN. L. REV. 829, 844–45 (2000) (discussing regulatory cycles).

example, continued to exist for many years after Congress withdrew the core of its regulatory authority.¹⁹² Similarly, the Tennessee Valley Authority continued constructing dams well after all of the useful dam sites had been developed.¹⁹³ As a related problem, some regulatory programs remain "stuck" with initial design flaws long after commentators and legislators become aware of them.¹⁹⁴

Public choice theory has difficulty explaining regulatory "stickiness." If regulatory agencies are occupied by self-serving actors, those actors will attempt to continue their missions, regardless of the utility for the public. But the officials who occupy agencies are unlikely to have enough at stake to be effective lobbyists. The benefits of a government job with a regulatory agency that has outlived its usefulness surely cannot be blamed for the chronic stickiness of regulatory programs. A more plausible, but still troublesome, account would blame stickiness on the beneficiaries of the regulatory program.¹⁹⁵ Even a maladaptive, misaligned program benefits some interest group. An unneeded weapons system, for example, confers great benefits on the contractor who continues to construct it. Public choice theorists sometimes argue that the beneficiaries of unnecessary programs become entrenched and difficult for reformers to dislodge.¹⁹⁶ The troublesome aspect of this account of stickiness, however, is that rational actors should treat losses as just as important as forgone gains. The beneficiaries of the reform should be able to lobby just as hard as those who would oppose reform. In fact, if the reform produces a more efficient program, then reform advocates have more to gain than opponents.¹⁹⁷ Surely legislators and interest groups would not easily tolerate forgoing an opportunity to create some social gains that can be allocated into private hands.

Cognitive psychology provides some answers for this dilemma. Because of framing effects, people treat forgone gains as less important than losses.¹⁹⁸ If framing applies to interest group politics, then those who might lose the benefits of an existing program will fight

¹⁹² See WILLIAM F. FOX, JR., UNDERSTANDING ADMINISTRATIVE LAW 13-14 (4th ed. 2000).

¹⁹³ See MARC REISNER, CADILLAC DESERT: THE AMERICAN WEST AND ITS DISAPPEARING WATER 174, 441 (1986).

¹⁹⁴ See Cass R. Sunstein, *Endogenous Preferences*, *Environmental Law*, 22 J. LEGAL STUD. 217, 232-33 (1993).

¹⁹⁵ For example, existing industries are often identified as obstacles to reform of environmental laws, inasmuch as they are thought to be happy with the status quo. See *id.* at 230-34.

¹⁹⁶ See *id.*

¹⁹⁷ To be sure, existing interest groups might be more organized, and therefore more effective, than interest groups that benefit from a regulation that has yet to be implemented. But it hardly seems that this could be a universal phenomenon.

¹⁹⁸ See *supra* notes 39-44 and accompanying text.

harder than those who stand to benefit from its reform.¹⁹⁹ Similarly, the allocation of benefits can create a sense of entitlement, an “endowment effect.”²⁰⁰ If those affected by a regulatory program “endow” the status quo, then the status quo will likely remain in place.²⁰¹

Furthermore, as to programs that are failing to accomplish their intended goals, legislators and regulators may suffer from a problem that psychologists call escalating commitment.²⁰² Those who initially advocate a program or a position tend to cling to the success of the position long after it becomes apparent it will fail.²⁰³ As noted earlier, banks separate loan officers from workout officers because loan officers tend to continue to believe in their initial decision to invest after it has become imprudent to hope that loans will be repaid.²⁰⁴ People find it difficult to come to believe that their initial decisions were mistaken. They escalate their commitment to projects because they would otherwise find it difficult to explain their initial decisions.²⁰⁵ If escalating commitment affects legislators, then the initial advocates of a regulatory program are apt to resist reform efforts.

The phenomena of framing and escalating commitment suggest that the solution to regulatory stickiness lies in devising procedures that address the psychological attachment policymakers and the public have to the status quo. Adding sunset clauses to statutes, for example, shifts the status quo, thereby undoing any endowment effect.²⁰⁶ Time-triggered automatic reversals of the status quo, however, may be too drastic a solution for many regulatory contexts. Sensible and efficient regulation may be lost because of the enormous political difficulty involved in enacting *any* legislation. Moreover, even the possibility of such periodic upheaval in regulatory requirements would create instability and foment undesirable strategic behavior. As a less drastic alternative, a statutory requirement of periodic review—either by the legislature or an agency—might help insure that revision is part of the psychological mix.²⁰⁷ On the other hand, it is probably a mistake to endow a statute with a pool of money or source of funding

199 See Sunstein, *supra* note 194, at 230–34.

200 See *id.* at 230.

201 See *id.* at 230–34.

202 See Staw, *supra* note 60, at 41–42.

203 *Id.*

204 See *supra* note 59 and accompanying text.

205 See Staw, *supra* note 60, at 41–42.

206 For example, the independent counsel statute might still be a part of American law if it had not included a sunset clause. See Ethics in Government Act of 1978, Pub. L. No. 95-521, sec. 601(a), § 598, 92 Stat. 1824, 1873.

207 For example, the Clean Air Act requires that the EPA review its ambient air quality standards every five years, and update them, if necessary. See 42 U.S.C. § 7409(d)(2)(B) (1994).

for a long (or even indefinite) period of time.²⁰⁸ The potential for annual revision through the appropriations process may serve a similar function to a mandatory periodic substantive review.

The principal challenge in devising institutional designs for dealing with stickiness is that we have little experience, and even less data, about how such procedures work in practice. In this area, cognitive theory can give new insights into the problem, but solutions require further experimentation.

Similarly, psychology can help illuminate the conflict that occurs in some regulatory areas between democratic responsiveness and technocratic rationality, but the cognitive model does not yet suggest clear strategies for resolving such conflicts. The public, more so than the governmental actors that are the subject of this Article, is apt to rely on simple heuristics and schema that lead to mistaken judgments about what is dangerous.²⁰⁹ Interest groups may find ways to take advantage of the cognitive errors that plague lay judgment.²¹⁰ In a democratic society, some of these unwise citizen preferences naturally translate into public policy, even though that policy might be demonstrably foolish.

Despite a growing body of scholarship on the subject, the role of government policymakers in responding to the discrepancy between public fears and real problems has yet to be satisfactorily resolved. Some argue that public education is the key to reducing the errors of the public.²¹¹ However, errors such as those that typically attend lay risk perception do not arise from a lack of information; they arise from the ways that information is processed.²¹² Consequently, public education campaigns are not likely to resolve this problem. Nor is it clear that governmental officials *should* dismiss the fears of the public just because they can be traced to defects in judgment. Wholly apart from the practical political reality that officials cannot ignore the public and consistently win reelection, the fear that the public feels about some risks is a very real psychological state.

Again, the principal contribution of the cognitive model, at this point, is to highlight where additional work must be done. By defining the problem in a very different way than public choice, the psychological model poses a very different research agenda.

²⁰⁸ This was the case with the initial Superfund program. See 42 U.S.C. § 9611(a) (1994).

²⁰⁹ See STEPHEN BREYER, *BREAKING THE VICIOUS CIRCLE: TOWARD EFFECTIVE RISK REGULATION* 33-39 (1993).

²¹⁰ See Kuran & Sunstein, *supra* note 35, at 733-35.

²¹¹ See Donald T. Hornstein, *Reclaiming Environmental Law: A Normative Critique of Comparative Risk Analysis*, 92 COLUM. L. REV. 562, 595-98 (1992).

²¹² See *id.* at 605-10.

IV

CONCLUDING THOUGHTS ON WHY THE CHOICE OF
MODEL MATTERS

If a society assumes its politicians are venal, stupid or self-serving, it will attract to its public life as an ongoing self-fulfilling prophecy the greedy, the knavish and the dim.

—A. Bartlett Giamatti²¹³

We have argued here that the cognitive model deserves attention from administrative law scholars because it can provide both descriptive and normative insights into the design of regulatory institutions—insights that are in many ways superior to those offered by public choice. In closing, we want to make a different sort of argument about why the choice of model matters.

At some point during the remarkable twentieth-century expansion of regulatory government, administrative law became disconnected from public administration. Those who studied and critiqued the rules, processes, and institutions of regulation had little intellectual interchange with those who studied and critiqued the organizational behavior and human resource management of regulatory government. With few exceptions,²¹⁴ modern administrative law scholars paid scant attention to the corps of people who actually apply the rules, undertake the processes, and cause the institutions to function.

Public choice theory changed all that by emphatically putting the human being back into regulation. Interest-maximizing rational man became the mainspring of regulatory government, his self-serving behavior both explaining what is, and determining what will be.

We share the belief of public choice theorists that anyone interested in the success of regulation must take very seriously the nature and characteristics of the human beings who constitute regulatory government. However, we suggest that, having rediscovered that people matter a great deal in the design of regulatory programs, administrative law must also consider the extraordinarily counterproductive potential of employing a model of government in which self-interested behavior is the normal state of affairs.

Psychologists have long recognized the phenomenon of the self-fulfilling prophecy: Human actors are affected by their perceptions of what others expect of them. Data from a number of studies and a variety of contexts confirm that an individual's behavior and perform-

²¹³ A. BARTLETT GIAMATTI, *THE UNIVERSITY AND THE PUBLIC INTEREST* 168 (1981).

²¹⁴ Among the most prominent of which must be the work of Symposium participant Jerry Mashaw. *E.g.*, JERRY L. MASHAW, *BUREAUCRATIC JUSTICE: MANAGING SOCIAL SECURITY DISABILITY CLAIMS* (1983).

ance can depend, in important ways, on what signals she receives from her social environment about her presumed motives and competence.²¹⁵ In other words, while we may not always get what we deserve from the people around us, we often get what we expect.

The public choice model of rent-seeking interest groups and constituent-pandering officials might perhaps be seen, within the intellectual history of modern American political theory, as a needed antidote to uncritical assumptions of government by public-interested public servants.²¹⁶ Designing government programs as if those with power never put their own interests ahead of the public good would be dangerously utopian. But in fact, of course, neither the public choice story nor the public interest story gets human motivation completely right. In government, as in most of the rest of life, selfishness and selflessness appear side by side—sometimes in the same person. If the truth about motive really is a protean mix of good, bad, and muddled intentions on the part of the myriad human actors who ultimately *are* regulatory government, then relentless cynicism about those in power is equally dangerous. Observations about human vulnerability to self-fulfilling prophecies warn that a formally endorsed, widely promulgated model of civic behavior which blames bad outcomes on the inevitability of greedy, self-serving action might itself become outcome determinative.

Therefore, while we recognize that psychological insights into human judgment are, in themselves, indifferent to motivation—heuristic errors and cognitive biases can trip up *Homo economicus* as readily as Publius—we believe that the cognitive model offers most promise as an alternative, rather than a complement, to the public choice account.²¹⁷ An account of government that features policymakers who attempt to reach public-regarding outcomes but who must overcome a number of cognitive traps, can potentially make three unique contributions:

²¹⁵ ROBERT ROSENTHAL & LENORE JACOBSON, *PYGMALION IN THE CLASSROOM: TEACHER EXPECTATION AND PUPILS' INTELLECTUAL DEVELOPMENT* (1968); Claude M. Steele, *A Threat in the Air: How Stereotypes Shape Intellectual Identity and Performance*, 52 *AM. PSYCHOLOGIST* 613 (1997).

²¹⁶ "It is not for nothing that the rational-actor tradition has as its chief declared enemy the benevolent-despot conception of government." Geoffrey Brennan, *Democratic Trust: A Rational-Choice Theory View*, in *TRUST AND GOVERNANCE* 197, 215–16 (Valerie Braithwaite & Margaret Levi eds., 1998).

²¹⁷ See generally Rachlinski, *supra* note 25 (arguing for the importance of cognitive psychological analysis in law). Cf. Eskridge & Ferejohn, *supra* note 67, at 645–47 (proposing that cognitive theory is best deployed as a supplement to public choice and other theory).

1. Supporting and Enhancing the Profession of Government Service

First, it can be used by those attempting to produce a cadre of public officials inculcated with professional norms of competence, dedication, and responsibility for the public-regarding use of power.²¹⁸

In the 1999 Presidential Address to the American Political Science Association, Matthew Holden, Jr. warned his colleagues of “the folly of recruiting and helping to educate human beings and at the same time pummeling them into conscious disdain for what they do.”²¹⁹ A model of civic behavior built around the rational maximizer who adeptly pursues his self-interest at the expense of others is useless to those attempting to recruit talented people to government, train them to contribute effectively as part of a team of public-regarding decisionmakers, and create a working environment in which job satisfaction and morale are high enough to retain them. As Lynn Stout aptly puts it, “[H]omo economicus is a sociopath.”²²⁰

By contrast, modeling the well-intentioned but cognitively vulnerable decisionmaker as the norm—with the self-serving actor relegated to the role of real, but explicitly deviant, possibility—provides the kind of context in which public-spirited motivation can be professionally reinforced. Reviewing the empirical evidence on the phenomenon of other-regarding preferences, Professor Stout concludes: “People can be motivated to adopt other-regarding norms; to follow norms even when they have no external incentives to do so; and to enforce norms against others even when this is personally costly. But

²¹⁸ Those who doubt whether anyone still takes such a notion seriously might consider the recent revival of public ethics scholarship, including LOUIS C. GAWTHROP, *PUBLIC SERVICE AND DEMOCRACY: ETHICAL IMPERATIVES FOR THE 21ST CENTURY* (1998) (considering, in an era when government is being reinvented in an entrepreneurial mold, the relationship of morality and ethics for “those who choose a career in the service of democracy”); JOHN A. ROHR, *PUBLIC SERVICE, ETHICS, AND CONSTITUTIONAL PRACTICE* (1998) (discussing the role of the career civil servant as “citizens in lieu of the rest of us,” and identifying ways in which constitutional “regime values” can inform exercises of bureaucratic discretion); MONTGOMERY VAN WART, *CHANGING PUBLIC SECTOR VALUES* (1998) (identifying five value sources for public administration drawn from, inter alia, the moral development work of Lawrence Kohlberg and the organization culture work of R.E. Quinn and J. Rohrbaugh). “Questions of morality and right conduct in public affairs are now considered to be as significant as the traditional [efficiency] concerns of Wilsonian Public Administration.” Jeremy F. Plant, *Using Codes of Ethics in Teaching Public Administration*, in *TEACHING ETHICS AND VALUES IN PUBLIC ADMINISTRATION PROGRAMS* 161, 161–62 (James S. Bowman & Donald C. Menzel eds., 1998).

²¹⁹ Matthew Holden, Jr., *The Competence of Political Science: “Progress in Political Research” Revisited*, American Political Science Association (1999), in 94 *AM. POL. SCI. REV.* 1, 1 (2000).

²²⁰ LYNN STOUT, *OTHER-REGARDING PREFERENCES AND SOCIAL NORMS* 19 (Georgetown Univ. Law Ctr., Working Paper No. 265902, 2001), available at http://papers.ssrn.com/paper.taf?abstract_id=265902.

they can only be motivated to do these things when the social conditions are favorable.”²²¹ Two of the most important conditions are: (1) signaling, by respected sources of authority, that other-regarding behavior is expected; and (2) promoting the perception that others also conform to altruistic norms.²²² A model of government predicated upon public-regarding actors, struggling to make good public policy choices while facing predictable vulnerabilities to judgmental error, can help create both of these conditions.

2. Improving Performance Through Understanding

Second, such a model can improve the performance of regulatory decisionmaking institutions. Because of its compatibility with a process of professional training and enculturation, it can serve as the basis for developing practices of self-reflective professional critique—i.e., efforts *within the organization itself* to recognize and address shared cognitive vulnerabilities that can undermine even the best intentions if not addressed.

More broadly, the model can be used as the framework for explaining decisionmaking rules and protocols in a way that both lowers resistance to their implementation and increases their effectiveness. If there is one lesson that institutional designers should have learned from the past thirty years’ experience with proceduralizing regulatory decisionmaking, it is the fact that few, if any, administrative processes or structures are proof against determined subversion.²²³ Even if the letter of a required decisional protocol is met, its spirit can almost invariably be defeated by an unsympathetic decisionmaker.

For this reason, the *why* of institutional design can matter as much as the *what*. A society that tells its regulators that they must engage in a public notice-and-comment process and then submit their reasoning process to review by a panel of judges, because this will stymie their own self-interested instincts and thwart the rent-seeking tendencies of the various groups who bid for their favors, can hardly be surprised if informal rulemaking degenerates into a costly war of attrition. Suppose, instead, that a society tells its regulators that external review is important because all human judgment, and particularly

²²¹ *Id.* at 29.

²²² *Id.* at 29-31. See also ROBERT D. PUTNAM, *BOWLING ALONE: THE COLLAPSE AND REVIVAL OF AMERICAN COMMUNITY* 347-48 (2000) (discussing the importance, to voluntary legal compliance and similar other-regarding behavior, of belief that others are behaving accordingly).

²²³ Cf. MASHAW, *supra* note 5, at 154 (positing a “Law of Conservation of Administrative Discretion” under which the amount of discretion in a system is constant and “[e]limination of discretion at one choice point merely causes the discretion that had been exercised there to migrate elsewhere in the system”); STOUT, *supra* note 220, at 19-21 (exploring why external forces alone will not be sufficient to control all selfish behavior).

the judgment of experts, is vulnerable to certain cognitive biases which this procedure, as the culmination of a process of public vetting and explanation, can help counteract. This explanation—the core of which is shared fallibility rather than individual venality—permits regulators to see themselves as dedicated and talented stewards of the public trust who are part of a collective enterprise of deploying regulatory power as wisely as humanly possible. Moreover, it facilitates their “hearing,” with less defensiveness, the feedback provided by the process—feedback that can represent important information for improving expert decisional competence.²²⁴

Agency personnel are not the only actors whose motives and behavior may be affected by the nature of the reasons advanced for particular decisionmaking rules and protocols. If the dominant intellectual theory of regulatory policymaking is one of capture by rent-seeking interest groups and control by pork-producing legislatures, it should come as no surprise if judges (and, perhaps as important, their law clerks educated in elite law schools) wield hard-look review with a vengeance. By contrast, if judges are educated in the respective strengths and vulnerabilities of expert and lay decisionmaking, this explanation will inform and reinforce the adjuration that judicial review is to be “searching and careful,” but that “[t]he court is not empowered to substitute its judgment for that of the agency.”²²⁵

3. Shaping Public Perception

Finally, such a model might be useful, to some modest degree, in shifting citizens’ perception of their government. This is the most speculative contribution but also, perhaps, the most important.

American public opinion reflects deeply paradoxical reactions to the modern administrative state. Americans tend to be ideologically libertarian and operationally New Dealist: they don’t like big government, but they want more government attention to specific social and economic problems; they don’t like federal regulation, but they want more environmental, consumer, and safety protection.²²⁶ Such contradictory impulses help explain how Ronald Reagan could be elected and reelected on an antigovernment, antiregulatory platform by a citizenry who continued to express support for the very environmental, economic, and social-welfare regulatory programs that he targeted.²²⁷

²²⁴ See *supra* Part I.B (discussing role of feedback in improving expert performance).

²²⁵ *Citizens to Preserve Overton Park, Inc. v. Volpe*, 401 U.S. 402, 416 (1971).

²²⁶ See, e.g., ALBERT H. CANTRIL & SUSAN DAVIS CANTRIL, *READING MIXED SIGNALS: AMBIVALENCE IN AMERICAN PUBLIC OPINION ABOUT GOVERNMENT* 10–18 (1999); NAT’L COMM’N ON THE PUB. SERV., *LEADERSHIP FOR AMERICA: REBUILDING THE PUBLIC SERVICE* 73–76 (1989); WATTENBERG, *supra* note 146, at 107.

²²⁷ See *supra* note 146; see also NAT’L COMM’N ON THE PUB. SERV., *supra* note 226, at 75–76 (reviewing surveys that reveal public support for government taking responsibility

While distrust of government has been part of the American character from the Founding, current citizen reaction is unprecedentedly negative.²²⁸ The contemporary American love-hate relationship with the regulatory state has at least two consequences that make it more difficult to improve the performance of regulatory government.

Most immediately, it has encouraged the growth of the late twentieth-century sport of "bureaucrat bashing." Public administration scholars have expressed concern about what an increasingly shrill and pervasive atmosphere of antigovernment rhetoric does to the morale, performance, and recruiting of government officials.²²⁹ Lack of public esteem for and confidence in the work of public officials has been identified as a significant causal component of a "'quiet' crisis" in the quality of government service.²³⁰ The casualties of this barrage of very vocal distrust and disrespect may include more than "just" morale and job satisfaction. Lawrence Mitchell, drawing on Adam Smith, David Hume, and Aristotle, has recently argued that "when we deprive people of the experience of being trusted," we decrease the likelihood of their behaving in a trustworthy fashion.²³¹ "[T]he moral psychology of being trusted itself helps to create trustworthiness in people"²³² This argument is, of course, consistent with the basic psychological phenomenon of the self-fulfilling prophecy. And, indeed, social science literature provides evidence from a variety of contexts to support the hypothesis that decisionmakers who believe they are trusted behave in a more trustworthy fashion—and vice versa.²³³

for major social and economic issues and condemnation of government as inefficient and wasteful); cf. JAMES A. STIMSON, *PUBLIC OPINION IN AMERICA: MOODS, CYCLES AND SWINGS* 127 (2d ed. 1999) (noting the dissonance between the electoral success of 1994 congressional candidates running on the conservative Contract with America platform and public unwillingness to support "sharp attacks" on programs such as environmental and securities regulation).

²²⁸ See, e.g., PUTNAM, *supra* note 222, at 47 (reporting survey data that, in the 1990s, about 75% of Americans "didn't trust the government to do what is right most of the time"; also, contrasting 1966 survey, in which 66% of Americans *rejected* the statement "the people running the country don't really care what happens to you," with 1997 response, in which 57% *accepted* this statement).

²²⁹ See, e.g., Bruce Adams, *The Frustrations of Government Service*, 44 *PUB. ADMIN. REV.* 5 (1984); Yuan Ting, *Determinants of Job Satisfaction of Federal Government Employees*, 26 *PUB. PERSONNEL MGMT.* 313 (1997); Patricia A. Wilson, *Power, Politics, and Other Reasons Why Senior Executives Leave the Federal Government*, 54 *PUB. ADMIN. REV.* 12 (1994).

²³⁰ Ting, *supra* note 229, at 313; see, e.g., NAT'L COMM'N ON THE PUB. SERV., *supra* note 226, at xviii, 13, 59–60, 64–65; see also Adams, *supra* note 229, at 6 ("If negative public attitudes are to continue to reinforce unattractive job situations, the best of present and prospective public officials will be lost to government service for decades to come.").

²³¹ Lawrence E. Mitchell, *The Importance of Being Trusted*, 81 *B.U. L. REV.* 591, 600 (2001).

²³² *Id.* at 599; accord Simon Blackburn, *Trust, Cooperation, and Human Psychology*, in *TRUST AND GOVERNANCE*, *supra* note 216, at 28.

²³³ E.g., John Braithwaite & Toni Makkai, *Trust and Compliance*, 4 *POLICING & SOC'Y* 1 (1994) (nursing home administrators in Australia). As John Braithwaite puts it, the re-

More deeply, the contemporary public tendency to demand regulation while condemning regulatory government threatens to trap us in a state of chronic democratic discontent. The work of political psychologist Tom Tyler and others reveals that, especially in democracies, the effectiveness of political and legal authorities depends heavily upon "the willing, voluntary compliance of most citizens."²³⁴ Such cooperation, in turn, rests in significant part upon "people's feeling that they ought to obey the law," and the "central factor" in producing that feeling is "trust in the motives of authorities."²³⁵ Moreover, the level of such trust can influence how citizens evaluate the performance of authorities.²³⁶ Political scientist Marc Hetherington has found empirical support for the hypothesis that low levels of political trust function as *cause*, as well as effect, of negative assessments of government performance. Examining citizen trust data from the National Election Study in conjunction with a variety of social and economic factors, Professor Hetherington observed that "decreasing trust leads to substantially more negative evaluations of both the incumbent president and Congress as a political institution, as well as the reverse."²³⁷ Spe-

search reveals "a general characteristic of trust that distinguishes it from most other assets studied by social scientists: Trust is not a resource depleted through use. In fact, trust is depleted through not being used." John Braithwaite, *Institutionalizing Distrust, Enculturating Trust*, in TRUST AND GOVERNANCE, *supra* note 216, at 343, 347; see Albert O. Hirschman, *Against Parsimony: Three Easy Ways of Complicating Some Categories of Economic Discourse*, 74 AM. ECON. REV. 89, 93-95 (1984).

Some of the most intriguing work in this area comes from economists employing typical rational choice methodologies to reach novel conclusions about the existence and role of trustworthiness in political and social life. See, e.g., Brennan, *supra* note 216 (modeling representative politics to argue that democratic electoral processes can both affect individual incentives to develop trustworthiness and allocate such trustworthiness as there is to its highest social use: i.e., to government); Partha Dasgupta, *Trust as a Commodity*, in TRUST: MAKING AND BREAKING COOPERATIVE RELATIONS 49, 56-59 (Diego Gambetta ed., 1988) (mathematically modeling the phenomenon of "self-fulfilling expectations about honest and dishonest behavior").

²³⁴ Tom R. Tyler, *Public Mistrust of the Law: A Political Perspective*, 66 U. CIN. L. REV. 847, 856, 858-59, 867-69 (1998).

²³⁵ *Id.* at 858-59, 866-67. See also PUTNAM, *supra* note 222, at 347-38 (reporting studies that voluntary compliance with tax laws is higher among people who view others as honest and who trust government); Tom R. Tyler & Peter DeGoey, *Trust in Organizational Authorities: The Influence of Motive Attributions on Willingness to Accept Decisions*, in TRUST IN ORGANIZATIONS: FRONTIERS OF THEORY & RESEARCH 331, 332 (Roderick M. Kramer & Tom R. Tyler eds., 1996) (presenting empirical evidence "that people's evaluations of the trustworthiness of organizational authorities shape their willingness to accept the decisions of authorities as well as influencing feelings of obligation to follow organization rules and laws").

²³⁶ See Tyler, *supra* note 234, at 867. See generally ARMIN FALK ET AL., TESTING THEORIES OF FAIRNESS—INTENTIONS MATTER (Inst. for Empirical Research in Econ., Univ. of Zurich, Working Paper No. 63, 2000) (finding empirical support for the proposition that people's assessment of the fairness of a decision depends not only on the substantive outcome but also on their assessment of the decisionmaker's intentions), available at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=259263.

²³⁷ Marc J. Hetherington, *The Political Relevance of Political Trust*, 92 AM. POL. SCI. REV. 791, 794-97 (1998).

cifically, “[r]ather than simply reflecting dissatisfaction with incumbents and institutions, declining political trust contributes to this dissatisfaction, creating an environment in which it is difficult for those in government to succeed.”²³⁸

In sum, the erosion of citizens’ faith in the people who govern them represents the loss of a significant social resource.²³⁹ To be sure, legal scholars would have to be more than usually egoistic to assume that negative public attitudes toward government are traceable to academic theorizing—as contrasted with news media that hypes the negative and controversial, interest groups that tell hyperbolic horror stories to further a particular regulatory (or deregulatory) agenda, candidates who run for government office on an antigovern-

²³⁸ *Id.* at 791; accord PUTNAM, *supra* note 222, at 347 (“It is commonly assumed that cynicism toward government has caused our disengagement from politics, but the converse is just as likely: that we are disaffected because as we and our neighbors have dropped out, the real performance of government has suffered.”); see also Braithwaite, *supra* note 233, at 349 (“Once the fabric of trust unravels, a society suffers in two ways—from abuse of power and from a want of the confidence necessary for a flourishing economy.”); Tyler & Degoey, *supra* note 235, at 345 (“[B]eing trusted by others appears to be a valuable social resource that gives authorities a ‘cushion of support’ during difficult times.”).

²³⁹ With his customary eloquence, our colleague Jon Macey argues that fomenting cynicism about government will have the salutary effect of encouraging Americans to look to the private sector, rather than government, to solve social and economic problems. See Macey, *supra* note 128. It appears, however, that neither large corporations nor nonprofit organizations—the two types of entities most likely to dominate a regime of privatized regulatory problem solving—have escaped the problem of declining trust.

Both a CNN/USAToday/Gallup poll conducted June 8–10, 2001 and a Harris Poll conducted in January 2001, found that “major companies” (or “big business”) effectively tied Congress in public confidence ratings; in each case, the slight edge business seemed to have was within the poll’s margin of error. Perhaps more significantly, big business appears to be losing ground as compared with Congress. Analogous figures from the January 2000 Harris poll had shown corporations running thirteen percentage points ahead of Congress. Indeed, the series of Harris Polls from 1998 shows public confidence in Congress and in “the executive branch of the federal government” steadily improving while confidence in major companies has reached its lowest point in four years. In a Newsweek Poll conducted June 29–30, 2000, Congress and the White House actually received higher confidence ratings than major corporations (32% and 31% vs. 24%; margin of error 4%). All of these polls are available at <http://www.pollingreport.com/institut.htm>.

With respect to nonprofit organizations, the news is more positive but also more complex. Biennial polls taken by the Independent Sector throughout the 1990s report rising confidence levels in charitable organizations generally, but *decreasing* confidence in how charities use donated funds. See Indep. Sector, *Public Attitudes Toward Charitable Organizations* (1999), at http://www.independentsector.org/gandv/s_publ.htm. The percentage believing that “most” charities are “wasteful” in using funds rose from 26% in 1990 to 32% in 1999 (although the latter number is down from a high of 38% in 1994). *Taking the Pulse of Americans’ Attitudes Toward Charities*, FACTS & FINDINGS (Indep. Sector, Wash., D.C.), Spring 2001, at 4, at <http://www.independentsector.org/programs/research/factfind3.pdf>. The percentage believing that “most” charities are “honest and ethical” in their use of funds dropped from 71% in 1990 to 60% in 1996, *id.*, a slight apparent rise of confidence in the 1999 poll was within the poll’s margin of error, see Indep. Sector, *Methodology and How to Interpret Survey Data* (1999), at http://www.independentsector.org/gandv/s_meth.htm.

ment platform, or some larger social malaise that infected Americans after Vietnam. Still, unless legal scholarship is going to be dismissed as a solipsistic enterprise in which the participants talk only to each other, academics must accept some responsibility for shaping the prevailing cultural story of what regulatory government is about, how well it is accomplishing its mission, and why it sometimes fails to advance the public welfare. Whether intentionally or not, "public choice talk"²⁴⁰ has given an intellectual imprimatur to bureaucrat bashing, and an aura of scientific certainty to the assertion that government "causes more problems than it solves."²⁴¹ As Bruce Adams, former director of the Office of Personnel Management and dean of two prominent schools of public administration, has observed: "[A]mong elites, cynicism toward government has become, in a perverse way, a mark of cultivation."²⁴²

Describing the value and the limits of theoretical models, John Braithwaite points out that "[t]heories of institutional design are useful as metaphors that supply competing ways of imagining changes in direction for social policy. They are rarely useful in supplying eternally true sets of propositions."²⁴³ We do not claim that the cognitive model ineluctably generates an exhaustive and determinate set of specifications for designing perfect regulatory institutions. We do suggest that it offers a new set of metaphors for understanding the vulnerabilities, and the capabilities, of public policymaking processes. Political scientist Peter DeLeon's examination of the history of the policy sciences in relation to the theory and practice of American democracy ends by expressing concern that "the analytic priesthood is doing little to discourage the ebbing of American's faith in government and, by extension, the democratic system."²⁴⁴ If legal theory is not to merit this same criticism, it must find ways of thinking about government that are pragmatically optimistic: i.e., ways which do not deny the presence of self-interest and ambition, but which refuse to place such motivation at the center of civic behavior; ways which willingly acknowledge that regulatory failures occur, but which evaluate failure claims with the open-minded determination to understand and learn rather than the gleeful anticipation of being able to say "I told you so!" The cognitive model, we believe, represents one such way.

²⁴⁰ The phrase is Jerry Mashaw's. See MASHAW, *supra* note 5, at 28.

²⁴¹ See *supra* note 146. For an early and eloquent expression of concern about the social costs of public choice talk, see Steven Kelman, "Public Choice" and Public Spirit, 87 PUB. INT. 80, 93-94 (1987); cf. John Ferejohn, *It's Not Just Talk*, 85 VA. L. REV. 1725, 1727 (1999) (discussing reality and substantiality of such "discourse effects"); Pamela S. Karlan, *Politics by Other Means*, 85 VA. L. REV. 1697 (1999) (identifying costs of using market metaphors to analyze electoral processes).

²⁴² Adams, *supra* note 229, at 6.

²⁴³ Braithwaite, *supra* note 233, at 365.

²⁴⁴ PETER DELEON, DEMOCRACY AND THE POLICY SCIENCES 100 (1997).