

## BOOK REVIEW

### Environmental Costs, Benefits, and Values: A Review of Daniel A. Farber’s *Eco-Pragmatism*

*Reviewed by Paul Boudreaux\**

I.	INTRODUCTION .....	125
II.	ECONOMIC EFFICIENCY VERSUS SAFETY FIRST .....	127
	<i>A. Framing the Debate</i> .....	127
	<i>B. Economic Preferences and Political Values</i> .....	131
	1. The Economic Efficiency Approach .....	131
	2. The “Neo-Republican” Critique .....	137
III.	AN ENVIRONMENTAL “BASELINE” .....	142
	<i>A. Three Alternative Methods</i> .....	142
	<i>B. What Is an “Environmental Baseline”?</i> .....	144
	<i>C. Justifying an Environmental Baseline</i> .....	147
	1. The General Thrust of the Statutes .....	147
	2. The Consensus of the Community .....	148
	3. The Morality of Individual Human Integrity .....	150
	4. Distrust of the “Bean Counters” .....	152
	<i>D. Distinguishing Between a Baseline and a Mixed         Method</i> .....	153
IV.	THE QUAGMIRE OF DISCOUNTING AND UNCERTAINTY .....	155
	<i>A. Discounting Future Needs and Costs</i> .....	156
	<i>B. The Dilemma of Uncertainty</i> .....	159
V.	IDEAS FOR CHANGE .....	160
	<i>A. The Precautionary Principle</i> .....	160
	<i>B. Regulatory and Review Reform</i> .....	162
VI.	CONCLUSION .....	165

#### I. INTRODUCTION

How should courts decide environmental law cases? Should the special nature of environmental concerns justify a distinctive

---

\* Attorney, United States Department of Justice, Washington, D.C.; B.A., J.D., University of Virginia; LL.M., Georgetown University. The author would like to thank Georgetown Professor Richard Lazarus for his comments on earlier drafts of this Article.

approach? In his new book, *Eco-Pragmatism*,<sup>1</sup> Professor Daniel A. Farber argues that cases should be decided from “an environmental baseline.”<sup>2</sup> His pragmatic approach includes both the cost-benefit balance of economic analysis and a recognition that the nation has made a special commitment to environmental protection.<sup>3</sup> “To the extent feasible without incurring costs grossly disproportionate to any benefit,” Farber concludes, “the government should eliminate significant environmental risks.”<sup>4</sup>

Farber seeks a *détente* between the principles of economic efficiency<sup>5</sup> and environmentalism.<sup>6</sup> Indeed, probably the strongest attribute of *Eco-Pragmatism* is its fair exposition of the intellectual theories behind the poles of the debate, which are too rarely provided in the worlds of environmental and economic polemics. Environmentalists are encouraged to ponder the power and fairness of cost-benefit analysis. The argument is powerful that a regulation does not truly serve the public welfare if it harms the individual welfare rather than fostering it. On the other side, Farber explores many of the flaws in traditional economic study.<sup>7</sup> A host of potential environmental values do not fit easily into most cost-benefit analyses. Economics is not misguided; rather, the cost-benefit framework is not broad enough to recognize some values that only government can nourish.

And yet, Farber’s suggested middle ground often appears to be just as crumbly at the edges. Take his summary conclusion that government should “eliminate significant environmental risks,” except when it will not incur “disproportionate cost.”<sup>8</sup> It is not clear that this test would be so different than one that instructed government to enforce traditional private property rights in order to foster economic growth, to the extent that they do not create excessive environmental risks. Does it matter which factor, risk or wealth, we make the baseline command and which we make the condition subsequent? In addition, Farber fails to explore fully the practical applications of his proposed environmental baseline, which is the center of his work. At times, he appears to argue for reallocating legal

---

1. DANIEL A. FARBER, *ECO-PRAGMATISM: MAKING SENSIBLE ENVIRONMENTAL DECISIONS IN AN UNCERTAIN WORLD* (Chicago: Univ. of Chi. Press 1999).

2. *Id.* at 93.

3. *See id.* at 114-23.

4. *Id.* at 131.

5. *See id.* at 39-49.

6. *See id.* at 51-69, 104-06.

7. *See id.* at 35-70.

8. *Id.* at 131-32.

presumptions, at other times, for altering judges' mindsets, and in other instances, for fostering public faith in the legal system.<sup>9</sup> Finally, his administrative proposals, which extol the benefits of insulation from political and public pressures, are decidedly undemocratic. This is surprising, considering that much of his justification for an environmental baseline is the purported need for widespread public support of environmental decisions.

*Eco-Pragmatism* suffers from an abundance of Polonius-like admonitions: law is encouraged to judge all the factors, consider all options, think about the long-term but concentrate on the short, be flexible, and be prepared for change. In these prescriptions *Eco-Pragmatism* is unobjectionable but unexceptional. Its reach is also limited by a nearly single-minded focus on the risks of potentially fatal pollution to the exclusion of other aspects of environmental law.

Much of this critique, however, is perhaps unfair to a pragmatist such as Farber. A pragmatist's job is not to provide full and convincing arguments of any one pole. The polemicist's job is easier, in that he or she is free to linger on every point, to turn up the flame of advocacy to its highest setting, and to dismiss or ignore unpleasant points on the opposing side. The pragmatist must be more mundane. He cannot persuade with fire and passion; he must be able to point out the excesses in each argument, and convince the reader that a less colorful middle path makes sense. In this test Farber succeeds. *Eco-Pragmatism* should make true believers on either side stop and question, at least for awhile, the solidity of their cause.

## II. ECONOMIC EFFICIENCY VERSUS SAFETY FIRST

### A. Framing the Debate

Farber frames the debate in environmental law as one of "economics versus politics."<sup>10</sup> It can also be characterized as cost-

---

9. See *id.* at 201-02.

10. *Id.* at 35-69. Because Farber seems to assume that the outcome of the political process will be more environmentally oriented than the outcome of economic analysis, he makes environmentalism and politics virtually synonymous. This is disconcerting. As any committed environmentalist could attest, there are times in which politics do not lead to an environmentally oriented outcome. Indeed, sometimes economic analysis would point to a more environmentally oriented outcome than would the political process, which is shaped by money and influence. Consider, for example, the failure in the early 1990s of Interior Secretary Bruce Babbitt's efforts to reform federal land regulations in order to make grazing policies more environmentally sensitive and more economically efficient. See, e.g., Louis Jacobson, *A Baaad Patch for Sheep Farming*, NAT'L J., Feb. 21, 1998; Karl N. Arruda & Christopher Watson, *The Rise and Fall of Grazing Reform*, 32 LAND & WATER L. REV. 413, 415 (1997). Indeed, because Farber concludes

benefit analysis versus neo-republicanism, or market preferences versus collective values. As befits a good pragmatist, Farber provides a dispassionate and even-handed explication of these competing approaches to environmental law. His prose is respectful of each camp, and he draws the reader to insights from both sides. With a few exceptions, the book treats environmental law as being the legal debate over potentially deadly pollutants of air, land, and water, as opposed to the regulation and protection of natural resources.

How should law and society make the unavoidable trade-off between protection from pollution and the costs of abatement, especially in cases in which uncertainty clouds the law's ability to locate a just and efficient solution? Farber employs the example of *Reserve Mining Co. v. EPA*,<sup>11</sup> a long-running and instructive dispute from Farber's home state of Minnesota. The Reserve Mining Company, which helped maintain northern Minnesota as one of the world's leading producers of iron ore, was one of the Duluth area's largest employers from the 1940s into the 1970s.<sup>12</sup> Part of its operation involved dumping tons of "tailings," which are mostly rock and dirt, directly into Lake Superior.<sup>13</sup> In 1972, the United States Environmental Protection Agency (EPA), along with Minnesota and other states, sued the company for violations of the Federal Water Pollution Control Act, other environmental statutes, and the common-law tort of nuisance.<sup>14</sup>

The plaintiffs first had hoped to pin their case on unclear claims of ecological damage caused by the massive tailings, which exceeded all of the sediment dumped into the lake by its tributaries.<sup>15</sup> Farber recounts the dramatic turn of events in 1973, when EPA scientists found asbestos fibers in a sample of Duluth's drinking water.<sup>16</sup> The development caused a panic in Duluth and transformed the action into a crusade to protect public health and safety.<sup>17</sup>

The stakes were dramatic, as they are in many big environmental cases. The plaintiffs alleged that the dumping risked the lives of

---

that law should adopt an environmental baseline, it might have been useful for him to refer to "environmentalism" as the opposition to economics. See FARBER, *supra* note 1, at 93.

11. 514 F.2d 492 (8th Cir. 1975), *aff'g in part* 380 F. Supp. 11 (D. Minn. 1974).

12. See FARBER, *supra* note 1, at 16-17.

13. See *Reserve Mining Co.*, 514 F.2d at 500.

14. See *id.* at 501.

15. See FARBER, *supra* note 1, at 21.

16. See *id.*

17. See *id.* Asbestos, which is a group of minerals, was known to cause cancer when inhaled. See *id.* at 20-22.

citizens of the Lake Superior region.<sup>18</sup> As a counter-argument, the company claimed that it would have to spend at least \$200 million to create an alternative disposal method, with no guarantee of continued operation if the court enjoined the lake dumping.<sup>19</sup>

Farber relies on *Reserve Mining* to highlight what he regards as the overarching question of uncertainty in environmental law.<sup>20</sup> Most of the fundamental questions of scientific fact were unresolved. Science could not determine conclusively whether drinking asbestos, as opposed to inhaling it, was a serious threat to health.<sup>21</sup> Science could not resolve conclusively how much asbestos was in Duluth's drinking water, as samples differed widely.<sup>22</sup> And science could not determine whether the asbestos had already caused any deaths in Duluth, because it was nearly impossible to pick out one prospective cause of death among the cacophonous "noise" of myriad potential factors.<sup>23</sup> Meanwhile, the mining company claimed that the asbestos was a natural component of the lake and was not generated by the tailings at all.<sup>24</sup> In the face of this uncertainty, and after a trial that lasted 139 days, the United States District Court for the District of Minnesota chose the safest action in terms of public health: The court ordered Reserve Mining to stop dumping its tailings into Lake Superior.<sup>25</sup> On appeal, the Eighth Circuit, after taking the district court to task for many of its conclusions, affirmed the key aspects of the trial court's conclusion that safety is paramount.<sup>26</sup>

The aftermath of the litigation was nearly as contentious. The trial judge chafed at the appellate court's decision to order a slow phase-out of the lake dumping, as opposed to an immediate halt.<sup>27</sup> Millions were spent by the company in the late 1970s as part of a conversion to a safer land disposal process, but at the same time, a down-turn in the steel business nationwide threatened Reserve Mining's entire operation.<sup>28</sup> By the 1980s, the once massive Reserve Mining operation had been sold and was a mere shadow of its former

---

18. *See id.* at 31-32.

19. *See id.* Indeed, the company essentially closed its operations for a number of reasons in the 1980s. *See id.*

20. *See id.* at 33-34.

21. *See Reserve Mining Co. v. EPA*, 514 F.2d 492, 514-20 (8th Cir. 1975).

22. *See id.* at 516 & n.48.

23. *See FARBER, supra* note 1, at 21-28.

24. *See Reserve Mining Co.*, 514 F.2d at 501-02.

25. *See id.* at 21-29; *Reserve Mining Co. v. EPA*, 380 F. Supp. 11 (D. Minn. 1974).

26. *See Reserve Mining Co.*, 514 F.2d at 492.

27. *See FARBER, supra* note 1, at 30-31.

28. *See id.* at 31.

self.<sup>29</sup> Just as scientific studies could not determine conclusively whether the dumping caused a significant threat to health, it was unclear whether the legal rulings—as opposed to the “noise” of other economic factors—caused the demise of Reserve Mining and the loss of hundreds of jobs in the Duluth area.<sup>30</sup> No easy lessons can be learned.

For many observers, the answer to the question of “costs or safety” would seem to be fairly simple, if not always pleasant to enforce: Human health and safety should come first. Plainly, however, this is not always so. There are many potential ways that society could engender greater public safety, such as requiring a standard weight for new automobiles or shutting down entire polluting industries, yet we refuse to choose them because of the cost. Indeed, Farber underestimates the complexity of the question by his exclusive focus on pollution that risks death.<sup>31</sup> What about less drastic forms of degradation? Every day, people arguably suffer health damage in Los Angeles and Houston because of the noxious stew in the air, and yet we hesitate to impose upon society the painful costs of drastic steps to decrease smog.<sup>32</sup> It is one thing for a court to order a single mining company to spend millions to dispose of tailings in a safer manner; it is another thing to impose costs more directly on millions of Americans.

Moreover, no easy solution is found by arguing that corporations should never risk health and safety by polluting. Current environmental laws permit tons of pollutants to enter water and air every day, because, as a nation, we do not judge pollution so harshly that we are willing to give up our entire way of life to eliminate it.<sup>33</sup> Trade-offs are necessary. Creating a balance between the benefits obtained by activities that pollute and the benefits of health and safety is the pragmatist’s goal.

---

29. *See id.* at 31-33.

30. *See id.*

31. *See id.* at 70-92.

32. See Michael Gardner, *Oops! Car Pollution Worse Than Thought*, SAN DIEGO UNION-TRIB., Oct. 30, 1999, at A3. For example, government could spend the money necessary to build efficient public transportation in these cities and could impose higher taxes to coerce people out of their cars and “sport utility vehicles.”

33. *See, e.g.*, Clean Air Act, 42 U.S.C. §§ 7401-7671q (1994 & Supp. III 1997). Air pollution is not prohibited, but limited through amounts and procedures that reflect political compromises. For example, in 1995, there were emitted into the air approximately 18,320,000 tons of sulfur dioxide, 21,777,000 tons of nitrogen oxides, and 22,864,000 tons of volatile organic compounds. *See* U.S. DEP’T OF COMMERCE, STATISTICAL ABSTRACT OF THE UNITED STATES 234 (1997) (citing EPA figures).

B. *Economic Preferences and Political Values*

Farber pits the approach of economic efficiency against the approach giving primacy to health and safety, as expressed through politics.<sup>34</sup> He finds flaws in both pure approaches that can only be remedied by recognizing the values of the opposing approach.<sup>35</sup> According to Farber, “[m]arkets are flawed as arenas in which people express their personal values. But, then, so is politics. Both offer a blurry and sometimes distorted view of our society’s judgments. For this reason, we cannot afford wholly to ignore either one in making environmental policy decisions.”<sup>36</sup>

1. The Economic Efficiency Approach

One of the most useful attributes of *Eco-Pragmatism* is Farber’s concise summary of the argument of economic efficiency in environmental questions, which too often is misunderstood or ignored in legal and public debate, and too often is taken for granted in the technical world of economic analysis.<sup>37</sup> Because his book is a general work and not an economic treatise, Farber wisely does not dwell on the details or mathematics of the economic argument. Succinctly, the essence of efficiency is that questions of choice, such as the legal choices in *Reserve Mining* and other environmental law disputes, should be decided by assessing both the costs and the benefits of a particular alternative, and selecting an alternative only when the benefits exceed the costs.<sup>38</sup>

The economic efficiency argument—what Farber also calls “cost-benefit analysis”—is premised on the elegant and assuring contention that most of the choices that humans have to make can be answered, and indeed are answered, through the market.<sup>39</sup> Humans express what they want in terms of buying and selling; when human desires are aggregated into an economy, human preferences are met

---

34. See FARBER, *supra* note 1, at 35-69.

35. See *id.* at 65.

36. *Id.*

37. See *id.* at 39-49.

38. See *id.* at 131. Indeed, as a matter of logic, this would seem to be the correct method for addressing virtually any human choice. In the world of economics, however, the words “cost” and “benefit” have become terms of art, which necessitate greater scrutiny. It is unfortunate that these neutral terms have been co-opted, so that opponents are left appearing to argue that they do not agree that law should choose the option in which the benefits exceed the costs. Perhaps as a matter of logic the debate should be framed in terms of “drawbacks” and “advantages,” with the two terms encompassing ideas and points that are wider than the economists’ “costs” and “benefits.”

39. See *id.* at 91-92.

with a closer fit than any government program ever could create.<sup>40</sup> On the demand side, each person can maximize his or her own preferences by the infinite variations of cost, quality, and the fact that no one is compelled by the state to buy or sell anything a person does not want at a particular price.<sup>41</sup> On the supply side, money will flow to those providers of goods and services that do the best job of meeting public demand; profits flow to these corporate and other providers not from some mystic demon of capitalism, but by the aggregated preferences of millions of consumers.<sup>42</sup> The relative value of a good or service can be judged by how much consumers are willing to spend for it, and how quickly they will switch their choices if price changes.<sup>43</sup> Because the market typically is efficient in reflecting human preferences, interventions by the government typically are considered inefficient.<sup>44</sup>

---

40. Communist planners were bogged down by immensely complex decisions of how much bread and fish to place into state-owned stores to meet public demands on a day-to-day and year-to-year basis. See ALEC NOVE, *THE SOVIET ECONOMIC SYSTEM* 150-52 (1977). The planners did not understand that, by allowing a market to operate, consumers and private retailers would balance supply and demand better than the planner. See *id.*

41. See *id.*; FARBER, *supra* note 1, at 40-41.

42. The notion that government should act in order to respond to human preferences was evident even in the earliest of environmental disputes. In deciding to support the damming of the Hetch valley in Yosemite National Park, for example, President Roosevelt concluded that the dam would "provide the greatest good for the greatest number." PHILIP SHABECOFF, *A FIERCE GREEN FIRE* 73-74 (1994). This statement, which sorely disappointed Roosevelt's friend John Muir, who struggled to stop the dam, is a rough outline for the idea that aggregating human preferences is the appropriate approach to government decisionmaking.

43. See NOVE, *supra* note 40, at 150-52; FARBER, *supra* note 1, at 40-41.

44. Because benefits and costs sometimes are felt by persons outside the transaction, the market may not reflect human preferences perfectly. See, e.g., WILLIAM ASHWORTH, *THE ECONOMY OF NATURE: RETHINKING THE CONNECTIONS BETWEEN ECOLOGY AND ECONOMICS* 146 (1995). The most common examples are public goods and externalities, which exist because of the inability to define property rights completely. See *id.* For example, when a security force is created in a community, everyone in the community presumably benefits, regardless of whether they have actually paid for it. Because everyone will hope to "free ride" on someone else's purchase of such a public good, the market may not create enough of the public good. Therefore, government should compel everyone to pay for public goods through compulsory taxation. See *id.* Similarly, because no one owns the air under the common law, polluters have an incentive to "use," or pollute, this common property, resulting in harm for everyone. See Garrett Hardin, *The Tragedy of the Commons*, 162 *SCIENCE* 1243, 1244 (1968). Governmental intervention is justified in order to vindicate the harms that the common law of property could not. When these failures occur, neoclassical economists argue that the most efficient solution is to adjust the market, not obliterate it, so as to retain the market's ability to judge the complexity or nuances of human preferences. See Joshua D. Sarnoff, *The Continuing Imperative (But Only From a National Perspective) for Federal Environmental Protection*, 7 *DUKE ENVTL. L. & POLICY F.* 225, 226 n.147 (1997) (discussing externalities). For example, when production creates a negative externality, the best solution is not to ban it, but to work within the market by taxing it at an amount that seems to internalize the externality. See *id.*



In dealing with human lives, the economic efficiency argument has become sophisticated enough to recognize that questions of life and death are of interest to persons other than those whose lives are at stake.<sup>45</sup> Citizens of all stripes presumably do not want to see, or know, that pollution has snuffed out innocent lives.<sup>46</sup> The economists say that because this preference presumably can be compared to others for which we know the monetary weight, we can determine how much society values a human life.<sup>47</sup> The value is certainly not infinite. Undoubtedly, most everyone would be willing to pitch in a dollar or two in taxes in order to raise funds to buy out a company that was creating pollution that we are certain will kill one person each year. However, what if that cost starts to rise? At some point, the pinch may become so strong that we decide that enough is enough—most citizens would rather have the unlucky (and happily nameless) person perish.<sup>48</sup> Moreover, the economists say, the answer in pollution cases cannot always be that “the polluter should pay.” When the polluter creates a good or service that people value enough, the polluter will pass the extra cost onto the consumer.<sup>49</sup> Consider the observation that tremendous good might come from higher gasoline taxes, which could help fund safer roads, discourage unnecessary driving, and provide for public safety; then remember the public outcry in 1996 when gas prices crept up by a few cents.<sup>50</sup> Even more recently, consider the American government’s argument for moderation at the 1997 Kyoto World Conference on the Dangers of Global Warming, a position generated by fear of public and political opposition to the potential cost of prevention efforts.<sup>51</sup>

Indeed, as Farber explains at some length, there is a burgeoning industry of trying to determine how much Americans value a life that

---

45. See FARBER, *supra* note 1, at 48-49.

46. Such human preferences are called “non-use” preferences. See *id.* Human preferences may not be so altruistic when it comes to voluntary deaths, such as through smoking, suicide, euthanasia, or driving a motorcycle without a helmet.

47. See *id.* at 49-51.

48. See *id.*

49. Cf. *id.* at 58-60.

50. See Jessica Mathews, *In the Tank on Gas Policy*, WASH. POST, May 6, 1996, at A19 (criticizing feverish political action to suppress gas prices after a small rise).

51. See *Emissions Plan Assailed*, CHI. TRIB., Oct. 24, 1997, at 8 (discussing friction between United States and European positions); see also James Warrick, *White House Predicts Low Cost for Pact on Warming*, WASH. POST, Mar. 4, 1998, at A1 (noting debate over cost to public); *Warming Pact to Cost You \$70-\$110 a Year*, CLEV. PLAIN DEALER, Mar. 4, 1998, at 9A. See generally Jay Michaelson, *Geoengineering: A Climate Change Manhattan Project*, 17 STAN. ENVTL. L.J. 73 (1998) (examining the lack of success in creating effective worldwide climate change policy).

would be taken by pollution.<sup>52</sup> Using contingent valuation studies, estimates have ranged from \$15,000 to \$7 million or higher per life.<sup>53</sup> If the costs of pollution abatement are greater than citizens' "willingness to pay" to save these lives, the efficiency argument goes, then the costs of prevention exceed the benefits, and government should not enact the prevention.<sup>54</sup> Only when the "willingness to pay" exceeds the costs is government action justified on efficiency grounds.<sup>55</sup>

The power of this efficiency argument is accentuated when the benefits of the regulation are not as clear as one life per year. What if the probability of even one death is very low? What if the benefits of the regulation are not in terms of death but of less drastic health interests? Should government exact a multi-million dollar cost on the economy to eliminate the risk that some people might experience some shortness of breath due to a particular industry's pollution each year?<sup>56</sup> One can push the argument so that at some point even the most strident environmentalist will agree that the drawbacks of the regulation are greater than the benefits. This is the essential critique by the economists of a "safety-first" approach to environmental law—

---

52. See FARBER, *supra* note 1, at 49.

53. See *id.* at 85. Indeed, because of the possibility that these studies will create seemingly solid numbers to support the idea that environmentalism has economic value in terms of cold, hard dollars, some environmentalists enthusiastically support contingent valuation studies. In 1997, a University of Maryland professor tried to estimate the dollar value of the world's ecosystems. See Robert Costanza et al., *The Value of the World's Ecosystem Services and Natural Capital*, 387 NATURE 253 (1997).

54. FARBER, *supra* note 1, at 47-51. The flip side of "willingness to pay" is the "willingness to sell" idea, which asks how much people would have to receive to be willing to part with something. See *id.* at 100. Farber notes that figures for willingness to sell tend to be much higher. See *id.* A likely explanation for this phenomenon, which Farber does not discuss, is that people generally dislike the idea of upsetting their personal status quo, even a theoretical one. See CASS R. SUNSTEIN, FREE MARKETS AND SOCIAL JUSTICE 248-56 (1997) (discussing an important "status quo bias" in public ideas about environmental decisions). This preference for the status quo explains in part the nation's apparent consensus at the turn of the millennium that no new big government programs are needed, and that, at the same time, no current programs should be eliminated.

55. See FARBER, *supra* note 1, at 58-60. Contingency valuation studies have been, as one might expect, very controversial. On the one hand, some environmentalists complain about trying to reduce health, safety, and natural values to a dollar amount. On the other hand, there are complaints that citizens tend to overestimate their true feelings about the valuation of "non-use" assets, and that survey results vary wildly, depending on how the questions are presented. See generally Note, "Ask a Silly Question . . .": *Contingent Valuation of Natural Resources Damages*, 105 HARV. L. REV. 1981, 1985-90 (1994) (discussing drawbacks and arguing that such studies are worthless and should not be used).

56. Disappointingly, Farber does not address at length potential environmental harm to humans other than death.

that the law imposes potentially colossal costs to try to eliminate minor risks and harms.

Farber relies on the work of now Supreme Court Justice Stephen Breyer for the notion that environmental law should explicitly and scientifically weigh the costs and benefits of particular risk prevention efforts.<sup>57</sup> Breyer compiled a list of potentially fatal environmental risks and the costs of abating each source of risk.<sup>58</sup> He concluded that certain, fairly mundane steps, such as banning unvented space heaters and stronger laws on passive auto safety belts, save lives far more cost-effectively than regulations against many pollutants.<sup>59</sup> The risks targeted by many, costly environmental regulations are less dangerous, Breyer suggested, than the risks posed by avoiding mammograms or eating raw mushrooms.<sup>60</sup> The argument is not necessarily that current law regulates too much, but that it regulates illogically by imposing regulations on the wrong problems and

---

57. See FARBER, *supra* note 1, at 38 n.4 (citing STEPHEN BREYER, *BREAKING THE VICIOUS CIRCLE: TOWARD EFFECTIVE RISK REGULATION* (1993)). Breyer called for the de-politicization of environmental risk regulation. See BREYER, *supra*, at 55-81. Criticism of the politics of important public policy decisions is not limited to environmental law. There are probably commentators on nearly every field of public policy who see advantages to reserving certain decisions to apolitical experts. See, e.g., Defense Base Closure and Realignment Act of 1990, 16 U.S.C. § 2567 (1994) (law designed to remove military base-decisions from politics); *The National Guard in a Brave New World*, *ECONOMIST*, May 9, 1998, at 25 (discussing the political pressures that warp policy decisions on how to organize and use the Army and the National Guard).

58. See BREYER, *supra* note 57, at 24-27.

59. See *id.* See generally W. KIP VISCUSI, *FATAL TRADEOFFS: PUBLIC AND PRIVATE RESPONSIBILITIES FOR RISK* (1992) (discussing costs of leaving risk abatement to private parties). Most of the risks that Breyer concludes are more cost-effective to regulate are common household risks such as space heaters, not taking vitamins, and risks associated with motor vehicles. See BREYER, *supra* note 57, at 24-27. People tend to exaggerate exotic and unfamiliar risks, such as those associated with chemicals and toxic substances. See SUNSTEIN, *supra* note 54, at 131-37. Unfamiliarity may create exaggerated fears. See *id.*

The most fundamental criticism of Breyer's assessment is that he all but ignored factors other than the risk of death in people's assessment of potential harms. See SUNSTEIN, *supra* note 54, at 133-37, 143 (arguing that citizen views "can be richer and more rational than the expert alternatives"). Of these "value" factors, voluntariness—the notion that some risks are assumed—is probably the most wide-reaching. See BREYER, *supra* note 57, at 24-27. If a person assumes that he or she is free to decline a risk, while others voluntarily assume such a risk (such as smoking or using cheap space heaters), this person is likely to discount the importance of managing this risk. See *id.* For a sharp critique of Breyer's work, including a criticism of his scientific assumptions, of his inconsistent premise that government should spend the same amount of money to combat environmental risk while changing its priorities drastically (probably adopted in order to distance himself from the de-regulators), and of his utopian idea that government should remove risk regulation entirely from the realm of politics, see Lisa Heinzerling, *Political Science*, 62 U. CHI. L. REV. 449, 463-72 (1994).

60. See BREYER, *supra* note 57, at 14, 17.

ignoring others.<sup>61</sup> For years, economically oriented thinkers have encouraged government not to regulate pollutants by blanket requirements of technology or emission, but to adopt emission trading systems, whereby market forces would be harnessed to cut back on pollution in the most cost-effective manner.<sup>62</sup>

The economists' cost-benefit analysis offers the attraction of a scientific approach, Farber notes, but this attraction is more lure than reality.<sup>63</sup> Inherent in the calculation of costs and benefits are a number of judgment calls: the valuation of life, discounting future risks to current value, and the estimates of risk probability.<sup>64</sup> Change the assessment of any of these variables and the cost-benefit balance can teeter drastically.<sup>65</sup> One of *Eco-Pragmatism's* strongest messages is Farber's cogent and forceful debunking of the idea that some kind of super-calculator can replace the difficult choices that law and politics currently make.<sup>66</sup> Moreover, Farber somewhat tentatively raises the idea that the economists who offer to conduct these cost-benefit studies are not value-free in their personal approaches.<sup>67</sup> As students trained to believe that production, free markets, and growth are positive attributes of a society, economists may approach their analyses with a mindset against regulation. Certainly the opposite criticism is made of environmental advocates—that they find risks, danger, and costs in almost any industrial endeavor that they distrust.<sup>68</sup>

A defense of the cost-benefit approach is that even if it does not resolve questions with scientific precision, it is more likely, in more instances, to find a decent solution than the alternative political method, which involves backroom political dealing, poorly

---

61. See *id.* at 1-25 (arguing that current law is random, excessive, and inconsistent); see also Bruce A. Ackerman & Richard B. Stewart, *Reforming Environmental Law*, 37 STAN. L. REV. 1333, 1340 (1985) (calling for more economic incentives, including emissions trading programs, in environmental law). See generally PHILIP K. HOWARD, *THE DEATH OF COMMON SENSE* (1994).

62. See, e.g., Ackerman & Stewart, *supra* note 61, at 1341-43 (providing a good and widely cited summary of the emissions trading and decentralization ideas). Even environmentalist Christopher Stone has written that environmental law cannot succeed unless it takes account of the economic costs of prevention, and that economic analysis provides a good way of making compromises between costs, benefits, and competing demands. See CHRISTOPHER D. STONE, *THE GNAT IS OLDER THAN MAN: GLOBAL ENVIRONMENT AND HUMAN AGENDA* 149-50 (1993).

63. See FARBER, *supra* note 1, at 51.

64. See *id.* at 83.

65. See *id.* at 167.

66. See *id.* at 166-72.

67. See *id.* at 119.

68. See Ackerman & Stewart, *supra* note 61, at 1334 (criticizing the self-interest of regulators, scientists and advocates).

misunderstood public referenda, and the gut reactions of an overworked and under-trained judge.<sup>69</sup> This defense is not an economic, but a political science, argument. Indeed, Farber repeatedly expresses sympathy with the idea that assigning decisions to a group of serious analysts would usually result in a better outcome than assigning it to various actors in the political and adjudicative arena.<sup>70</sup>

As a pragmatist, Farber proposes a middle role for cost-benefit analysis: to serve as a framework for resolving environmental law disputes.<sup>71</sup> To the extent that Farber is arguing that law should improve its effectiveness by looking at both the economically derived costs and benefits of a particular course, such a suggestion makes sense. The problem that Farber does not resolve, however, is how the framework of efficiency fits with his own “environmental baseline.” Presumably a framework, like a baseline, is a decisionmaker’s starting point. The starting point can make a difference. Yet it seems impossible to start with both a “framework” of efficiency and a “baseline” of environmentalism. Because his book revolves around the argument for an environmental baseline, we can safely assume that Farber views economic efficiency as a variable to inform a decisionmaker’s calculus and not truly a framework from which to begin the analysis.

## 2. The “Neo-Republican” Critique

The most fundamental criticism of the efficiency/cost-benefit approach is that it misses the essential reason for environmental laws: that environmental restrictions are not economic judgments at all, but moral ones.<sup>72</sup> According to Farber, effective moral judgments in a society cannot be made by economists, but only by the give-and-take of the political process, which he calls the “politics” or “neo-republican” approach.<sup>73</sup> Like the “cost-benefit” term, this label is also somewhat unfortunate, because a society’s political choice could be to ignore environmental arguments and opt for a strict cost-benefit analysis. The approach of President Ronald Reagan and his economic advisor David Stockman in the early 1980s came close to such a

---

69. See FARBER, *supra* note 1, at 41.

70. See *id.* at 194-95; see also BREYER, *supra* note 57, at 55-81 (proposing an administrative group to decide issues, in order to avoid the “vicious circle” of public misunderstanding, legislative posturing, and regulatory timidity).

71. See FARBER, *supra* note 1, at 90.

72. See *id.* at 52.

73. *Id.* at 43.

system.<sup>74</sup> Nonetheless, Farber appears to assume, because the government typically has chosen rules that weigh on the side of health and safety, that the opposition to economic analysis should be called “politics” or “neo-republicanism.”<sup>75</sup>

As a spokesman for this moral approach, Farber chooses environmental philosopher Mark Sagoff, who has written that “regulation expresses what we believe, what we are, what we stand for as a nation, not simply what we wish to buy as individuals.”<sup>76</sup> Sagoff starkly contrasts what people express in the market, which he calls “preferences,” with what they may express in the political process, which he calls “choices.”<sup>77</sup> It is as if there are two discrete sides of citizens’ brains at work: The “consumer” side creates preferences in the market, while the “voter” side creates choices for government, with the possibility of plain contradictions between the two sides.<sup>78</sup> The former is selfish and amoral, while the latter is idealistic and moral.<sup>79</sup> In terms of environmental law, people want government to enact rules over the production of goods and services that do not necessarily fit what goods and services they purchase in the market. A prime example is the protection of endangered species, many of which serve little or no use as a human preference in the market, but which the law, supported by opinion polls, protects as a collective value.<sup>80</sup>

Farber wisely pulls back from a total separation of desires in the market from desires for government.<sup>81</sup> There are many instances in which the citizen’s role as consumer and moral voter do interact. Many people seek to follow the “golden rule” of acting toward others as they would have others act toward them in their personal and

---

74. See Exec. Order No. 12,291, § 3(a), 3 C.F.R. 127 (1982) (requiring cost-benefit analysis); see also Thomas O. McGarity, *Regulatory Reform in the Reagan Era*, 45 MD. L. REV. 253, 255-66 (1986) (discussing the effect of these requirements).

75. FARBER, *supra* note 1, at 43.

76. MARK SAGOFF, *THE ECONOMY OF THE EARTH: PHILOSOPHY, LAW, AND THE ENVIRONMENT* 16-17 (1988). Cass Sunstein agrees that there is a distinction between what people prefer in their market transactions, in which they usually act selfishly, and what they want from government, in which they often act altruistically. See SUNSTEIN, *supra* note 54, at 141.

77. SAGOFF, *supra* note 76, at 7-8.

78. See *id.* at 8.

79. See *id.* at 1-8, 52-53.

80. See FARBER, *supra* note 1, at 54. As Farber relates, Sagoff has written that he (Sagoff) drove a car that had a bumper sticker favoring ecology, his idealistic political choice, while at the same time failing to fix the car’s oil-dripping problem, his selfish market preference. See *id.* at 56 n.36.

81. See *id.* at 55.

market interactions. And people make decisions about government by foreseeing how various options work in their own personal lives.<sup>82</sup>

Even more significantly, however, Farber fails to clarify that the cost-benefit analysis is not always equivalent to what consumers purchase. Contingent valuation studies, for example, attempt to assess not just what people purchase but how they value things that are not available in the market: assets such as others' lives, knowing that endangered species survive, and knowing that environmental assets will be passed on to progeny.<sup>83</sup> In this way, cost-benefit analysis could incorporate a large chunk of the collective values of a society.<sup>84</sup>

Farber also fails to explain the limitations of a monolithic characterization of the moral element in policy choices. In Farber's explanation, the moral element of government decisionmaking boils down to a variant of the aphorism, "Do as I say, not as I do."<sup>85</sup> True, citizens sometimes make choices in the marketplace that they wish government would prevent them from choosing.<sup>86</sup> But just as clearly, there are many pitfalls with crafting an approach to law based on the notion that people actually want a governmental outcome different from that which they choose in their personal lives.<sup>87</sup>

Moreover, the recognition of moral choices, unadorned, leaves unresolved some of the essential questions of how to approach environmental law disputes. The economists say that when the law leaves open the potential for law-making or creative interpretation by the court, a smart judge should analyze the question in terms of economic efficiency.<sup>88</sup> If one permissible outcome would be more efficient than another, the former should be chosen.<sup>89</sup> Thus, the

---

82. Hence the importance of the state of the economy in national politics.

83. See, e.g., Costanza et al., *supra* note 53, at 253.

84. See STONE, *supra* note 62, at 150-51 (noting that "[e]conomic analysis is certainly robust enough to accommodate non-market-measured values" and discussing various methods of contingent valuation studies).

85. See FARBER, *supra* note 1, at 51-58.

86. See *id.*

87. In the realm of food safety, for example, it would be unwise to view the widespread concern over mad cow disease in 1997 as being a call for the moral choice to outlaw beef; the continued preference for hamburgers undoubtedly affects what choice citizens would make about a proposal to ban hamburger. See generally David S. May, *Disease and Environmental Law*, 12 NAT. RESOURCES & ENV'T 133, 134 (1997). Neither should citizen polls always be trusted as a true reflection of the public's desires for government decisionmaking. For example, if a government had to choose between building a new road either to the state capitol or to a new amusement park, it would be unwise to look at travel market figures showing that the amusement park receives more visitors, rather than polls stating that more people would visit the capitol.

88. See BREYER, *supra* note 57, at 14 (citing with approval the economically oriented method applied in *Corrosion Proof Fittings v. EPA*, 947 F.2d 1201, 1215-16 (5th Cir. 1991)).

89. See *id.* at 14; FARBER, *supra* note 1, at 44-51.

economists provide, at least in part, a practical outline for courts to follow in resolving environmental disputes.<sup>90</sup>

With Farber's characterization of the moral choice camp, however, a court is left considerably more adrift. As sometimes formulated, the moral choice involved in an environmental law is implicit in the words of the statute. When the commands of the statute conclusively resolve a particular environmental dispute, the collective moral choice in the statute thus dictates the outcome. Yet in this "easy" case, there is no role for the court to apply any of its own thinking, either economically or morally.<sup>91</sup>

Is this the sum of Farber's vision of environmentalism—to follow the principles of the statutes and decline economists' invitations to read statutes their way? Is there not more to environmentalism? Dan Tarlock, for one, has criticized the environmental movement for adopting a vision that is as single-minded as the analyses of the economists.<sup>92</sup> Flipping the terminology, Tarlock argued that environmental goals, which he terms "efficiency," also need to take into account special and specific human needs, which he terms "equity."<sup>93</sup> Sometimes, these "equity" values, such as acknowledging the century-old water customs of a private citizens' group, which might not fit with modern environmental "efficiency," should sway the rule of law.<sup>94</sup> It is unclear whether Farber's view of environmentalism could address such "equity" concerns.<sup>95</sup>

---

90. See BREYER, *supra* note 57, at 14; FARBER, *supra* note 1, at 44-51.

91. See, e.g., *Chevron U.S.A. Inc. v. Natural Resources Defense Council, Inc.*, 467 U.S. 837, 842-43 (1984) (holding that when a statute clearly resolves the matter, there is no role for a court's intervention).

92. See A. Dan Tarlock, *Environmental Protection: The Potential Misfit Between Equity and Efficiency*, 63 U. COLO. L. REV. 871, 873-76 (1992); see also Richard J. Lazarus, *Fairness in Environmental Law*, 27 ENVTL. L. 705, 711 (1997) (arguing that environmental law should address questions of "fairness" in areas such as "environmental justice," private property rights, and environmental crimes).

93. See Tarlock, *supra* note 92, at 879-84 (criticizing mildly the environmental movement for its "too static and atomistic," and sometimes elitist, decisionmaking structures). Tarlock argues that "legitimate counter-values have been ignored and sometimes jeopardized in the effort to promote a healthy environment." *Id.* at 900.

94. See *id.* at 883. Tarlock proposes four grounds of equity that might override environmental efficiency: (1) property rights, especially group rights of under represented minorities; (2) the "sensitivity equity" of procedural rights; (3) sustainable development ideas that recognize the human need for development, as well as for sustainability; and (4) subsidies for deserving groups. See *id.* at 882-900.

95. In the "edge" case, where the words of the statute might cover the conduct at issue, but the conduct does not appear to be near the core purpose of the statute, an economist might argue forcefully that the efficiency should override the statutory words. See *id.* Alternatively, an advocate of moral choice might argue that the economic efficiency argument should be overridden by the collective moral choice of environmentalism inherent in the statute. See SAGOFF, *supra* note 76, at 16-17.



What about the “hard” case, in which the statute does not resolve the dispute one way or the other? When a statute is open to a fair interpretation by either side, a monolithic concept of moral choice does not appear to help resolve the dispute. Should a court then make its own moral judgments? Through his environmental baseline, Farber appears to be arguing for a judicial mindset that starts in the same moral direction as the general pro-environmental thrust of the statute.<sup>96</sup> However, what if the dispute at hand is an attempt to extend the statute’s reach beyond the realm of clear applicability? An environmentally oriented advocate might argue that the moral direction of the statute is the limitation of pollution and the protection of health and safety. Further, what about the potential response that another moral dimension of a statute is the decision to limit the reach of its applicability, in order to permit wealth-producing activities to continue? It seems untenable to support a rule that “the environmentalist side always wins,” because as noted above, nearly everyone accepts the principle that at some point, in some instances, the costs of abatement exceed the potential benefits of health and safety.<sup>97</sup> Indeed, pollution laws have always recognized an acceptance of certain amounts of pollution, such as permitted point source discharge into water and acceptable levels of air pollution.<sup>98</sup> It is no stretch to say that accepting these levels of pollution, and thereby rejecting the alternative of less pollution, is also a collective moral choice that the nation has made.

When presented with a difficult question of interpretation or application, what guidance does the moral values camp provide? As Farber recognizes, pollution law reflects a tension between the collective choice of environmental protection, which is grounded in the moral good of protecting health and safety, and the collective choice of fostering economic wealth creation, which is grounded in the moral good of providing desired goods and services.<sup>99</sup> Both are values that we cherish as a society. Because of this tension, courts

---

96. See FARBER, *supra* note 1, at 93-132.

97. See *supra* Part II.B.1.

98. For example, one step that law could take to advance environmental protection would be to define agricultural stormwater runoff as a point source discharge under the Clean Water Act; however, it is plain that agricultural stormwater runoff currently is not a point source. See 40 C.F.R. § 122.3(e); see also *Concerned Area Residents v. Southview Farms*, 34 F.3d 114, 120 (2d Cir. 1994) (limiting the definition of point source). The fact that we have made a collective choice to protect the environment through the Clean Water Act does not mean that a court or agency should rule in favor of the environmentalist plaintiff in a private action to regulate agricultural stormwater runoff under the Clean Water Act.

99. See FARBER, *supra* note 1, at 101.

cannot avoid making their own value judgments in hard cases, as in *Reserve Mining*.<sup>100</sup>

### III. AN ENVIRONMENTAL “BASELINE”

#### A. *Three Alternative Methods*

Farber offers an “environmental baseline” for deciding environmental cases.<sup>101</sup> His justification for this “baseline” is the heart of his book’s contribution to new thinking about environmental law.<sup>102</sup> He is not ultimately successful, however, in convincing the reader that his baseline truly differs in practice from three alternative approaches he contrasts.<sup>103</sup>

---

100. Farber does not delve as deeply as a pragmatist could in analyzing the complexity of environmental value judgments. He seems to imply that courts are faced with a straightforward, albeit often difficult, two-dimensional choice between the environment and efficiency. This is not always so. Both the benefits of environmental protection and the costs of compliance raise a more complex set of choices than he acknowledges.

Even if one accepts that law should recognize values outside of economic efficiency, one should still recognize that not all values are equal. Indeed, not all values may be desirable, in the view of judges deciding environmental cases. The public choice school, for one, argues that politics is often simply the clash of struggles between private interest groups and rarely a search for the “public good.” See JAMES M. BUCHANAN & GORDON TULLOCK, *THE CALCULUS OF CONSENT: LOGICAL FOUNDATIONS OF CONSTITUTIONAL DEMOCRACY* 283-95 (1962); Ackerman & Stewart, *supra* note 61, at 1334 (referring to the “powerful organized interests” that have a “vested stake” in maintaining the status quo of environmental laws).

A wise judge would do well to scrutinize the sources of putative environmental values that exists outside of economics. Such sources of values include: (1) human rights; (2) moral precepts, such as the idea of “environmental justice,” which focuses attention on the racial or hierarchical effects of pollution; (3) “deep environmentalism” and the rights of nature, which assigns legal rights, or at legal interests, to nonhuman elements; and (4) the prioritization of the preferences of one group over the preferences of another. This list is not exhaustive. Farber does not explore these important details. Moreover, he does not address deeply the point that some proponents of environmental values may not approve of all of these sources of values. See FARBER, *supra* note 1, at 105-09. Indeed, the idea that government may serve as a tool by which one group subsidizes its preferences at the expense of others is an old idea in political theory. See William M. Landes & Richard Posner, *The Independent Judiciary in an Interest Group Perspective*, 18 J. L. & ECON. 875, 876 (1975). As Farber does recognize, “the notion ‘Let’s spend their money to achieve our goals’ is an attractive proposition.” FARBER, *supra* note 1, at 64 (emphasis in original).

A full exploration of the sources of environmental values, the potential means of separating good values from bad, who is to make the distinction, and what should be done about them are topics beyond the scope of this footnote, and indeed of this review.

101. See FARBER, *supra* note 1, at 94-122.

102. See *id.* at 93-132.

103. See *id.* at 73-92. The term “method” is used here to distinguish these ideas from the “approaches” discussed in the previous section of this review. See *supra* Part II.B. The approaches are matters of legal and political philosophy, whereas the methods are techniques for actually deciding cases.

The first alternative method is “economic efficiency,” which employs a monetarily based cost-benefit analysis.<sup>104</sup> In addressing the *Reserve Mining* dilemma, such a method would assign a monetary benefit to saving the estimated number of lives that the pollution would take and calculate the monetary cost of imposing the regulation.<sup>105</sup> The primary cost would be the cost of creating a system to dispose of the tailings in a safe manner.<sup>106</sup> Law would choose the cheaper option. Farber faults this method for not addressing the difficulties of assessing both the potential costs and benefits, and the potential for missing aspects of nonmarket value.<sup>107</sup>

The second method is “risk feasibility,” which Farber sees reflected in much of current, neo-republican, environmental law.<sup>108</sup> This approach requires enjoining the pollution if it creates a significant risk, with little or no regard to the cost of the injunction.<sup>109</sup> Farber criticizes this method for both under-regulating risks that impose very high costs and, less often, over-regulating minor risks that have very little cost.<sup>110</sup> This over-simplicity, he writes, may be the result of a lack of public understanding of the uncertainties in environmental risk.<sup>111</sup> While most citizens plainly want regulation of pollution that causes death, Farber notes, they fail to understand that the effects of much pollution are uncertain; there is no simple answer to the question, “Will it give me cancer or not?”<sup>112</sup>

A third approach is a “combination” method, proposed by Cass Sunstein, which Farber discusses at length.<sup>113</sup> Using a two-step approach, government would first undertake a hard cost-benefit analysis, and then inject values not already considered, perhaps leading to a result different from that reached by a cost-benefit analysis alone.<sup>114</sup> Farber calls this approach a “soft” cost-benefit analysis.<sup>115</sup>

---

104. See FARBER, *supra* note 1, at 45-46.

105. See *id.* at 47-51.

106. See *id.* at 31.

107. See *id.* at 78-79.

108. *Id.* at 73-83.

109. See *id.* at 73-74.

110. See *id.* at 76-78. This simplicity also holds a significant benefit, which Farber does not discuss. It may create the easiest test for government to apply and may be more effective administratively than trying to create and apply the difficult analyses of contingent valuation studies and other factors in cost-benefit analysis.

111. See *id.* at 82-83.

112. See *id.* at 77-79. Stephen Breyer has blamed much of the supposed illogic of current risk regulation on the lack of public understanding. See BREYER, *supra* note 57, at 33-35.

113. See FARBER, *supra* note 1, at 94-114.

114. See *id.* at 94 (citing SUNSTEIN, *supra* note 54, at 139). Sunstein mentions this approach as one of a number of potentially promising approaches to mixing cost-benefit analysis,

As one might expect from such a straightforward combination of the economic and collective value camps, the two-step test resembles many of Farber's admonitions and recommendations throughout *Eco-Pragmatism*. Yet Farber takes pains to distinguish the neutrality of Sunstein's baseline approach with his own approach of an environmental baseline.<sup>116</sup> Environmental decisionmakers should approach environmental disputes not with a neutral attitude, but with the overarching principle and mindset in favor of environmental protection, Farber argues.<sup>117</sup> The heart of *Eco-Pragmatism* is the advocacy of this "baseline" approach.

*B. What Is an "Environmental Baseline"?*

The trouble with Farber's presentation is his failure to clarify the practical effects of his environmental baseline in resolving environmental disputes. To explain the idea, he employs the example of *Boomer v. Atlantic Cement Co.*, a famous 1970 New York state opinion that reached across environmental, tort, and property law.<sup>118</sup> In that case, a cement company caused a nuisance to nearby residents, whose houses were either damaged or shaken by on-going blasting.<sup>119</sup> Because of the importance of the company to the local economy, the New York court did not enjoin the blasting, but rather ordered the company to pay damages to injured residents and gave the company a servitude on the residents' land.<sup>120</sup> Farber criticizes the *Boomer* decision not for the judgment, but for the court's "stance of neutrality between the cement company and the neighbors" and the fact that "the equitable balance seemed to draw no distinction between the wrongdoer and its victims."<sup>121</sup> *Boomer* "invariably disturbs students" because of this neutrality, he writes.<sup>122</sup> Yet, Farber cautions that employing an environmental baseline "would not necessarily have

---

which provides rigor to risk assessment, with widely shared human values not encompassed by cost-benefit analysis. See SUNSTEIN, *supra* note 54, at 138-39. Sunstein concludes that policymakers should use cost-benefit analysis "as a tool to inform thoughtful decision making, not as some uniquely scientific method of analysis that dictates what must be done." *Id.* at 138. Meanwhile, "lay perspectives should be identified and explored to the extent feasible." *Id.* Farber's analysis agrees with Sunstein's in many respects.

115. See FARBER, *supra* note 1, at 94-98. Farber also refers to it as "a 'kinder and gentler' cost-benefit analysis." *Id.* at 94. This clichéd term should be laid to rest.

116. See *id.* at 113-14.

117. See *id.* at 97.

118. 257 N.E.2d 870 (N.Y. 1970).

119. See *id.* at 871.

120. See *id.* at 875.

121. FARBER, *supra* note 1, at 112.

122. *Id.*

changed the result.”<sup>123</sup> “The point of the baseline is not simply to control the results of cases, but also to leave us satisfied with the process of reaching the result.”<sup>124</sup>

However, Farber never defines thoroughly the effects of his environmental baseline. Nevertheless, at least three potential definitions can be gleaned. First, he writes as if following an environmental baseline simply means following the direct commands of statutory provisions. “If we believe at all in the idea of public values, adopted as the result of vigorous democratic deliberation, this [environmental baseline] is a public consensus policymakers must respect.”<sup>125</sup> He cites environmental laws that specifically command the regulator not to include cost as a factor in the decision whether to regulate.<sup>126</sup> If these commands are the definition, then the baseline is simply a positive enforcement of these statutory provisions. Encouraging courts to follow these statutory commands is less an argument of eco-pragmatism than an argument in favor of strict statutory construction and against judicial activism, from a pro-environmental stance.<sup>127</sup>

Second, Farber discusses the baseline as a procedural presumption in favor of the environmental side.<sup>128</sup> A practical application of an environmental baseline might be to shift the burden of proof to the polluter, or to create a rebuttable presumption that it has done what it is alleged to have done or that the alleged risk is real.<sup>129</sup> Under current law, the government or private plaintiff typically retains many of the procedural burdens of proving an environmental violation.<sup>130</sup> In *Boomer*, such a presumption would

---

123. *Id.* at 113.

124. *Id.*

125. *Id.* at 113-14. For an overarching statutory basis for his environmental baseline, Farber cites section 101 of the National Environmental Policy Act (NEPA), 42 U.S.C. § 4331 (1994), which sets forth a national goal of environmentalism. See FARBER, *supra* note 1, at 125-26.

126. See FARBER, *supra* note 1, at 103-04.

127. As noted in the previous section, choosing a baseline that is based on the general tenor of a statute might have the effect of resolving borderline, or “edge” cases. It is less likely, however, that such a baseline would affect the outcome of “hard” cases, where the conflicts between the rationale for the regulation, and the counterpoised rationale for not extending the regulation, stand in plain opposition.

128. See *id.* at 97.

129. See *id.* at 119-20.

130. See, e.g., *Getty Oil Co. v. Ruckelshaus*, 467 F.2d 349, 357 (3d Cir. 1972) (government has burden of showing Clean Air Act violation); *City of Richmond v. United States*, Nos. C-89-2935 DLJ, C-92-4176, 1995 WL 621793, at \*15 (N.D. Cal. Oct. 12, 1995) (plaintiff has burden of proving that defendant’s actions led to CERCLA cleanup costs); *Bettis v. Town of Ontario*, 800 F. Supp. 1113, 1119 (W.D.N.Y. 1992) (citing *Gwaltney of Smithfield v. Chesapeake*

have changed at least the procedural posture of the case; in other actions, it would change the outcome. With such a presumption, defendants seeking to avoid summary judgment would have to develop facts and evidence to try to show that their activities did not pollute, did not cause significant risk of harm, or are justified by the high costs of prevention.<sup>131</sup> Such a change might be welcome in many aspects of environmental law. However, Farber does not advocate a wholesale adoption of shifted presumptions, perhaps in part because such changes might violate due process requirements and settled principles of common law and procedure.

A third definition of the baseline is a more ambiguous idea that judges should approach environmental disputes with an environmental mindset.<sup>132</sup> This definition uses environmental laws not as commands to take certain steps, but as proof of a congressional mindset that should be passed on to judges and regulators.<sup>133</sup> “The commitments now embedded in federal law generally take an environmentalist baseline, with a presumption in favor of environmental protection.”<sup>134</sup> The mindset could serve as a public statement that environmental concerns stand foremost in the minds of judges and regulators.

It remains unclear what practical application such a mindset would hold for a case, such as *Boomer*, if not to change the result. Is Farber suggesting that the court announce at the beginning of its opinion, “We are morally offended that a company would do what this company has done, and throughout this litigation we will need to be convinced why they should not be enjoined. Now on to the law . . .”? While such a statement might assuage some students reading the opinion, it would be unlikely to affect public perception of the equitable stance of the law, which presumably is based more on outcomes than written analysis. Moreover, to the extent that Farber is arguing that judges should hold a mindset in favor of environmental values, such a goal would seem infinitely more difficult to effect than even the smallest change in substantive law.<sup>135</sup> Even environmentally hostile judges can be made to enforce environmental rulings by the force of statute, process, and precedent. It seems odd to argue that

---

Bay Found., 484 U.S. 49, 65-66 (1987) (private plaintiff has burden of proving a continuing violation of Clean Air Act at trial)).

131. Cf. *Getty Oil*, 467 F.2d at 357; *City of Richmond*, 1995 WL 621793, at \*15; *Bettis*, 800 F. Supp. at 1119; *Gwaltney*, 484 U.S. at 65-66.

132. See FARBER, *supra* note 1, at 127-31.

133. See *id.* at 97.

134. *Id.*

135. See *id.* at 127-31.

what is needed is to tell them to approach their cases with a new mindset, even though the rules, procedures, and outcomes need not change. A mindset, after all, is usually something that a judge brings to the law, and not something that legal commentary can do much to change.

### C. *Justifying an Environmental Baseline*

Regardless of the application of his environmental baseline, Farber justifies it by relying on this nation's "basic commitments . . . to environmental quality."<sup>136</sup> Although he does not list them as such, Farber's justifications for his baseline arise from three concepts: (1) the general thrust of the statutes, (2) the consensus of the community, and (3) the morality of individual human integrity.

#### 1. The General Thrust of the Statutes

Farber argues that because federal environmental statutes show a commitment to environmental protection, courts and regulators must show a similar commitment.<sup>137</sup> There is no doubt that an aspiration toward environmental quality, or at least environmental improvement, lies at the heart of laws such as the Clean Air Act,<sup>138</sup> Clean Water Act,<sup>139</sup> National Environmental Policy Act,<sup>140</sup> and a host of other statutes and doctrines, both at the state and federal level, over the past thirty years.<sup>141</sup>

Yet, as Farber fails to explicitly recognize, these laws plainly reflect compromises between the environment and other concerns. The commitment to environmental quality does not exist in a vacuum.

---

136. *Id.* at 94.

137. *See id.* at 125-27. The most fundamental source of this commitment is NEPA section 101, 42 U.S.C. § 4331. *See* FARBER, *supra* note 1, at 125-26.

138. 42 U.S.C. §§ 7401-7671q (1994 & Supp. III 1997).

139. Federal Water Pollution Control (Clean Water) Act, 33 U.S.C. §§ 1251-1387 (1994 & Supp. III 1997).

140. National Environmental Policy Act of 1969 (NEPA), 42 U.S.C. §§ 4321-4370e (1994 & Supp. III 1997).

141. *See* Clean Air Act § 101, 42 U.S.C. § 7401 (1994) (statutory objective is to "protect and enhance the quality of the Nation's air resources so as to promote the public health and welfare and the productive capacity of its population"); Clean Water Act § 101, 33 U.S.C. § 1251 (1994) (statutory objective is to "restore and maintain the chemical, physical, and biological integrity of the Nation's waters"); NEPA § 101(a), 42 U.S.C. § 4331(a) (1994) (statutory objective is to "use all practicable means and measures . . . in a manner calculated to foster and promote the general welfare, to create and maintain conditions under which man and nature can exist in productive harmony, and fulfill the social, economic, and other requirements of present, and future generations"); Endangered Species Act of 1973 § 2(a)(4), 16 U.S.C. § 1531(a)(4) (1994) (statutory objective to "conserve to the extent practicable the various species of fish or wildlife and plants facing extinction").

There are other potential commitments that could form arguments for competing baselines. Indeed, an advocate might argue that this nation has expressed a commitment to private property rights that holds a far older provenance than the environmental commitment. The Constitution's proscription against government "taking" of private property without just compensation arguably is a plain explication of the history and strength of this commitment.<sup>142</sup> In addition, the procedural burdens of most environmental laws suggest that private property rights are still respected by the courts.<sup>143</sup> Would Farber argue that the greater specificity of the aspirations of environmental laws trumps the old baseline in favor of property rights?

Finally, creating a baseline from the general thrust of statutes might create troubling precedent. Many laws state aspirations that do not require any sort of change in procedure or mindset. Criminal laws against illegal drug use, for example, quite plainly express a national commitment to eradicating illegal drug use. Does such a commitment justify an expectation that judges approach a drug case with a mindset in favor of enforcement? How would such a baseline work in light of settled principles regarding the rights, both substantive and procedural, of criminal defendants? In a civil law context, do the aspirations of the equal employment opportunity laws require judges to form a baseline in favor of finding discrimination? All laws reflect compromises, and these compromises become especially apparent when there are difficult questions of law and fact. Did the drug defendant's agreement to carry a bag to the waiting car constitute proof of his knowledge that the bag held drugs? Does the fact that the employer's hiring rate for Latino applicants was only three-fifths of that for whites constitute actionable discrimination? Such questions implicate tension between a commitment to stop legal wrongs and a desire not to judge too quickly or harshly, lest we judge unfairly and hamper freedom. The existence of aspirations does not mean that we must have a baseline favoring these aspirations.

## 2. The Consensus of the Community

Environmental laws reflect a "sense of ourselves as a community,"<sup>144</sup> and environmentalism is now "deeply embedded in our culture," Farber writes.<sup>145</sup> Again, he over-stretches. Many

---

142. U.S. CONST. amend. V.

143. See FARBER, *supra* note 1, at 133-57.

144. *Id.* at 98.

145. *Id.* at 109. Could this statement have been made in 1995, when leaders of the 104th Congress promised to free business from the yoke of environmentalism? True, these leaders



Americans like to label themselves environmentalists, but the depth of their commitment remains unclear. Farber states that Americans have made a commitment to clean air and water, but the compromises in our statutes show that the only consensus is that we want cleaner air and water than what we had before.<sup>146</sup> The battles over river pollutants in Virginia,<sup>147</sup> mad cow disease,<sup>148</sup> logging in the Northwest,<sup>149</sup> and results such as *Boomer* show a reluctance to take environmentalism as far as many would like to take it. Any environmentalist lawyer can think of numerous ways he or she thinks our commitment to environmentalism should be strengthened. For example, greater regulation of non point-source pollution under the Clean Water Act,<sup>150</sup> more efficient requirements for air pollution reduction in nonattainment areas under the Clean Act Air,<sup>151</sup> or tougher restrictions on wasteful use of public range land.<sup>152</sup> But such requirements are not enacted because of substantial opposition in the public and in the polity.

The idea of environmentalism may be deeply imbedded in the minds of the community, but it must share the bed with ideas of personal freedom and free enterprise. While the consumer market does not necessarily reflect what people want from government, evidence such as Americans' love of gas-guzzling sport utility vehicles and shunning of public transportation indicates that values other than environmentalism run wide and deep.<sup>153</sup> It remains to be

---

discovered in 1996 that Americans were highly skeptical of wholesale abolition of social welfare and regulation laws, but the flitting of public opinion makes broad assessments a precarious occupation.

146. Farber cites laws such as NEPA § 101, 42 U.S.C. § 4331. See FARBER, *supra* note 1, at 125-26.

147. See David Lauter, *Farm Runoff Suspected in Fish Disease*, PORTLAND OREGONIAN, Sept. 21, 1997, at A18.

148. See generally David S. May, *Disease and Environmental Law*, 12 NAT. RESOURCES & ENV'T 133, 134 (1997).

149. See Patti A. Goldman & Kristen L. Boyles, *Forsaking the Rule of Law: The 1995 Logging Without Laws Rider and Its Legacy*, 27 ENVTL. L. 1035, 1040 (1997).

150. See 40 C.F.R. § 122.3(e) (1999) (listing agricultural stormwater runoff as a nonpoint-source discharge not requiring a National Pollutant Discharge Elimination System (NPDES) permit); *Concerned Area Residents for the Env't v. Southview Farms*, 34 F.3d 114, 120 (2d Cir. 1994) (limiting the definition).

151. See Thomas O. McGarity, *Missing Milestones: A Critical Look at the Clean Air Act's VOC Emissions Reduction Program in Nonattainment Areas*, 18 VA. ENVTL. L.J. 41, 44 (1999) (arguing that EPA has missed important deadlines for requiring state implementation plans to reduce volatile organic compounds in certain nonattainment areas).

152. See GEORGE C. COGGINS ET AL., FEDERAL PUBLIC LAND AND RESOURCES LAW 688-99 (1993) (discussing the attitudes and politics surrounding range grazing).

153. See Blair Golson, *SUVs Taking Toll on Pollution, Fuel Costs, Research Group Says*, L.A. TIMES, June 17, 1999, at A4; Eric C. Evarts, *In Luv with SUVs*, CHRISTIAN SCI. MONITOR, June 8, 1998, at B4; Richard O. Zerbe, Jr. & Linda S. Graham, *The Role of Rights in Benefit Cost*

proven whether personal sacrifice—the true test of any commitment—exists in America’s professed embrace of environmentalism.<sup>154</sup> Particularly telling was the approach of the United States at the 1997 global warming conference in Kyoto, Japan. The United States, led by professed environmentalist Al Gore, stood as a force of moderation, because of a perception that the American public would not stand for changes that would impose significant financial or lifestyle burdens.<sup>155</sup> Consumerism and personal comfort must be placed near the top of any list of deeply embedded American ideals.

To the extent that environmental values are deeply embedded, such values could presumably be uncovered through contingent valuation studies, which economists tout as a workable part of their cost-benefit analyses.<sup>156</sup> If environmental protection rated highly with Americans, they would presumably be willing to pay top dollar to preserve it. Although Farber does not relate contingent valuation with his environmental baseline, it seems that a contingent value analysis is a quintessential form of the supposedly neutral method that Farber’s baseline rejects.

### 3. The Morality of Individual Human Integrity

The most provocative justification for Farber’s baseline is the notion that it may be immoral to approach environmental law from a stance of neutrality when questions of human integrity are at issue.<sup>157</sup> While economist Ronald Coase argued that it matters little for the purposes of efficiency which party is assigned an entitlement by law,<sup>158</sup> Farber scolds economists who approach issues of resource allocation without any regard for the issues of individual human integrity.<sup>159</sup> Large institutions often dehumanize individuals, he notes;

---

*Methodology: The Example of Salmon and Hydroelectric Dams*, 74 WASH. L. REV. 763, 768 (1999).

154. See JOHN MCPHEE, ENCOUNTERS WITH THE ARCHDRUID 41-42 (1971) (discussing the link between environmental protection and personal sacrifice).

155. See *Emissions Plan Assailed*, CHI. TRIB., Oct. 24, 1997, at 8 (discussing friction between United States and European positions); see also James Warrick, *White House Predicts Low Cost for Pact on Warming*, WASH. POST, Mar. 4, 1998, at A1 (noting debate over cost to public); *Warming Pact to Cost You \$70-\$110 a Year*, CLEV. PLAIN DEALER, Mar. 4, 1998, at 9A. See generally Jay Michaelson, *Geoengineering: A Climate Change Manhattan Project*, 17 STAN. ENVTL. L.J. 73 (1998).

156. See FARBER, *supra* note 1, at 49-50.

157. See *id.* at 200. Farber does not make this justification explicit until the conclusion of *Eco-Pragmatism*. See *id.* at 199-206.

158. See *id.* at 101.

159. See *id.* at 102-03.

morality should compel law to begin with the individual human.<sup>160</sup> Farber hints that the public will distrust the legal and regulatory process if it does not express some sort of special recognition for individual human integrity.<sup>161</sup> Substantive rights are one way of vindicating individual human integrity; an environmental baseline may be another.

Placing the value of individual human compassion over the general economic welfare is a powerful argument. It fits with a school of legal philosophy that argues that certain individual desires deserve more recognition than just one voice in the cacophony of a nation's economy.<sup>162</sup> Yet there are mixed implications for some aspects of environmental law. True, in many pollution disputes, the health and safety of discrete (if often unknown) individual humans are pitted against general economic welfare. When deciding between an individual's health and a slight increase in prices to consumers, it may be advisable to argue for a baseline, or a thumb on the scales, for the individual's interest. But not all pollution cases are oriented this way. Suppose that the facts in *Reserve Mining* had not been a fear of human death, but only of minor health risks or potential ecological damage to the lake (indeed, the case began this way). Suppose further that the facts were plain that an injunction would not have resulted in the company's spending millions on retooling, but in the closure of the mining operation altogether as too expensive, with hundreds of working-class jobs being lost. On which side would the premise of individual human integrity then reside?<sup>163</sup>

---

160. *See id.* at 117 (using hospitals as an example).

161. *See id.* at 113.

162. *See generally* JOHN HART ELY, *DEMOCRACY AND DISTRUST: A THEORY OF JUDICIAL REVIEW* (1980) (advocating diversion from neutrality for groups underrepresented in the political process); RONALD DWORKIN, *TAKING RIGHTS SERIOUSLY* (1977) (discussing the nature of individual rights).

163. In some natural resource disputes, as opposed to pollution cases, we may find that the individual human integrity argument rests just as easily on the side of the regulated party. In instances of regulation of private land to further the general public welfare, the moral high ground of individual human integrity is sometimes asserted by the property owner. *See, e.g.*, *Suitum v. Tahoe Reg'l Planning Agency*, 520 U.S. 725, 731 (1997) (noting that 82-year-old wheelchair-bound widow was prohibited from building a home on her property because of a regulation designed to protect runoff from contaminating nearby Lake Tahoe); *United States v. Fuller*, 409 U.S. 488, 493-94 (1973) (denying claim of private property right to land under the Taylor Grazing Act); *United States v. Coleman*, 390 U.S. 599, 602-05 (1968) (holding that quartzite stone was not a valuable mineral deposit for purposes of vesting title to public lands in individual prospector). It is also that, in most of these instances, the private party is demanding rights to property or money, as opposed to preservation of health or safety, which is typically at stake in pollution law. *See, e.g.*, *Coleman*, 390 U.S. at 600 (seeking patent on public lands).

## 4. Distrust of the “Bean Counters”

Finally, Farber worries about a legal method in which economic calculators, in particular the “bean counters” at the Federal Office of Management and Budget (OMB), are entrusted with decisionmaking.<sup>164</sup> Because of the important policy judgments that have to be made in even the strictest cost-benefit analysis—determining the contingent value of human life, assessing the risk probabilities, and choosing a discount rate—these accountants would end up making environmental policy, not just calculating monetary cost and benefit.<sup>165</sup> “[U]sing cost-benefit analysis to control decisions (rather than as a source of information) can warp the administrative process,” Farber argues, because accountants do not understand the complexity of the substantive field as well as the professionals in that field, such as EPA employees.<sup>166</sup> He also worries that the OMB is more likely to succumb to “crude political pressure” from the White House than is the EPA.<sup>167</sup>

Indeed, Farber might have gone further to argue that the law also should cast a skeptical eye toward one of the fundamental bases of any cost-benefit calculation: the threshold cost of complying with the environmental regulation. Throughout his discussion of *Reserve Mining*, Farber appears to take for granted the company’s assessment that \$200 million would be needed to ensure safety.<sup>168</sup> In such cases, the company’s assessment would have to be re-assessed by outside observers, as would a citizen group’s assessment of the risk, because the producer has every incentive to overestimate the costs of compliance. Moreover, in many instances of regulation of a single economic producer, such as Reserve Mining, costs of compliance would never be incurred, because the regulation will make this producer instantly noncompetitive with other unregulated competitors.<sup>169</sup> Production would shift to competitors whose product does not generate the same environmental problem. Such a solution

---

164. See FARBER, *supra* note 1, at 119-20.

165. See *id.*

166. *Id.* at 120.

167. *Id.* This is true to an extent, unless the White House succeeds in placing loyal followers who will follow the administration’s path at the controls of EPA.

168. See *id.* at 15-34.

169. In neoclassical economics, most producers are assumed to be “price-takers,” meaning that the price of the good or service is set by the market and cannot be raised by this single producer alone, lest it lose all its buyers. See MICHIO MORISHIMA, *THE ECONOMICS OF INDUSTRIAL SECRECY* 68-85 (1984). Because of competition, profits are assumed to be thin. If one producer is saddled with a special, extraordinary cost, such as a multi-million dollar retooling requirement, the producer may decide to cease operations, because there is no way to swallow the cost and remain profitable in the face of competition. See *id.*

would be both environmentally beneficial and economically efficient. Indeed, the total economic effect of the regulation might turn out to be quite minimal if production shifted quickly and efficiently; only the closed plant's employees would suffer (and they might move to more efficient plants elsewhere). In sum, the assumption that a producer will take costly steps in response to a regulation may overestimate tremendously its true costs of the regulation. The response of the producer, and of local government, cannot be known *ex ante* with any certainty by the cost-benefit accountants.<sup>170</sup>

*D. Distinguishing Between a Baseline and a Mixed Method*

Farber takes pains to distinguish his environmental baseline approach from the mixed method advocated by Sunstein.<sup>171</sup> A mixed method would first consider cost-benefit analysis and then inject "values,"<sup>172</sup> from a neutral baseline.<sup>173</sup> Farber, by contrast, would have the courts follow a rule that states: "To the extent feasible without incurring costs grossly disproportionate to any benefit, government should eliminate significant environmental risks."<sup>174</sup> Farber concludes that this rule would both reflect an environmental baseline and permit the consideration of economic efficiency.<sup>175</sup>

In application, however, there might be little real difference between a mixed, neutrality approach and Farber's environmental baseline approach in many cases. While Farber expresses more skepticism with the idea of cost-benefit analysis than does Sunstein and methodically oriented commentators such as Breyer, most of Farber's arguments can just as easily fit into the values step of the mixed approach. Many of his justifications are indistinguishable from the sorts of values that could be recognized in a mixed, two-step, neutrality approach.

Farber's argument for an environmental baseline makes the most sense for cases that involve a fundamental question of whether to apply an environmental law or not apply it at all. Thus, his argument holds together in discussing *Reserve Mining* or the famous "snail

---

170. Indeed, local government might be induced to take some steps to retain the producer, by means such as a tax break, and regulators might be encouraged to grant special dispensations at the last minute, as the Eighth Circuit did in *Reserve Mining* by ordering a phased injunction. See *Reserve Mining Co v. EPA*, 514 F.2d 492 (8th Cir. 1975).

171. See FARBER, *supra* note 1, at 113-14.

172. Alternatively, one could do them in the reverse order, without doing too much damage to the idea of mixing.

173. See FARBER, *supra* note 1, at 113-14.

174. *Id.* at 131.

175. See *id.* at 131-32.

serter” case under the Endangered Species Act,<sup>176</sup> *Tennessee Valley Authority v. Hill*.<sup>177</sup> It makes less sense in the more numerous cases in which the legal question is not whether to give credence to a fundamental principle of environmentalism, but rather to fill in the details of environmental laws. For the latter category, which includes questions such as how to define “source” under the Clean Air Act<sup>178</sup> or whether the government may delay its listing of a species under the Endangered Species Act,<sup>179</sup> Farber’s arguments for applying an environmental baseline seem misplaced. The supposed “profound national commitment” to environmentalism does not really help to resolve the myriad day-to-day questions of applying environmental statutes. This is not to say that courts should disregard the noneconomic “values” of environmental protection in making their choices, even in more mundane cases. Indeed, when one delves deeply into the content and complexity of “values” implicating both the costs<sup>180</sup> and benefits<sup>181</sup> of environmental decisions—something Farber does not do—one realizes that the assessment of such values are likely to be, in practice, more significant than the choice of a baseline.

---

176. Endangered Species Act of 1973, 16 U.S.C. §§ 1531-1544 (1994).

177. 437 U.S. 153 (1978) (discussed in FARBER, *supra* note 1, at 127-30).

178. See *Chevron U.S.A., Inc. v. Natural Resources Defense Council, Inc.*, 467 U.S. 837 (1985) (addressing Clean Air Act § 111, 42 U.S.C. § 7411).

179. See *Environmental Defense Ctr. v. Babbitt*, 73 F.3d 867 (9th Cir. 1995) (construing Endangered Species Act § 4, 16 U.S.C. § 1533).

180. Throughout his work, Farber follows the economically oriented assumption that environmental costs have one dimension: monetary value. If one accepts the concept of noneconomic value, however, costs may have more than one dimension. The fact that a particular environmental step costs  $x$  dollars does not necessarily mean that it is always preferable, as a matter of policy, to a step with identical benefits that costs more in terms of money. For example, if a court were to conclude that the costs of compliance would eventually be felt in the wallets of the officers or shareholders of a company that has violated the law, as opposed to the consumers of its product, this fact might well lead to an adjustment in an assessment of the “cost” of compliance. Such an adjustment might follow from a conclusion as to the “fairness” of imposing the cost, which is a “value” outside of the realm of economics.

181. Farber also fails to recognize that environmental benefits, like costs, can have more than one dimension. For example, throughout his work, Farber refers to the benefits of pollution reduction as saving lives. Putting aside the fact that not all benefits are lifesaving, there may be instances in which saving certain lives provides more “benefit” than saving others. Consider, for example, a choice between an environmental protection step that would save an estimated 20 lives by reducing a cancer that typically kills its victim around age 65, and another step that would save 18 lives by hindering a disease that typically kills around age 10. Would all of us agree that the first step would be preferable, based on our personal assessment of noneconomic “values”? To give another example, would we all agree that the value of 10 lives of factory workers who understand at least some of the risks and receive a high salary for their work is equal to those of 10 middle-class residents who are killed by drinking polluted water?

As with any legal regime, the devil is in the details of environmental rules. Assessing the variables and deciding how to weigh them often count for more than the approaches, frameworks, and baselines of decisionmaking. If courts decide, as they apparently did in *Reserve Mining*, that removing even a remote risk of death is more important than a large cost to the producer, then the value component of the analysis outshines other components so much that the baseline or the order of steps becomes insignificant. Alternatively, if a court concludes that a pollutant poses no significant risk of harm, the outcome would appear to be preordained, regardless of steps or baseline. Likewise, if a court decided that a particular regulation would unfairly close a plant and diminish the lives of a majority of the community, the threshold would be automatically placed very high for the showing of risk or other environmental values, baseline and steps notwithstanding.

In the end, there may even be little practical difference between Farber's environmental baseline and one that is constructed from a property-rights baseline. Consider a test that encourages judges to start with a mindset in favor of protecting property rights and restrictions on tort actions, but that also recognizes the premise of environmental protection. Such a test might be worded thusly: "To the extent that they do not create excessive environmental risks, enforce traditional private property rights in order to foster economic growth." If judges applied this property-rights baseline approach, we might be left with the same array of results, in many cases, that we would if the same judges employed Farber's environmental baseline. What Farber shares with other pragmatists is a recommendation to consider both cost-benefit analysis and the entire range of noneconomic values, with particular regard for the commands and purposes of environmental protection statutes. Farber is correct that such a pragmatic approach would be the best way to keep the dual American promises of economic growth and effective environmental protection.

#### IV. THE QUAGMIRES OF DISCOUNTING AND UNCERTAINTY

In comparison to the philosophy of values and the theories of baselines, the issues of generational discounting and scientific uncertainty may seem less contentious, if no less important to environmental decisionmaking. *Eco-Pragmatism* provides a useful summary of these two essential elements of complex environmental questions.

A. *Discounting Future Needs and Costs*

Spending a thousand dollars now seems more costly than spending a thousand dollars ten years from now, because in the interim one will be without the ability to use that money.<sup>182</sup> Similarly, the prospect of getting a benefit ten years from now is not as appealing as the prospect of getting it today. As Farber explains, these economic truths, which necessitate discounting future costs and benefits to present value, must be considered in environmental decisionmaking as well as finance.<sup>183</sup> The choice of a discount rate has a tremendous effect on the conclusion that one makes about future costs and benefits of environmental action.<sup>184</sup>

Much of Farber's analysis is noncontroversial and straightforward, and makes useful reading for environmentally oriented readers who have not done much thinking about discount rates and the power of discounting to transform dollar figures. In considering long-term environmental risks, such as the greenhouse effect and radioactive waste, choices made today may produce effects across generations.<sup>185</sup> On the other hand, some choices that seem important now may turn out to have been fairly irrelevant because of changes that we cannot foresee. Farber is so keen in delving into the discounting topic, however, that he strays a little too far from his environmental law focus.

Discounting is effective for both costs and benefits of environmental regulation, Farber notes.<sup>186</sup> First, by spending money now in order to prevent environmental harm in the future, society loses the opportunity to use this money for other purposes in the coming years.<sup>187</sup> We pay both for the social cost of not having the money now and the opportunity cost of missing out on other ways to spend the money in the interim.<sup>188</sup> Farber concludes, and rightly so, that "[a]ccounting for the opportunity cost of investments seems sensible and morally unobjectionable."<sup>189</sup> In some instances, cost discounting may argue in favor of a policy decision to impose

---

182. See DANIEL Q. POSIN, *FEDERAL INCOME TAXATION OF INDIVIDUALS* 7 (4th ed. 1998).

183. See FARBER, *supra* note 1, at 133-57.

184. See *id.* at 134.

185. See *id.* at 136; see also Bill McKibben, *A Special Moment in History*, *ATLANTIC MONTHLY*, May 1, 1998, at 55 (arguing that environmental choices made in the next few decades will determine the fate of the planet).

186. See FARBER, *supra* note 1, at 134-38.

187. See *id.*

188. See *id.* at 144-46.

189. *Id.* at 148.



regulatory costs in the future, instead of today.<sup>190</sup> Discounting does not mean that regulators should always delay imposing the costs of environmental protection until the last possible moment.<sup>191</sup> For risks such as global warming it may cost less, even with opportunity costs, to take action now, before the problems grow and costs escalate.<sup>192</sup>

More controversial is the notion that we should discount benefits provided to future generations.<sup>193</sup> This idea has quite stunning consequences when applied to human lives. In sum, the idea is that because the promise of receiving a future asset is not as valuable as having the asset today, society should discount the value of saving future lives.<sup>194</sup> Farber seems troubled by some aspects of this notion, but accepts the principle.<sup>195</sup> When people are surveyed as to how they judge the value of future lives, some studies show fairly high estimates, more than eight percent per year, for discounting in the next twenty years, while discounting for the distant future is just above zero.<sup>196</sup> In some instances, surveys reported no discount at all.<sup>197</sup> Farber finds the state of affairs confusing, as well he should.<sup>198</sup> There appear to be at least two arguments for discounting future lives, one that makes sense and another that is morally questionable.

The first argument is that we are fundamentally uncertain whether our actions today truly will result in the beneficial effect that we desire.<sup>199</sup> It may turn out that the future did not need our efforts at all, because their society has solved the problem or avoided it altogether.<sup>200</sup> Farber tries to prove the necessity of discounting by pointing out that if we did not discount, we would have to be willing to spend vast amounts of money to eliminate one environmentally caused death a year for the next zillion millennia.<sup>201</sup> Perhaps people balk at such a payment not so much because they do not care about people in the future, but more so because they have no confidence in

---

190. An environmentalist's objection to such cost discounting would probably have to take the form of an objection to the whole idea of cost-benefit analysis, rather than to the discounting aspect of cost-benefit analysis per se.

191. See FARBER, *supra* note 1, at 134-38.

192. See PAUL R. EHRLICH & ANNE H. EHRLICH, *HEALING THE PLANET: STRATEGIES FOR RESOLVING THE ENVIRONMENTAL CRISIS* 80-84 (1991) (discussing the potential consequences of global warming).

193. See FARBER, *supra* note 1, at 149-57.

194. See *id.* at 152-57.

195. See *id.*

196. See *id.* at 141.

197. See *id.* at 139-44.

198. See *id.* at 152-57.

199. See *id.* at 138-40.

200. See *id.* at 152-53 (referring to the possibility that future generations will be smarter).

201. See *id.* at 149-52.

any sort of assertion that actions now will actually save lives in the year 2500. Uncertainty over the distant effects of current efforts makes us hesitant to spend now.

The second and more controversial argument is that distant generations simply mean less to us than our current generation or nearer ones.<sup>202</sup> Some have even questioned whether nonexistent generations should have any legal interests at all.<sup>203</sup> There is a fundamental flaw, however, in comparing the discounting of monetary assets to the discounting of future lives. We discount a promise to receive money in the future because to do so is financially sensible, from a personal perspective.<sup>204</sup> On the other hand, we seek to protect future lives not because it is a sensible investment decision—in saving random lives, we typically receive no “return” whatsoever on our “investment”—but because it is the moral thing to do.<sup>205</sup> Farber’s analysis would have been strengthened had he returned to Mark Sagoff’s explanation that moral values are often wholly distinct from market preferences.<sup>206</sup> This justification by morality does not mean that we must spend any amount of money to save future lives, just as we do not spend this amount to save a life today. Rather, this explanation questions the approach that future lives mean less to us than current ones simply because they are in the future.<sup>207</sup>

Farber offers some sound policy ideas, nonetheless, for dealing with the problem of discounting and future generations.<sup>208</sup> Fulfilling a need for future benefits might best be accomplished through a program of long-term payments to a trust fund, instead of a single large expenditure now, in order to avoid the full effect of lost opportunity costs, or a large payment just before we need the

---

202. *See id.* at 150-52.

203. *See id.* at 152-53.

204. *See id.* at 139-40.

205. *See id.* at 150-53. It appears perfectly reasonable to value one random life one hundred years from now as much as one random life today. Considering the small odds that the single life today would be a loved one or a friend and the slightly higher, but still small, odds that the future life would be a descendant, there is little “benefit” from saving either life, other than the general moral interest in saving lives.

206. *See id.* at 53-58. To choose an extreme example, it would seem immoral for our current society to leave a large radioactive dump that we expect to leak severely in 500 years, with the likely destruction of millions of lives.

207. *See id.* at 157. Farber trips up somewhat in analogizing an environmental duty to future generations to the weak duty of parents to leave money to their children in their wills. *See id.* at 153-54. The analogy is inapt. Because each generation is presumably free to create its own wealth, a failure to leave a big legacy is not widely considered to be immoral. On the other hand, leaving future generations with a ruined environment is far more immoral. Each generation is not expected to build its own environment.

208. *See id.* at 158-59.

money.<sup>209</sup> Because many environmental problems require long-term attention, commitments cannot be delayed indefinitely in the hopes of avoiding opportunity costs altogether.<sup>210</sup> But whereas Farber sees both financial and political benefits to a “stewardship” idea for the succeeding generation,<sup>211</sup> he rejects the notion that “the current generation truly is a trustee for the overall welfare of future generations.”<sup>212</sup> Acting for the benefit of distant generations runs law into the great wall of uncertainty.

*B. The Dilemma of Uncertainty*

Ignorance of the true effects of our actions is an “overriding problem” of environmental policy, Farber writes.<sup>213</sup> In light of the probabilities, timing, and extent of risks created by certain types of pollution, “our ignorance,” he concludes, is “humbling.”<sup>214</sup> To the extent that we seek the firm figures needed to make even the crudest of cost-benefit analyses, we often will be disappointed by the lack of certainty that science can provide.<sup>215</sup> Farber cites examples in which estimates of risk levels varied by factors of more than a thousand.<sup>216</sup> Inability to construct decent cost-benefit analyses, he notes, is a strong argument in favor of adopting the less scientific approach of risk feasibility.<sup>217</sup> Even opponents of cost-benefit analysis should fret over uncertainty, however, because nearly every aspect of environmental regulation is predicated on some sort of scientific estimation of risk.<sup>218</sup> In the *Reserve Mining* case, as noted above, scientists could not be certain whether the tailings caused any risk of

---

209. See *id.* at 157-59; see also STONE, *supra* note 62, at 208 (arguing for a global trust fund for international environmental problems).

210. See FARBER, *supra* note 1, at 159.

211. *Id.* at 160. Compare the Great Law of The Iroquois Confederacy, which stated every deliberation must consider the impact of decisions on the next seven generations. See Lois J. Schiffer & Timothy J. Dowling, *Reflections on the Role of the Courts in Environmental Law*, 27 ENVTL. L. 327, 342 (1997).

212. FARBER, *supra* note 1, at 161.

213. *Id.* at 163.

214. *Id.* at 165.

215. See *id.* at 167.

216. See *id.* Farber cites competing estimates of the costs and benefits of current environmental regulations. Needless to say, the estimates vary, with some estimates finding that current costs far exceed the benefits and others finding the opposite. See *id.*

217. See *id.* at 168.

218. Proclamations of the depth of uncertainty have lead one noted biologist and thinker to argue that, in spite of lack of knowledge in many areas, “we will discover what we need to know” in order to develop a unity of knowledge. Edward O. Wilson, *Back From Chaos*, ATLANTIC MONTHLY, Mar. 1, 1998, at 41.

serious harm and could not agree on many of the simplest variables in making the risk assessment.<sup>219</sup>

One of the truths of uncertainty that the law must face, Farber writes, is “the moving knowledge frontier.”<sup>220</sup> Even reasonable risk assessments today may quickly be shown to be incorrect tomorrow.<sup>221</sup> In this analysis, *Eco-Pragmatism* may prove disturbing to environmentalists. Farber cites two striking and noteworthy examples.<sup>222</sup> In 1977, only two years after the appellate ruling in *Reserve Mining*, and before the land-dumping conversion was completed, a water filtration system was developed that removed 99.9% of the asbestos from Duluth’s water.<sup>223</sup> With such a system, no possible risk assessment could have found that a significant risk existed, Farber argues.<sup>224</sup> Moreover, he reports that some scientists now believe that the once-dreaded dioxin poses little if any threat of causing cancer, contrary to what was previously assumed.<sup>225</sup> There are examples where scientific knowledge moves the other way, of course, such as in the gradual wearing away of scientific skepticism over the thinning of the ozone layer.<sup>226</sup>

## V. IDEAS FOR CHANGE

In the face of his bleak assessment, Farber offers some legal principles for dealing with uncertainty in environmental law.<sup>227</sup> He encourages use of the “precautionary principle” and advocates significant administrative and review reforms.<sup>228</sup> Some of his recommendations are wise, but others are difficult to reconcile with the democratic approach of his environmental baseline.

### A. *The Precautionary Principle*

The precautionary principle states, roughly, that one should not gamble when the stakes are potentially high.<sup>229</sup> Farber notes that the idea has been adopted by the European Union and the Rio Declaration

---

219. See *Reserve Mining Co. v. EPA*, 514 F.2d 492, 514-20 (8th Cir. 1975).

220. FARBER, *supra* note 1, at 174.

221. See *id.* at 174-79.

222. See *id.* at 170-77.

223. See *id.* at 170.

224. See *id.*

225. See *id.* at 176-77 (citing Leslie Roberts, *Dioxin Risks Revisited*, 251 SCIENCE 624, 624 (1991)).

226. See *id.* at 177-78.

227. See *id.* at 170-98.

228. *Id.* at 170.

229. See *id.* at 170-71.

as an appropriate means of trying to address environmental uncertainty.<sup>230</sup> Risk aversion, which is the basis of the precautionary principle, favors rules that seek to minimize the potential for rare, but potentially disastrous, large losses, while accepting the more certain, but more readily handled, small losses.<sup>231</sup> Applying this principle, Farber concludes that the judgments in *Reserve Mining* were correct because the courts bent over backwards to take precautions against the risk of a large loss of lives, even in the face of uncertain evidence.<sup>232</sup>

A specific and effective use of the precautionary principle in environmental law, Farber notes, would be to shift the burden of proof to the polluter, a method that was adopted in various forms by the District of Columbia Circuit in the 1970s to deal with certain pesticide rules.<sup>233</sup> As noted above, such shifts in presumption might form a useful and effective application of Farber's call for an environmental baseline.<sup>234</sup>

Farber also concludes, however, that a commonly proposed extension of the precautionary principle—assuming the “worst case” in making risk assessment—“makes a very poor standard for regulation.”<sup>235</sup> In a society that seeks to make efficient use of resources to provide happiness and alleviate suffering, a rule that favors inactivity encourages waste of resources, he argues.<sup>236</sup> Moreover, in a society that seeks effective political solutions, “crying wolf” is not a viable long-term strategy.<sup>237</sup>

Farber does not further argue, as a libertarian might, that the precautionary principle also runs counter to the American ideal of risk-taking. This ideal has enabled the United States to succeed in so many areas in which other nations have not, and forms a foundation for this nation's special economic prosperity.<sup>238</sup> Moreover, in some

---

230. *See id.* Statisticians define two types of mistakes in risk calculation: a Type I error, which concludes erroneously that a risk exists when it actually does not, and a Type II error, which concludes that a risk does not exist when it actually does. *See id.* at 172.

231. *See id.* at 170. The precautionary principle explains why people buy health and auto insurance. Although most people pay out in premiums over their lifetime more than they get in benefits, they buy the insurance to avoid the potential disaster of incurring a large loss all at once.

232. *See id.* at 174.

233. *See id.* at 172 n.22, 177 (citing *Environmental Defense Fund, Inc. v. EPA*, 465 F.2d 528 (D.C. Cir. 1972), *Environmental Defense Fund, Inc. v. EPA*, 510 F.2d 1292 (D.C. Cir. 1975), and *Environmental Defense Fund, Inc. v. EPA*, 548 F.2d 998, 1005 (D.C. Cir. 1976)).

234. *See supra* Part II.B.

235. *Id.* at 170-71.

236. *See id.* at 171.

237. *See id.*

238. *Cf.* DAVID S. LANDES, *THE WEALTH AND POVERTY OF NATIONS: WHY SOME ARE SO RICH AND SOME SO POOR* (1998) (arguing that the economic success of nations depends in large

environmental decisions no option may be the precautionary one, if inaction also poses a risk of harm, albeit of a different variety. As the Supreme Court wrote in an early environmental case, even the decision not to take an action is “none the less a choice.”<sup>239</sup>

### B. *Regulatory and Review Reform*

Farber addresses the fear of clumsy or near-sighted environmental regulation with a call for regulatory and review reform.<sup>240</sup> While such recommendations would appear to be essential to a pragmatist’s concerns, Farber rushes through them at the end of *Eco-Pragmatism*. While most of his recommendations are intriguing or provocative, too many of them are mere sketches, which do not allow for much deeper analysis. It appears that Farber, despite his pragmatist label, may be more interested in theories such as the environmental baseline than in the workings of an environmental problem through the regulatory and court systems.

In terms of administrative reforms, Farber argues that the regulatory process must be reformed to respond quickly to changing information.<sup>241</sup> He proposes decentralization in order to make regulation “more nimble.”<sup>242</sup> He approves of market-trading mechanisms, which enable industries to respond instantaneously to technology developments,<sup>243</sup> and approves of experimentation through federalist devolution of authority to states.<sup>244</sup> On the flip side, Farber would like agencies to be able to act more flexibly to impose regulations even when they have not gathered all the facts, in order to capture the benefits of quickness.<sup>245</sup> He would like agency decisionmaking to be more dynamic, through the creation of

---

part on their culture, including their acceptance of risk-taking, which is frowned upon in many non-Western cultures).

239. *Miller v. Schoene*, 276 U.S. 272, 279 (1928) (upholding Virginia’s right to order destruction, without compensation, of cedar trees that spread deadly rust to apple trees).

240. See FARBER, *supra* note 1, at 190-98.

241. See *id.* at 191-94.

242. See *id.* at 180.

243. See *id.* at 180-83 (citing the notable example of sulfur dioxide trading permits enacted by the 1990 Clean Air Act amendments, 42 U.S.C. § 7651 (1994)); see also Glenn Wiser, Note, *Joint Implementation: Incentives for Private Sector Mitigation of Global Climate Change*, 9 GEO. INT’L ENVTL. L. REV. 747, 762 (1997) (noting the program’s success).

244. See FARBER, *supra* note 1, at 180-81. Farber’s assessment of decentralization is somewhat perfunctory and does not address the fear that states will “race to the bottom” in order to attract new business. See ZYGMUNT J.B. PLATER ET AL., ENVIRONMENTAL LAW AND POLICY: NATURE, LAW, AND SOCIETY 309-16 (2d ed. 1998). Permitting different standards in different states would also be in tension with the idea, accepted by Farber, that there is a single national commitment in favor of environmental protection. See *id.* at 114-23.

245. See *id.* at 189.

regulatory mechanisms that rapidly evaluate and respond to changing knowledge and circumstances.<sup>246</sup> As Farber duly recognizes, a fundamental problem with this approach is that such varied and dynamic regulatory plans require money, and that neither the Executive nor Congress has ever seen fit to provide the EPA with sufficient funding to achieve regulatory goals.<sup>247</sup>

Farber also suggests that the direction of many current substantive regulations should be reassessed.<sup>248</sup> Some worthy environmental proposals suffer, he writes, because they confer their benefits diffusely among citizens, each of whom has little incentive to spend time and money working for protection.<sup>249</sup> Meanwhile, the political spotlight turns to sensational crises such as Three Mile Island and Love Canal, which led to a flurry of regulations that over time have proven to be unnecessary or inefficient.<sup>250</sup> While he does not go as far as Stephen Breyer did in calling for an elite, interagency administrative group to reallocate the regulation of risk,<sup>251</sup> Farber would like the regulatory agencies to reassess their rules.<sup>252</sup> He proposes that the EPA be granted sweeping “powers to engage in regulatory reform,” including the power to scrap regulations that are either (1) unnecessary, because it is clear that they eliminate no significant environmental risk or (2) infeasible, because the burdens are too high and there are less burdensome alternatives.<sup>253</sup> “In other words,” Farber concludes, “the EPA would deregulate when a federal scheme as a whole no longer implemented the environmental baseline of feasibly regulating all significant risks.”<sup>254</sup> This flexibility would

---

246. *See id.* at 183-85.

247. *See id.* at 185. Farber notes the example of the abolition of the congressional Office of Technological Assessment, which was one of the best sources for the kind of quick scientific knowledge that he says is needed. *See id.* at 185.

248. *See id.* at 190-93.

249. *See id.* at 193-96.

250. *See id.* at 190-98. Farber cites the Delaney Clause, 21 U.S.C. § 348(c)(3)(A) (1994), which before its modification commanded the Food and Drug Administration to ban any carcinogenic substance, as an example of a health and safety rule that was adopted with too little thought and which withstood repeated reform efforts because of congressional proclivity for the status quo. *See FARBER, supra* note 1, at 190-98.

251. *See BREYER, supra* note 57, at 55-76. Breyer’s administrative group would include federal employees who have followed a new career path, receiving training in administrative law and the health sciences. *See id.* at 59-60. These bureaucrats would work with science advisory boards to determine the appropriate levels of risk regulation. *See id.* at 60-68.

252. *See FARBER, supra* note 1, at 190-94.

253. *Id.* at 195.

254. *Id.*

not endanger environmental protection, he argues, because flexibility can provide strength.<sup>255</sup>

Finally, Farber proposes to foster dynamic regulations by enacting a standard of judicial review below the “hard look” standard, which inhibits quick agency responses to new information.<sup>256</sup> He proposes a lower standard of review for new regulatory programs when the agency shows that “[i]ts action will not cause irreparable harm; . . . [i]t has taken steps to generate additional relevant information; . . . [and] [i]t has a process in place to reappraise current policy as the new information is developed.”<sup>257</sup>

Because Farber rushes through these reform proposals, they are difficult to scrutinize in depth.<sup>258</sup> Nonetheless, a few comments are worthwhile. First, Farber’s suggestions for substantive reform are weighted heavily toward the deregulatory side, despite the fact that his procedural recommendations would, presumably, enable an agency to be as nimble in generating new regulations as in shedding old ones. Presumably, Farber would welcome the EPA’s engaging in expedited reform of current regulations when it determines that the pre-existing scheme is not fulfilling the mandate to regulate feasibly all significant risks. Such a dynamic reform could include the regulation, subject to change, of some of the multitude of pollutants that the agency has not had the time or money to study thoroughly.<sup>259</sup>

Second, Farber’s call for broad reforms seems to presuppose that agencies such as the EPA are going about their regulatory activities in a fundamentally cockeyed manner. It is one thing to recommend that environmental rulemaking include more economic analysis, as his environmental baseline approach does. It is another thing to assume, as his regulatory reform section suggests, that there is a fundamentally better way to go about regulating environmental risks. Many critics have chastised the supposed inflexibility of the command and control approach to regulation.<sup>260</sup> The pragmatic reformer’s job is to show that alternatives would provide greater flexibility and equal, or

---

255. *See id.* at 198.

256. *See id.* at 189-90.

257. *Id.* at 190.

258. Some of Farber’s proposals, such as the call for more emissions trading programs, have long been championed by some economic critics of environmental regulation. *See, e.g.,* Ackerman & Stewart, *supra* note 61, at 1341-42.

259. *See* SUNSTEIN, *supra* note 54, at 278-79 (noting that many potential dangerous substances remain unregulated, in large part because of the massive procedural and regulatory work that must be done before regulation is affected).

260. *See, e.g.,* Ackerman & Stewart, *supra* note 61, at 1334-43; BREYER, *supra* note 57, at 1-50.



greater, effectiveness. Farber unfortunately picks as an example of admirable regulatory reform the EPA's Project XL, which enables a producer to show the EPA that greater pollution abatement at a facility can be achieved in a more effective manner.<sup>261</sup> An early assessment of Project XL has labeled it largely a failure, in part because of the perceived difficulty of developing such alternative plans.<sup>262</sup>

Third, Farber's reform proposals, although not stated in so many words, are notably undemocratic. His proposals essentially call for an administrative form of government on environmental issues, with minimal interference from the political branches of government. In this respect, he echoes the ideas of Stephen Breyer, who has written that a group of experts, not the political process, should decide which environmental risks deserve regulation and to what degree.<sup>263</sup> Farber expresses some irritation with the fact that Congress, the White House, courts, and public opinion sway environmental decisionmaking more than the regulatory experts at the EPA.<sup>264</sup> This comes as a surprise, coming near the end of a book that argued earlier that politics needs to play a central role in making environmental law, and that public faith in the process is essential to its success.<sup>265</sup> It is hard to reconcile his supposedly inclusive, open, and public-spirited environmental baseline with his apolitical and technocratically oriented proposals for regulatory reform.

## VI. CONCLUSION

As Farber correctly notes, Americans want both protection from the risks of pollution and the benefits of economic growth and material wealth.<sup>266</sup> "Thus, there is a pervasive tension in our responses to environmental problems," he writes.<sup>267</sup> "If environmental law is to do justice to our society's complex views, it must also reflect this tension between environmentalism and economics."<sup>268</sup>

---

261. See FARBER, *supra* note 1, at 195 (discussing Project XL).

262. See Rena Steinzor, *Reinventing Environmental Regulation: The Dangerous Journey from Command to Self-control*, 22 HARV. L. REV. 103 (1998).

263. See BREYER, *supra* note 57, at 55-81.

264. See FARBER, *supra* note 1, at 191-96.

265. As noted above, Farber's book focuses nearly entirely on pollution, as opposed to the natural resource branch of environmental law. See *supra* Part II.A. Because of this focus, it is somewhat odd that the book closes with a discussion of the value of nature and the relationship of humans and nature. See FARBER, *supra* note 1, at 204-05.

266. See *id.* at 201.

267. *Id.*

268. *Id.*

Neither single-minded economic analysis nor directionless politics are likely to result in satisfactory laws that further human or environmental fortune. Critics of the inefficiencies of politics tempt us with the prospect of law by economist and engineer; no longer would laws be adopted by politicians with their ears attuned to the scare-of-the-month and other supposed failings of politics. The temptation should be resisted. There are simply too many variables for a panel of experts to handle without the specter of politically oriented values creeping in. Armed with data showing that it would be more cost effective to target regulation against space heaters or raw mushrooms instead of toxic chemicals, the economists would (or should) soon be besieged with questions from thoughtful advocates of various stripes. Has the panel considered the fact that risks from space heaters and mushrooms are in part voluntary? That the typical consumer family does not consider itself at any risk of death from cheap space heaters or mushrooms, but does worry about the potential risks from insidious pollutants? Has the panel considered the fact that the costs of abatement may be spread across the consuming populace more easily with one sort of regulation than another? These sorts of questions are likely to be raised by enlightened economists and scientists, as well as by politicians. Many of the values that inform political decisions would undoubtedly work their way into the deliberations of an economic and scientific panel, and the debate would end up looking a lot more like politics than the champions of politics-free regulation might imagine.

At the same time, this does not mean that economics has nothing to offer in resolving the questions of risk regulation. The rise in the respectability of cost-benefit analysis during the past twenty years has shown that many politicians and regulators do understand the idea that risk regulation should also be cost-effective. The slow but steady shift to systems of emissions trading and other considerations of cost show that cost-benefit analysis can, does, and will play an important role in shaping environmental law. Indeed, one of the purposes of this review has been to argue that environmental decisionmaking should plainly and openly embrace the notion that a variety of values cannot help but inform the views of the decisionmaker. Just as strict cost-benefit analysis needs to be tempered by values outside of economics, the risk feasibility standards of traditional environmental laws must coexist with other human, social, and natural goals. In future dilemmas that resemble *Reserve Mining*, courts and regulators are advised to consider, openly and without hesitation, concerns such as the effect on employment and the community, the potential changes

for patterns of public consumption, and the likely effects of regulation on corporate behavior, when the statute at issue so permits. In an ideal world of pragmatic environmental decisionmaking, some form of rudimentary impact statement would be drafted for the entire range of policy concerns, including cost-benefit analysis, risk feasibility, how proposed solutions would affect different segments of the community, and a range of other values. Such openness would not guarantee good decisionmaking, as few theories of government do, but it might shine the light of public and bureaucratic skepticism on some of the more dubious rationales for regulatory decisions and foster better public understanding of the trade-offs necessary in environmental law. Greater clarity of the issues, including the facts of uncertainty, would go a long way to resolving the complaints of both the economic critics of current environmental rules and political critics of economic analysis.

Daniel Farber's *Eco-Pragmatism* provides a good starting point for such broad-based thinking about the dilemmas of environmental law. Those who scoff at economic analysis should read Farber's brief and jargon-free explanations of the premises of cost-benefit analysis. Others, who see efficiency as the only lodestar for governmental action, are directed to ponder the concise assertions of the ideas of collective values. All are reminded that uncertainty clouds many decisions in environmental regulation. As in perhaps no other field of law, the regulator and advocate must continually work with the scientist to find the most effective and most efficient course of action.

Beyond Farber's effective argument for considering both politics and efficiency in directing environmental law, *Eco-Pragmatism* stumbles in its more specific policy recommendations. Foremost, Farber fails to persuade that his proposed environmental baseline is more likely to be politically stable than would a neutral baseline approach that embraces political values. His argument is unconvincing that the order in which the factors are considered makes more of a difference than the depth of the arguments made on either side, or the inclination of the judge or regulator.

Finally, Farber's provocative ideas about regulatory and administrative reform are, for the most part, too underdeveloped to be entitled to much scrutiny. He comes close to dropping his pragmatic mantle by setting forth regulatory proposals that appear to make it easier for the EPA to deregulate quickly, without making it clear that the need to regulate quickly would be just as important.

Thus, it is best not to look to *Eco-Pragmatism* for a detailed, practical approach for reforming environmental law. Farber's

pragmatism works best at a more general level. For scholars, students, and thinkers about the direction of environmental law, *Eco-Pragmatism* is a valuable source for pondering the big questions about mixing the ideals of environmental risk regulation with the other, economic goals of a complex society.