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BEST CASS SCENARIO*

Jonathan B. Wiener**

An invitation to add one’s tribute to a festschrift often elicits a reminiscence\(^1\)—perhaps as a kind of full disclosure. I was a student in Professor Sunstein’s class in Administrative Law at Harvard in 1986. It was a large class, in Austin North, driven briskly onward by the instructor’s keen and relentless questioning. I sat near the back and often felt anonymous. One afternoon I paid a nervous visit to the high-powered professor in his office, only to find him youthful, kind, and encouraging. How much such small moments may inflect a life. After law school and clerkships, I was honored to find my way somewhere along his—to become a fellow traveler on at least one of the many paths he has trod. While I was serving in the government and trying to help shape policies that avoid unintentionally yielding counterproductive results,\(^2\) he was writing about these paradoxes.\(^3\) When I came to academia, my first book, on risk-risk tradeoffs, was lucky to be graced by his foreword\(^4\) and to be followed by his own article on the topic.\(^5\) His work on the cognitive case for sensible cost-benefit analysis\(^6\) helped shape my later thoughts on European application of this approach.\(^7\) Our critiques of the precautionary principle have been parallel and intertwined.\(^8\) And we have exchanged

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2. Including, as a senior staffer at the Council of Economic Advisers, helping to draft President Clinton’s Executive Order 12866 on regulatory review. See Exec. Or. 12866, 58 Fed. Reg. 51735 (Sept. 30, 1993).
views on climate change, especially regarding how best to engage China and America in an effective regime to reduce greenhouse gas emissions.9

But Cass Sunstein has traveled so many roads—not only risk regulation and environmental law, but also constitutional and administrative law, political theory, tort law, punitive damages, savings and investment, behavioral psychology and economics, and much more. Somehow, he takes all these roads at the same time, transcending Frost’s fork. No mortal can keep up. He has been superhumanly prolific. He has called his favorite legal locale Smallville,10 which, of course, is the boyhood home of Clark Kent; and knowing that Sunstein has a super Power, it would not be a surprise to see him take flight—up, up, and away—SuperCass.

To be sure, he has seen farther in part by standing on the shoulders of giants.11 His antecedents are plain among the pragmatists, from Holmes and James and Pound to Posner and Breyer. He channels two great Franklins—Roosevelt12 and Benjamin.13 He has gone beyond his forbears, perhaps the furthest among his own ventures, in his effort

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13. In 2007, Sunstein was awarded the Henry M. Phillips Prize for his lifetime contributions to the science and philosophy of jurisprudence by the American Philosophical Society—which was founded in 1743 by Benjamin Franklin. See U. Chi. L. Sch., Cass R. Sunstein Awarded the American Philosophical Society’s Henry M. Phillips Prize, http://www.law.uchicago.edu/news/sunstein-phillips-prize/index.html (May 17, 2007). Moreover, Sunstein’s cognitive approach to cost-benefit analysis, as evidenced in Sunstein, Cognition and Cost-Benefit Analysis, supra n. 6, harkens back to Benjamin Franklin’s “prudential algebra” for making considered decisions that weigh the pros and cons and avoid “rash steps.” Wiener, supra n. 7, at 483–89 (discussing and quoting Benjamin Franklin, Ltr. from Benjamin Franklin to Joseph Priestley (Sept. 19, 1772), in Frank Luther Mott & Chester E. Jorgenson, Benjamin Franklin: Representative Selections, with
to bring the science of behavioral psychology into debates over law and economics.14 He is not uncontroversial; like any great scholar, he aims to provoke new thinking and has his share of debates.15 He does not fit easy classifications: He is a social liberal who wants government decisions to be informed by cost-benefit analysis, cares about regulatory costs, and wants experts to help correct the public’s errors.16 He admires juxtappositions that foster deliberative moderation, such as “liberal republican[ism]”17 and “libertarian paternalism.”18

In this essay, focusing on the field of risk regulation, I highlight future challenges that Sunstein’s work ought to address. The best understanding of his work on risk regulation points in three further directions: (1) tackling anew the facts/values dichotomy, (2) reconciling the twin commitments to minimalism and to comprehensive deliberation, and (3) addressing the future—envisioning future consequences of current choices and envisioning our own future preferences regarding how we will evaluate those consequences.

Much of legal reasoning has always run from past to present, from received precedents to current rules. Some view past rules and preferences as natural, and fear the risks of new policies. Others view past behaviors and technologies as natural, and fear the risks of new technologies. But a legal system based on precedent is also necessarily forward-looking, because each present decision will bind or influence future decisions.

Sunstein has been one of the leaders of a school of thought that looks purposively to the future: how to design the regulation of emerging risks, how we try to foresee the future, and where we collectively want society to go.19 Through an eclectic set of tools,

19. He has often looked back to the New Deal. See Sunstein, supra n. 12; Cass R. Sunstein, After the Rights Revolution: Reconceiving the Regulatory State (Harv. U. Press 1990) [hereinafter Sunstein, After the Rights Revolution]. But this appraisal has been less to applaud the actual New Deal per se than to explore a mode of governance that is not bound to the baseline of past entitlements and that looks to improving future outcomes. Meanwhile, he rejects simplistic slogans of progressivism such as the precautionary principle as well as postmodernism. See Sunstein, Laws of Fear, supra n. 8; Cass R. Sunstein, Administrative Substance,
including law, economics, psychology, and neuroscience, he has evaluated expert and public choices and has sought ways to correct systematic mistakes. He seeks reasoning as a decision method, and seeks reasons for decision failures. His core contributions to the study of regulation (largely administrative law, but also related fields, including the regulatory functions of tort, property, and contract law, the constitutional and political theory of government, and the substance of regulatory design) have been to exhort institutions and individuals to think through decisions and their future consequences, and to bring to bear multidisciplinary perspectives on how we actually think. He pushes us to go beyond—beyond settled rules, static preferences, *homo economicus*, easy answers, simple prescriptions—to see *homo sapiens* as we really are and to see forward-looking law as it could be.

I. FACTS AND VALUES

A central claim of Sunstein’s work is that people make factual mistakes—heuristic errors about availability, probability, optimism, and related factors—which ought to be corrected by expertise. But while correcting the public on the facts, he would still defer to the public on its values. He says: “[I]t is undemocratic for officials to neglect people’s values, [but] it is hardly undemocratic for them to ignore people’s errors of fact. . . . [I]n a democratic society, officials should respond to people’s values, rather than to their blunders.”

Yet Sunstein also favors “debiasing” people’s normative prejudices. And he worries about the situation in which correcting factual errors still leaves in place enough normative bias to sustain the public’s initial view:

If most citizens wrongly believe that a 55 mph limit will fail to decrease accidents, officials should not base their decision on that error. If the effect of the change [from 65 to 55 mph] would be to save a large number of lives, officials should take that fact into account.

To be sure, it is no simple matter to say how officials should respond if most citizens reject a 55 mph limit even after having been convinced that many lives would be saved as a result. An obvious question is why, exactly, citizens remain committed to the 65 mph status quo. Perhaps some normative judgment, not a product of factual error and not adequately captured in any kind of quantitative analysis, helps to account for their commitment. My only claim is that officials should not, in democracy’s name, base their decisions on factual mistakes that are products of bounded rationality. What can be said for the speed limit example can be said for countless other problems involved in risk


22. See Richard H. Pildes & Cass R. Sunstein, *Reinventing the Regulatory State*, 62 U. Chi. L. Rev. 1, 62 (1995) (“[W]hen the differences [in risk evaluation] arise from clashes between the value frameworks of experts and laypeople[,] . . . there is no reason to defer to experts; democracies should be responsive to the informed values of their citizens.” (footnote omitted)).

23. Sunstein, supra n. 15, at 1111, 1125.
regulation, including those raised by global warming, terrorism, genetic modification of food, hurricanes, earthquakes, water pollution, and pesticides.\(^{25}\)

The remaining normative bias about risks, even after education on the facts, might reflect the type of invidious views that Sunstein would seek to “debias” in other areas of law. To take an example from environmental law: What if the public’s continuing opposition to the reintroduction of wolves (despite expert evidence—correcting the public’s erroneous view of the facts—that the risk to humans and livestock is small) derives from a normative view that wolves are intrinsically evil (“dread”), unfamiliar (“others”), and unwelcome in human society? What if this same kind of bias or (literally) prejudice against the unfamiliar, the unnatural, the dread,\(^{26}\) the other, is what underlies public intolerance of other risks—of new technologies such as genetically modified foods, or nuclear power plants, or wind turbines (despite expert evidence that they will not cause significant environmental harm), or immigrants (despite expert evidence that immigrants will not take away jobs), or foreign-manufactured products (despite expert evidence that domestic products are just as risky)?\(^{27}\) And meanwhile, the public may prejudicially tolerate familiar, “natural” risks, such as radon, tobacco, automobile accidents, weather, domestic products, and others.\(^{28}\)

Such situations blur the facts/values distinction. They seem to call for a kind of debiasing strategy that is both fact-based and value-tinged.\(^{29}\) They call for public education (both factual and normative), and for leadership. The debate over these strategies is an old one. Thomas Jefferson favored the preference-reflecting approach: “I know of no safe repository of the ultimate powers of society but the people themselves; and if we think them not enlightened enough to exercise their control with a wholesome discretion, the remedy is not to take it from them, but to inform their discretion by education.”\(^{30}\) Edmund Burke favored the preference-shaping approach: “Your Representative owes you, not only his industry, but his judgement; and he betrays, instead of serving you, if he sacrifices it to your opinion.”\(^{31}\) Perhaps both Jefferson and Burke might agree that the best instrumental method of “informing the public’s discretion” is via enlightened leadership that both educates and diverges from current

\(^{25}\) Sunstein, supra n. 15, at 1124–25 (footnote omitted).

\(^{26}\) See Paul Slovic, The Perception of Risk (Earthscan Publications Ltd. 2000).


\(^{29}\) See Cass R. Sunstein, Preferences and Politics, 20 Phil. & Pub. Affairs 3 (1991) (advocating policies to correct the public’s choices when those choices are distorted by market failures such as limited mobility).

\(^{30}\) Ltr. from Thomas Jefferson to Mr. Jarvis (Sept. 28, 1820), in The Writings of Thomas Jefferson vol. 7, 177 (H.A. Washington ed., 1854). See also Ltr. from Thomas Jefferson to Samuel Kercheval (July 12, 1816), in The Writings of Thomas Jefferson vol. 15, 32, 33 (Andrew A. Lipscomb & Albert Ellery Bergh eds., 1904) (“[G]overnments are republican only in proportion as they embody the will of their people, and execute it.”). But see Joseph J. Ellis, American Sphinx: The Character of Thomas Jefferson (Alfred A. Knopf 1998) (arguing that Jefferson was not as pure a populist as is often assumed).

public opinion to prompt reflection that shapes a new and better public opinion.32

Sunstein, while warning against going too far,33 has argued that American law should be not just preference-reflecting, but sometimes preference-shaping as well. He has observed that existing preferences are not preordained but are often themselves a product of past law.34 Most recently, he has argued that all choices are shaped by some choice architecture, so that preference-shaping is inevitable.35 He has emphasized Madison's view that representative government would

"refine and enlarge the public views by passing them through the medium of a chosen body of citizens, whose wisdom may best discern the true interest of their country and whose patriotism and love of justice will be least likely to sacrifice it to temporary or partial considerations."36

And:

For James Madison, national representatives were supposed to deliberate on constituent preferences, not to implement what constituents "want." Moreover, the notion that governments can do only what individual actors might prefer is inconsistent with the preferences of private actors themselves . . . .

In some settings, government decisions that attempt to shape preferences will produce significant increases in welfare. Consider statutes forbidding gambling, or the consumption of addictive substances, or requiring the use of motorcycle helmets and seatbelts. In all of these settings, there should be welfare gains from government action, quite apart from the impact of the conduct in question on third parties.37

Moreover, he has linked this preference-shaping role of government to correcting intolerant fears—the kinds of prejudicial attitudes that might also arise regarding unfamiliar risks:

33. Sunstein, supra n. 17, at 1543 (arguing that it is desirable to "avoid the risks of tyranny that are associated with active and self-conscious preference-shaping by public officials. The most objectionable exercises of governmental power are often associated with approaches that see character formation as an end of politics.").
34. Cass R. Sunstein, Switching the Default Rule, 77 N.Y.U. L. Rev. 106, 132 (2002). "If the endowment effect is at work, there is no avoiding a legal effect on workers' preferences. Whatever the content of the legal rule, preferences will be affected (if there is an endowment effect). A preference-shaping effect, from the default rule, is inevitable." Id. "It should be recalled here that, as a historical matter, enthusiasm for markets was itself a product, not of neutrality about preferences, but instead of a desire to produce preferences of a certain sort, while encouraging independence, entrepreneurship, and indifference to certain ascriptive characteristics." Id. at 132 n. 91 (citing Albert O. Hirschman, The Passions and the Interests: Political Arguments for Capitalism before Its Triumph 69–113 (Princeton U. Press 1977)).
35. See Thaler & Sunstein, Nudge, supra n. 14.
37. Cass. R. Sunstein, Two Faces of Liberalism, 41 U. Miami L. Rev. 245, 246, 251 (1986) (footnote omitted); id. at 251 (a "species of liberal thought—reflected in much of modern law—sees the collective selection of preferences as a natural and desirable feature of government. This species of liberalism is, of course, subject to abuse. Those abuses can be controlled, however, thus promoting both welfare and autonomy
The Constitution does not always allow gratification of private preferences to serve as a basis for government action; in fact, preference shaping is an important constitutional principle. The equal protection clause is a good illustration. In a recent case involving the mentally retarded, for example, the Supreme Court said that the Constitution prohibited legislators from acting on the basis of their constituents' fear of and revulsion toward the mentally retarded.38

This kind of fear and revulsion is arguably similar to the fear of unfamiliar, dread risks in general. Evolutionary psychology suggests that early humans survived by trusting clan members and distrusting the "other," the outsider; early evolutionary selection pressure may have favored quick recognition of faces as clan member (friend) or outsider (foe).39 If so, this kind of reaction may be part of the basis of the unfamiliarity/dread heuristic in risk perception. Modern neuroscience indicates that before considered deliberation can occur in the frontal cortex, the amygdala processes an immediate discrimination between threats or not, such as snake or stick.40 This basic discrimination may be related to base discrimination—to invidious fear and revulsion against the unfamiliar other.41

Thus, selective concern about risks—familiarity, naturalness, availability, and related heuristic errors—may derive from the same kinds of normative biases that give rise to selective (unequal) treatment of insiders and outsiders. Without claiming that risks deserve "equal protection," one can see how public evaluation of risk may be affected by both factual errors and normative biases, and how some of these normative biases may be closely related to the kinds of unequal treatment or discrimination for which Sunstein has counseled preference-shaping law. Sunstein has observed that preference distortions can be analogous to market failures, such that our "preferences about preferences," or second-order preferences, would lead us to favor government intervention to shape private choices.42

Perhaps these kinds of inherited prejudices, developed long ago as survival tactics, are now vestigial traits that disserve modern society but that continue to be manifest in normative biases about types of risks, even after facts are clarified and understood. If so, shouldn't the preference-shaping function of law be deployed to nudge these value frames?

More deeply, if choice architecture is inescapable (as Thaler and Sunstein argue)

41. Relatedly, humans appear to respond more strongly to an identifiable individual than to a larger number of unidentified people. See Karen E. Jenni & George Loewenstein, Explaining the "Identifiable Victim Effect," 14 J. Risk & Uncertainty 235 (1997). This normative bias appears to lead people to favor saving an identifiable individual over even preventing mass calamities. See Paul Slovic, "If I Look at the Mass I Will Never Act": Psychic Numbing and Genocide, 2 Judm. & Dec. Making 79 (Apr. 2007).
42. Sunstein, supra n. 38, at 1169, 1173. Similarly, Sunstein has more recently commented: "The most serious problems with [economic analysis of law] are normative, above all in the suggestion that all preferences deserve support, regardless of their origins or of the reasons brought forward on their behalf. Some reasons for action are properly blocked, even if they are based on private willingness to pay." Cass R. Sunstein, On Philosophy and Economics, 19 O.L.R 333, 347 (2000).
and if choice architecture shapes value choices, then the facts of choice architecture (and the selection among such architectures) inevitably shapes expressed preferences. If so, Sunstein’s dichotomy between correcting facts and deferring to public values would need to be bridged, and values would need to be nudged.

This question remains a challenge to Sunstein’s effort to urge attention to behavioral psychology as a critique of cognitive appraisal of facts, while being at times deferential to public values and at other times favorable toward nudging public values. This clash among competing approaches—fact-correcting and value-respecting, preference-reflecting and preference-shaping—could pose a Cass-Cass tradeoff, or even a Worst Cass Scenario, which ideally Sunstein can help resolve. Public officials making policy must exercise judgment, not just follow the facts, so they must inescapably choose among values. The presidential candidacy of Barack Obama is a case in point: Remarkably, he combined calm and deliberative reasoning about the vital issues facing the country with an inspirational rhetoric calling the American people to join together, to embrace change, to become our better selves, to create our future history.

II. MINIMALISM VS. COMPREHENSIVE DELIBERATION

Sunstein wants a law for the future, like the New Deal move away from precedent-bound common law, that is able to deal with new threats and opportunities rather than relying only on the accretion of past tradition. He favors a kind of comprehensive deliberation that considers the full consequences of decisions, that does not fall prey to status quo bias or to simple answers like the precautionary principle. The tools of this deliberation include cost-benefit analysis, risk tradeoff analysis, cost-effectiveness analysis and market-based incentive instruments, and a healthy (though not stifling) dose of executive oversight.

But he recognizes that a forward-moving project may be vulnerable to discord and, therefore, proposes that institutions should move cautiously. In order to secure agreement across diverse viewpoints, he favors a kind of incrementalism that he labels minimalism, and a kind of partial consensus that he labels incompletely theorized agreements.

The challenge here is that these two approaches—comprehensive deliberation, and minimalism—are in some tension. Incrementalism or minimalism can counsel incomplete analysis of policy impacts, “muddling through” with a limited assessment of

43. Thaler & Sunstein, Nudge, supra n. 14.
45. See Sunstein, Laws of Fear, supra n. 8; Sunstein, Precautions & Nature, supra n. 8, at 57 ("A better approach would be to acknowledge that a wide variety of adverse effects may come from inaction, regulation, and everything between. Such an approach would attempt to consider all of those adverse effects, not simply a subset."). This argument is, of course, not unique to Sunstein. And there had been critiques of the precautionary principle before Sunstein; what Sunstein added is, most notably, the behavioral psychology approach to understanding law and economics.
46. See Sunstein, Risk and Reason, supra n. 8.
each step. But each incremental or minimal step may be a partial solution to a larger problem, thereby inducing shifts and side effects that create new problems. The ambition of forward-looking law that considers full consequences requires a more synoptic, comprehensive deliberation (subject to the costs of such deliberation) than minimalism appears to offer.

This may be a question of institutions. Sunstein may argue that comprehensive analysis is better undertaken by the administrative state while the courts are better at minimalism. But judicial review—taking a hard look, or at least considering the full array of consequences—may at times be needed to ensure that administrative agencies attend to the consequences of the agencies' decisions. On the other hand, Sunstein points out that designing regulatory policy well is important across many issues, whereas review by the courts is inherently episodic and narrow.

Meanwhile, perhaps Sunstein's minimalism can be combined with a comprehensive analysis of impacts. Some critics of synoptic analysis fear its result is indeed to impede bold action—to induce paralysis by analysis. But synoptic analysis also enables broad policy changes that regulate comprehensively with fewer adverse side effects, thus avoiding backlash and gridlock. The question is whether minimalism in degree of legal change can be married to maximalism (or optimism) in the scope of consequences assessed. This seems more plausible if one considers that Sunstein's version of consequentialism is not fully monetized economic optimization, but rather the cognitive case for cost-benefit balancing: ensuring that the decision-maker considers the full set of important impacts. This approach is actually supported by cost-benefit principles, whenever striving for monetized precision would distract the decision-maker from other more important (but more difficult to quantify) impacts. That is, a proportionate analysis sensitive to decision costs would tend toward the "cognitive" case for cost-benefit analysis, or what I have called "Warm Analysis."

And Sunstein's commitment to cost-benefit analysis is not intended or designed to impede regulation. Unlike the notion that cost-benefit analysis is anti-regulatory, Sunstein's approach is evenhanded, using impact assessment both to restrain bad

50. Sunstein, supra n. 10, at 2882 ("[I]t remains possible to argue that first-order perfectionism makes sense for political participants and their representatives, even if judges should be more firmly constrained.").
51. See Sunstein, After the Rights Revolution, supra n. 19, at 608-09.
52. This may be where Sunstein is heading with Cass R. Sunstein, Trimming, 122 Harv. L. Rev. 1049 (2009).
55. Wiener, supra n. 7, at 483-89.
regulation and to prompt good regulation; to consider benefits, costs, ancillary harms, and ancillary benefits.\(^{57}\) (Sunstein could help us evaluate whether White House cost-benefit review should cover not only decisions to regulate, and to deregulate, but also not to act;\(^{58}\) and whether it should apply to "independent" agencies and to a wider arena of policy types including counterterrorism,\(^{59}\) banking and finance, trade measures, international agreements, and others.) This is Ben Franklin's cost-benefit analysis,\(^{60}\) and it recalls the early ambition of NEPA to protect the environment through cost-benefit analysis.\(^{61}\) Similarly, our work on risk-risk tradeoffs and cost-benefit analysis has been criticized as anti-regulatory,\(^{62}\) when our entire point was to point the way toward analysis of the "full set of consequences"\(^{62}\) and thus to "regulations that will be effective in achieving their own goals."\(^{64}\) Analyzing how medical care may sometimes injure patients is not anti-medicine; it is pro-health. Likewise, analyzing risk-risk tradeoffs induced by regulation is not anti-regulation; it is pro-effective protection.\(^{65}\)

III. THE FUTURE

The most important challenge for Sunstein's work on risk regulation is to develop a richer account of the future. While Sunstein writes extensively on policy analysis, risks, precaution, and cognitive heuristics, he has so far not said much about how experts and the public should actually envision future consequences and future preferences. His chapter on "The Future" in Worst-Case Scenarios, for example, is devoted to the issue of whether to discount future impacts, but not to how those forecasts and scenarios of future impacts are developed and tested. How do we envision what will happen? This is not just the province of risk assessment, but also of policy analysis and judgment: analyzing

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58. Revesz & Livermore, supra n. 56, at 174 (proposing that advocacy groups could appeal agency denials of petitions for rulemaking to OMB/OIRA for cost-benefit review of such decisions not to act).
59. See Stern & Wiener, supra n. 8, at 439 (advocating joint OIRA-NSC impact assessments of proposed counterterrorism measures, both domestic and international).
60. See supra n. 13.
61. See Calvert Cliffs' Coordinating Comm., Inc. v. U.S. Atomic Energy Commn., 449 F.2d 1109, 1117–18 (D.C. Cir. 1971) (Skelly Wright, J., finding that the EIS provision in NEPA section 102(2)(C) requires cost-benefit analysis of federal projects in order to take into account their previously neglected environmental costs). The U.S. Supreme Court subsequently held that NEPA requires only a "purely procedural" exercise of informed decision-making—a so-called "stop and think" exercise—with no substantive criteria for such decisions. See Strycker's Bay Neighborhood Council, Inc. v. Karlen, 444 U.S. 223, 227–28 (1980).
62. See Revesz & Livermore, supra n. 56.
64. Sunstein, supra n. 4, at viii.
65. Wiener, supra n. 49, at 42–43("Concern about countervailing risks has no political brand. Both conservatives, liberals and centrists worry about the dysfunctions of the regulatory state. Each may emphasize different examples—conservatives may worry about the side effects of health and environmental rules, while liberals may worry about the side effects of dams, police practices and harsh criminal penalties—but their concerns have the same analytic basis. Countervailing risks are a generic challenge. The first modern environmental law, NEPA, was a response to the countervailing risks of government interventions to achieve non-environmental policy goals such as transportation and electrification. Worrying about countervailing risks is not anti-environmental, or anti-law-and-order, or anti-regulatory, it is pro-results; it is the sober habit of the sacramental optimist." (Footnote omitted).
the future consequences of alternative policies and choosing among those policies. This requires foreseeing, envisioning—what the future will bring, and what our future preferences will be.

This area seems ripe for a Cassian look at cognition and prediction—what Harvard's Daniel Gilbert and Daniel Shachter call "prospection" or "the prospective brain." Gilbert argues that only humans think about the future, and yet that prospection is hampered by our brains' limited capacity to imagine futures that have not yet happened. Schachter, Addis, and Buckner find that we use the same parts of the human brain (what they call "neural machinery") to envision the future that we also use to process memories. The implication is that human prospection is tied to the past, and thus to the biases of the availability heuristic. Moreover, Gilbert argues that humans err in predicting their own future preferences—our own future selves.

And there is a venerable literature on the development of scenarios, from de Jouvenel to Kahn and Wiener to Schwartz and others, which emphasizes the value of careful attention to detail, context, and the intersection of multiple trends.

The challenge here is to move from the cognitive or behavioral psychology of risk perceptions—explaining why people perceive risks as they do—to the cognitive psychology and planning tools of policy comparison—explaining why people envision the future as they do, and how to do better. Schachter et al. write:

As we and others have argued, since planning for the future is a task of paramount adaptive importance, it makes sense to conceive of the brain as a fundamentally prospective organ that is designed to use information from the past and present to generate predictions about the future. Such a perspective encourages us to view memory as a key component of the prospective brain that helps to generate simulations of possible future events that contribute to the formation of plans and predictions. Such a perspective calls for a shift not only in conceptual emphasis, but also a change in methodology. Rather than focusing predominantly on assessing memory with tasks that query the past, greater emphasis should be placed on the development of tasks that capture how memory is used to simulate,

66. In the tradition of "Coasean."


69. Gilbert & Wilson, Prospection, supra. n. 67, at 1352.

70. Schacter, Addis & Buckner, supra n. 67, at 39.


plan, and predict the future.\textsuperscript{76}

This shift in focus is consistent with others’ advice to compare policy options and their impacts, not compare risks per se, because comparing risks does not help us decide which policies to adopt.\textsuperscript{77} One risk might be large but intractable; another might be smaller but easily reduced. And policies might reduce risks but pose countervailing risk side effects. It is policies that matter.

Focusing on the future also adds a challenge for consideration of preferences: We need to look not only at current preferences, but at our future preferences regarding the future consequences of current policy choices.

Further, it puts emphasis on the dynamic character of policy-making. Risk regulation is not a one-off affair. The essence of risks is that they occur in an uncertain future. Our errors not only in risk perception but in policy prospectation mean that we will always be readjusting to changing circumstances. Risk regulation is inescapably an iterative process of learning, adaptive management, and updating. Precautionary policies, if adopted, must be provisional, with continued research and opportunities for revision. \textit{Ex ante} impact assessment of risk regulation requires validation—\textit{ex post} evaluations to appraise policy outcomes and to test and improve \textit{ex ante} assessment methods.

From one perspective, all we have is the present: The past is gone, and the future is inchoate. From another perspective, the present is but an instant, lost already; the past is not recorded but reconstructed by our memories; and all we can really grasp and shape is the endless stream of the future.

**IV. BEST CASS SCENARIO**

It is easy to imagine worst case scenarios in which all our best ideas, including even Cass Sunstein’s, are no match for the vicissitudes of the future. But provided we consider all important impacts and avoid “rash steps,” the power of good ideas to meet challenges and parry risks has a decent track record in human history. As Barbara Tuchman argued cogently in her classic \textit{The March of Folly}, governments fail when they forsake thinking and reason in favor of impulse and ideology.\textsuperscript{78}

Good government needs to think through problems seriously (and yet not obsessively). National leadership needs to take seriously the recursive character of the challenge: evaluate (prospectively), decide, experience, revise, and then evaluate and decide again. If regulatory agencies give the nudges, if they design the choice architecture, then national administration should be alert for errors or biases or interest group distortions in those architectures. In Sunstein’s terminology, leadership should be a second-order perfectionist, a choice architect to guide the choice architects—nudging the front-line nudgers (the agencies) to do a better job at policy design, prospection, evaluation, and revision. In such a world, we would ask not \textit{qu	extsuperscript{e}is custodiet ipsos custodes} (who will watch the watchers), but who will nudge the nudgers? Perhaps

\textsuperscript{76} Schacter, Addis & Buckner, supra n. 67, at 56 (citations omitted).


Sunstein, at OMB/OIRA, as in academia, will show the way. That would be a Best Cass Scenario.