

Alabama Law Scholarly Commons

Articles

Faculty Scholarship

2020

Separating Fact from Fiction in Evaluating the Endangered Species Act: Recognizing the Need for Ongoing Conservation Management and Regulation

William L. Andreen

University of Alabama - School of Law, wandreen@law.ua.edu

Follow this and additional works at: https://scholarship.law.ua.edu/fac_articles



Part of the [Law Commons](#)

Recommended Citation

William L. Andreen, *Separating Fact from Fiction in Evaluating the Endangered Species Act: Recognizing the Need for Ongoing Conservation Management and Regulation*, 56 Idaho L. Rev. 39 (2020).

Available at: https://scholarship.law.ua.edu/fac_articles/623

This Article is brought to you for free and open access by the Faculty Scholarship at Alabama Law Scholarly Commons. It has been accepted for inclusion in Articles by an authorized administrator of Alabama Law Scholarly Commons. For more information, please contact cduncan@law.ua.edu.

SEPARATING FACT FROM FICTION IN EVALUATING THE ENDANGERED SPECIES ACT: RECOGNIZING THE NEED FOR ONGOING CONSERVATION MANAGEMENT AND REGULATION

WILLIAM L. ANDREEN*

TABLE OF CONTENTS

I. INTRODUCTION	39
II. BASIC STRUCTURE OF THE ESA.....	40
III. CLIMATE RESILIENCE LITERATURE.....	42
IV. DELISTING AS A MEASURE OF SUCCESS OR FAILURE	45
V. CONCLUSION.....	47

I. INTRODUCTION

Among Professor Dale Goble’s manifold contributions to the law and the task of preserving wild, natural creatures is one that in my mind stands out for special recognition. The series of articles that he authored and co-authored on conservation-reliant species brought increasing attention over the course of a decade to a fact that is commonly ignored in discussions of the Endangered Species Act.¹ It is a relatively simple concept—almost intuitive, at least to a pollution lawyer—but it appears not to have been obvious to many of those who were responsible for enacting this far-ranging and ambitious statute into law. It is the fact that most species will not be able to recover to the point at which they can survive in the wild, notwithstanding larger numbers or improved range, unless specific regulatory measures or conservation efforts are taken to protect the recovered population from the adverse impacts that imperiled them in the first instance. In short, biological recovery alone, without some ongoing management, may not be enough since many if not most “recovered” species will be back in the same soup again without some ongoing management.

This is a concept that was first introduced by Professor Holly Doremus in 2000.² But it was Goble and his co-authors who gave it a name in 2005.³ In work that followed that article, their understanding of what was now known as conservation reliance evolved.⁴ That evolution eventually led to some intense

* Edgar L. Clarkson Professor of Law, The University of Alabama School of Law; Honorary Professor, The Australian National University College of Law.

1. Endangered Species Act of 1973, 16 U.S.C. §§ 1531–44 (2013).

2. Holly Doremus, *Delisting Endangered Species: An Aspirational Goal, Not a Realistic Expectation*, 30 ENVTL. L. REP. 10434 (2000); see also Holly Doremus & Joel E. Pagel, *Why Listing May Be Forever: Perspectives on Delisting Under the U.S. Endangered Species Act*, 15 CONSERVATION BIOLOGY 1258 (2001).

3. J. Michael Scott et al., *Recovery of Imperiled Species Under the Endangered Species Act: The Need for a New Approach*, 3 FRONTIERS ECOLOGY & ENV’T 383, 384 (2005).

4. Dale D. Goble, *The Endangered Species Act: What We Talk About When We Talk About Recovery*, 49 NAT. RESOURCES J. 1 (2009) [hereinafter Goble, *Endangered Species Act*]; Dale D. Goble, *A Fish Tale: A Small Fish, the ESA, and Our Shared Future*, 40 ENVTL. L. 339 (2010) [hereinafter Goble, *A Fish*

debate in the literature.⁵ Regardless of the arguments about how the concept should be defined or applied, the truth that was revealed in this line of literature is unassailable. The linear steps set forth in the ESA from listing to recovery and eventual delisting reflect a naïve view of the risks that endangered and threatened species encounter. The task of protection and stewardship will never end for most species, and many species will perhaps never be delisted. This fact must be shouted from the rooftops and repeated in the halls of Congress because the ESA is under attack by those who claim it has failed. And exhibit number one in the case posed by the Act's detractors is the fact that only a relative handful of species have been delisted.⁶

Part I in this essay offers a brief review of the basic structure of the ESA. In Part II, I survey the evolution of Goble and his colleagues' scholarship on conservation resilience. Part III then describes the controversy surrounding whether or not the ESA has proven to be an effective mechanism promoting recovery. The essay concludes by arguing that it is essential that the public understand that recovery under the ESA is not like a simple trip to the hospital. While the patient may eventually be removed from the critical list, the patient will likely require continuing care into perpetuity.⁷ Recovery in a biological sense alone may not be enough; it must be a sustainable biological recovery. Such an understanding may not only help defuse the simplistic and misdirected assertion that the ESA has been a failure, but it may enable our nation to make more informed judgements about the way in which our stewardship of nature can be improved as we confront the daunting reality of a global system undergoing rapid climate change.

II. BASIC STRUCTURE OF THE ESA

The purpose of the ESA is to provide a "program" for the "conservation" of endangered and threatened species and the "means" whereby the ecosystems on which they depend "may be conserved."⁸ "Conservation," in turn, is defined as all of the steps "necessary to bring any endangered species or threatened species to the point at which the measures provided [by the ESA] are no longer necessary."⁹

Tale]; J. Michael Scott et al., *Conservation-Reliant Species and the Future of Conservation*, 3 CONSERVATION LETTERS 91 (2010); Dale D. Goble et al., *Conservation-Reliant Species*, 62 BIOSCIENCE 869 (2012) [hereinafter Goble et al., *Conservation-Reliant Species*].

5. Compare Daniel J. Rohlf et al., *Conservation-Reliant Species: Toward a Biology-Based Definition*, 64 BIOSCIENCE 601 (2014) (contending that no conservation-reliant species should be delisted unless it can survive in the wild without human intervention), with Dale D. Goble et al., *Response to "Conservation-Reliant Species: Toward a Biology-Based Definition,"* 64 BIOSCIENCE 857 (2014) (stating that the legal factors that must be considered in a delisting are not altered by calling a species conservation-reliant).

6. Critics of the ESA commonly assert that its chief failing is the fact that less than two percent of over 1,600 listed species have recovered to the point where they have qualified for delisting. See Christopher Ketcham, *Inside the Effort to Weaken the Endangered Species Act*, NAT'L GEOGRAPHIC (Aug. 12, 2019) https://www.nationalgeographic.com/news/2017/05/endangered_speciesact/ (referring to those fighting the ESA in Congress).

7. I borrowed the hospital illustration from Professor Holly Doremus who had, in turn, picked it up from the ESA's legislative history. See Doremus, *supra* note 2, at 10441, 10453.

8. 16 U.S.C. § 1531(b) (2018).

9. *Id.* § 1532(3).

The Act, in short, looks forward to the recovery of imperiled species. Its drafters set forth a fairly straightforward process whereby this end may be achieved.

This process is administered by the Secretaries of the U.S. Department of the Interior and the U.S. Department of Commerce, who have delegated most of their responsibilities to the U.S. Fish and Wildlife Service and the National Marine Fisheries Service respectively (collectively referred to as the Services).¹⁰ The Services are responsible for determining via informal rulemaking whether a species must be listed as endangered or threatened.¹¹ An endangered species is one that is “in danger of extinction” through at least a significant portion of its range,¹² whereas a threatened species is one that is “likely to become an endangered species within the foreseeable future.”¹³ In making such a decision, the responsible Service must consider whether the species is endangered or threatened by “any” of five factors: (1) habitat destruction or degradation; (2) overutilization; (3) disease or predation; (4) inadequacy of regulatory mechanisms; or (5) other factors.¹⁴ At the same time as a listing decision is made, the Services are called upon to designate the species’ critical habitat.¹⁵

Following the listing determination, the ESA provides for two steps aimed at stabilization and eventual recovery. The first step is designed to protect a species from further peril by prohibiting any federal action that is likely to jeopardize the continued existence of any listed species or destroy its critical habitat¹⁶ and by prohibiting commerce in or the take of endangered species.¹⁷ These two regulatory mechanisms provide a basic safety net or what Professor Goble referred to as a “suite of extinction-preventing tools.”¹⁸ The second step goes further and involves recovery actions that are intended to reduce the threats to the species through various means including habitat restoration.¹⁹ Once that has been accomplished, once the species has recovered, the process is over; the protection provided by the Act can be removed by delisting, and the species will live happily ever after. At least that is a common assumption, and it appears to be borne out by the linear structure of the ESA.

10. See Donald C. Baur & William Robert Irvin, *Overview*, in *ENDANGERED SPECIES ACT: LAW, POLICY, AND PERSPECTIVES* (Donald C. Baur & William Robert Irvin eds., 2002). While the Fish and Wildlife Service is primarily responsible for administering the Act, the National Marine Fisheries Service has jurisdiction over the protection of marine species, including anadromous fish. See HOLLY DOREMUS ET AL., *ENVIRONMENTAL POLICY LAW: PROBLEMS, CASES, AND READINGS* 330 (5th ed. 2012).

11. 16 U.S.C. § 1533(a)(1) (2018).

12. *Id.* § 1532(6).

13. *Id.* § 1532(20).

14. *Id.* § 1533(a)(1)(A)–(E). The Services are also instructed to take into account any conservation or management efforts being made by a state or local government when making their decisions. *Id.* § 1533(b)(1)(A).

15. 16 U.S.C. § 1533(b)(2) (2018).

16. *Id.* § 1536(a)(2).

17. *Id.* § 1538(a). The Act defines “take” to mean “harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect” or attempt to do so. *Id.* § 1532(19). The Services have defined “harm” to include actions that significantly modify habitat in a manner that actually kills or injures the protected species. 50 C.F.R. §§ 17.3, 222.102 (2020).

18. Goble et al., *supra* note 4, at 869.

19. 16 U.S.C. § 1533(f) (2018); see also Goble, *A Fish Tale*, *supra* note 4, at 342–43.

Nevertheless, the authors of the ESA were perhaps not quite so naïve. The provision on delisting requires that the Services examine the same factors when they delist a species as they examined when they listed the species in the first case.²⁰ Among those factors is one that explicitly links the condition of the species to current and future human activity.²¹ Are the existing regulatory mechanisms inadequate?²² Are they, in other words, adequate to protect the species from habitat degradation or fragmentation or other actions that would imperil their continued existence?²³ Thus, the question on delisting is not narrowly confined to a simple biological analysis of whether a species has attained a certain population level.²⁴ Rather, the question is also directed at whether the threats that drove the species to the edge of oblivion have been adequately addressed and controlled.²⁵

III. CLIMATE RESILIENCE LITERATURE

As Dale Goble and his co-authors recognized in 2005, the path to eventual delisting is no easy matter for most species.²⁶ They noted that the most common threats to listed species are habitat loss and degradation and the proliferation of exotic invasive species.²⁷ Those threats often cannot be eliminated but rather can only be controlled with active management—action, for example, to improve the condition of necessary habitat or to contain invasives.²⁸ Given the magnitude and complexity of the threats, the dire trouble species were in when they were listed, and the limited funding for recovery actions, it is not surprising that few listed species had recovered to the point of delisting during the first 30 years of the ESA.²⁹ Furthermore, they suggested that the magnitude and increasing intensity of these threats would make it unlikely for many species to be delisted in the future without some form of continuing management.³⁰

Goble and his colleagues called these species “conservation-reliant” because they could only maintain a sustainable population in the wild with the implementation of “ongoing management actions of proven effectiveness.”³¹ The authors then proposed a model binding agreement which would set forth biological goals, specific management actions, adaptive management strategies, and

20. 16 U.S.C. § 1533(c)(2)(B) (2018); *see also* *Friends of Blackwater v. Salazar*, 691 F.3d 428, 432 (D.C. Cir. 2012) (holding that the relevant Service must consider the same five statutory factors when delisting); *Endangered and Threatened Wildlife and Plants; Regulations for Listing Species and Designating Critical Habitat*, 84 Fed. Reg. 45020, 45052 (Aug. 27 2019) (revising 50 C.F.R. § 424.11 to the same effect in a final rulemaking).

21. 16 U.S.C. § 1533(a)(1)(D) (2018).

22. *Id.*

23. *See infra* notes 27-28 and accompanying text.

24. *See* Doremus, *supra* note 2, at 10439 (declaring that delisting determinations cannot be made on the basis of biological data alone).

25. *See id.*

26. Scott et al., *supra* note 3, at 387.

27. *Id.* at 383. According to Wilcove, 85 percent of at-risk species were adversely affected by habitat loss or degradation and 49 percent were harmed by competition from invasive species, while only 17 percent were affected by overexploitation such as hunting. David S. Wilcove et al., *Quantifying Threats to Imperiled Species in the United States*, 48 *BIOSCIENCE* 607, 608–09 (1998).

28. Scott et al., *supra* note 3, at 383–84.

29. *Id.* at 384.

30. *Id.*

31. *Id.* at 386.

assurances that the responsible state or local agency or non-governmental organization would have the resources necessary to fulfill its obligations.³²

Dale Goble continued to elaborate on this theme in subsequent work.³³ In 2009, he added climate change and consumption to the list of threats facing these species,³⁴ thus underscoring the fact that ecosystems are not equilibria systems but are “complex systems that are dynamic and unpredictable across space and time.”³⁵ Most importantly, however, he emphasized that delisting decisions are comprised of two components.³⁶ One is the biological or demographic component—has the population of the species grown to the point that risks from stochastic events have been reduced to a reasonable level?³⁷ The second component addresses whether there are adequate regulatory or conservation mechanisms in place that will reasonably protect the species from risk in the event that the protective shield of the ESA is removed.³⁸ Since generally applicable statutes other than the ESA are not likely to be focused enough or powerful enough to provide a replacement for this shield, some effective management device must either be created or the species will have to remain on the list.³⁹

The magnitude of the challenge was quantified through an analysis conducted by Dr. Michael Scott and his colleagues, including Goble.⁴⁰ They found that 84 percent of the species listed under the ESA are conservation-reliant.⁴¹ And conservation reliance will “likely become even more pervasive” with increasing numbers of species facing extinction due to global warming, population growth, and the proliferation of invasive species.⁴² “Clearly” the authors wrote, “we have seen only the tip of the iceberg.”⁴³ This analysis was followed by an article written by Goble and colleagues who raised the question of how to assign conservation priorities when so many species are in need of continuing management and many more will need similar management in the future.⁴⁴ The issue is a difficult one since expenditures for recovery are only a fraction of what is needed and since most recovery funds are spent on a few iconic species.⁴⁵ The challenge, therefore, lies in finding alternative funding and management sources as well as developing priorities based upon an assessment of how much management will be required in light of the benefits that will accrue from that management.⁴⁶

32. *Id.* at 387–88.

33. *See infra* notes 34–55.

34. Goble, *Endangered Species Act*, *supra* note 4, at 6 n.12.

35. *Id.* at 5 n.11 (quoting Tabatha J. Wallington et al., *Implications of Current Ecological Thinking for Biodiversity Conservation: A Review of the Salient Issues*, 10 *ECOLOGY & SOC'Y* 15, 15 (2005)).

36. *Id.* at 17–18.

37. *Id.* at 17.

38. *Id.* at 17–18.

39. *Id.* at 16–17.

40. Scott et al., *supra* note 4.

41. *Id.* at 91.

42. *Id.* at 95.

43. *Id.*

44. *See* Goble et al., *Conservation-Reliant Species*, *supra* note 4, at 871–72.

45. *Id.* at 872.

46. *Id.* at 871–72.

A debate later arose about whether any conservation-reliant species should be delisted. Professor Daniel Rohlf and colleagues argued that the Services should not delist any such species because the ESA “sets self-sufficiency in the wild as a standard for declaring a species legally *recovered* and therefore able to be delisted. . . .”⁴⁷ Goble and colleagues responded to Rohlf by pointing out that the statutory factors associated with a delisting decision are not altered by calling a species conservation-reliant or not.⁴⁸ The question on delisting is whether the species has met its recovery goals in terms of population *and* whether the threats it faces are being managed sufficiently without federal action under the ESA.⁴⁹ They also suggested that the provision of alternative but adequate mechanisms to protect the species might offer a way out of the delisting impasse, thus freeing up limited ESA funding for application to the increasing numbers of endangered and threatened species.⁵⁰

Goble and his colleagues, furthermore, took this opportunity to emphasize the core understanding implicit in the recognition of conservation-reliant species.⁵¹ The overwhelming majority of species will never be properly delisted absent the creation of some sort of continuing mechanism to protect the species from descending yet again to the edge of existence.⁵² Creating such mechanisms and finding reliable sources of funding for them are huge challenges.⁵³ Not surprisingly, delistings of conservation-reliant species have been ad hoc affairs and have been limited in number.⁵⁴ In the absence of such management mechanisms, the only regulatory device available which is powerful enough to protect most species is the ESA itself.⁵⁵

Viewed in isolation, therefore, delisting is a false metric by which to judge the success of the ESA. It may be a way to make more federal resources available for other species in need.⁵⁶ But it does not represent an end to the necessity of regulating the threats that imperiled most species in the first instance.⁵⁷ And it certainly appears as if alternative structures are not likely, at least in most instances in the near-term future, if indeed ever, to take the place of the array of protections provided by the ESA.⁵⁸

47. Rohlf et al., *supra* note 5, at 609.

48. Goble et al., *supra* note 5, at 857.

49. *Id.*

50. *Id.* at 857–58. For thoughts on how adequate post-delisting management protections could be devised, see Sandra B. Zellmer et al., *Species Conservation and Recovery Through Adequate Regulatory Mechanisms*, 44 HARV. ENVTL. L. REV. 367 (2020); Martha C. Williams, *Lessons from the Wolf Wars: Recovery v. Delisting Under the Endangered Species Act*, 27 FORDHAM ENVTL. L. REV. 106 (2016).

51. See Goble et al., *supra* note 5, at 857.

52. See *id.*

53. See Goble et al., *Conservation-Reliant Species*, *supra* note 4, at 871–72.

54. See Goble, *A Fish Tale*, *supra* note 4, at 361.

55. Goble et al., *Conservation-Reliant Species*, *supra* note 4, at 870; Goble, *A Fish Tale*, *supra* note 4, at 360.

56. Zellmer et al., *supra* note 50.

57. See *supra* notes 36–39 and accompanying text.

58. See Doremus, *supra* note 2, at 10446.

IV. DELISTING AS A MEASURE OF SUCCESS OR FAILURE

Dale Goble wrote a brilliant essay on the evolution of wildlife conservation law, which was published with a collection of other papers in 2006.⁵⁹ Dale's essay is a real gem. Succinct yet comprehensive, it revealed a lifetime of research and study. It also demonstrated the wisdom and understanding that animated all of his work. The last sentence in that essay haunts me, however. It reflected real concern about the public's perception of the ESA amid growing criticism of and outright hostility to the Act. He wrote: "The [A]ct at thirty remains a lightning rod—a fact that itself may impede the recovery of at-risk species."⁶⁰

The Act, of course, has been a lightning rod since its inception. Controversies over the snail darter in the 1970s⁶¹ and the northern spotted owl in the 1980s and early 1990s⁶² prompted critics to call the Act "the epitome of environmental extremism, destroying jobs and stopping economic activities to protect seemingly trivial species."⁶³ Attacks were mounted on the Act in Congress in 1994 and again in 2005.⁶⁴ The pace of proposed legislation to cut back on the protections afforded by the Act has been increasing, moreover.⁶⁵ Between 2011 and 2015, over 160 bills were introduced in Congress to weaken the Act.⁶⁶ And the efforts continue.⁶⁷

For years, the critics of the ESA have pointed to the small number of species that have been delisted as proof that the Act has failed.⁶⁸ This has become a

59. Dale D. Goble, *Evolution of At-Risk Species Protection*, in 2 THE ENDANGERED SPECIES ACT AT THIRTY 6 (J. Michael Scott et al. eds., 2006).

60. *Id.* at 23.

61. See ZYGMUNT J.B. PLATER, *THE SNAIL DARTER AND THE DAM: HOW PORK-BARREL POLITICS ENDANGERED A LITTLE FISH AND KILLED A RIVER* (2013); KENNETH M. MURCHISON, *THE SNAIL DARTER CASE: TVA VERSUS THE ENDANGERED SPECIES ACT* (2007).

62. See Kathleen E. Franzreb, *Perspectives on the Landmark Decision Designating the Northern Spotted Owl (*Strix occidentalis caurina*) as a Threatened Subspecies*, 17 ENVTL. MGMT. 445 (1993).

63. RICHARD N.L. ANDREWS, *MANAGING THE ENVIRONMENT, MANAGING OURSELVES: A HISTORY OF AMERICAN ENVIRONMENTAL POLICY* 293 (2d ed. 2006) (recounting claims advanced by the critics of the Act).

64. See JOHN COPELAND NAGLE & J.B. RUHL, *THE LAW OF BIODIVERSITY AND ECOSYSTEM MANAGEMENT* 143 (2d ed. 2006).

65. See JAMIE PANG & NOAH GREENWALD, *CTR. FOR BIOLOGICAL DIVERSITY, POLITICS OF EXTINCTION: THE UNPRECEDENTED REPUBLICAN ATTACK ON ENDANGERED SPECIES AND THE ENDANGERED SPECIES ACT 1* (2015).

66. *Id.*

67. See *Modernizing the Endangered Species Act*, CONG. WESTERN CAUCUS, <https://westerncaucus.house.gov/issues/issue/?IssueID=14890> (last visited Feb. 19, 2020).

68. See, e.g., CHARLES C. MANN & MARK L. PLUMMER, *NOAH'S CHOICE: THE FUTURE OF ENDANGERED SPECIES* 240–47 (1995); Andrew P. Morriss & Richard L. Stroup, *Quartering Species: The "Living Constitution," the Third Amendment, and the Endangered Species Act*, 30 ENVTL. L. 769, 786 (2000); Editorial, *Endangered Species Overreach*, WALL ST. J. (Aug. 19, 2019), <https://www.wsj.com/articles/endangered-species-overreach-11565995897>; Robert Gordon, *Correcting Falsely "Recovered" and Wrongly Listed Species and Increasing Accountability and Transparency in the Endangered Species Program*, HERITAGE FOUND. (Apr. 16, 2018), <https://www.heritage.org/environment/report/correcting-falsely-recovered-and-wrongly-listed-species-and-increasing> (last visited Feb. 19, 2020).

common refrain among the Act's opponents in Congress.⁶⁹ On the other hand, supporters of the Act cite recovery success stories such as the bald eagle, the gray wolf, whooping crane, peregrine falcon, grizzly bear, and gray whale.⁷⁰ They also point to the over 200 listed species that would have become extinct but for the protections afforded by the Act.⁷¹

With regard to the paucity of delistings, supporters typically stress the precarious condition of most species when they were listed, and the considerable time that it will take for most of them to recover.⁷² They also call attention to inadequate funding for the implementation of recovery plans,⁷³ and the fact that most recovery spending that does occur goes to support a disproportionately small group of species.⁷⁴ All too often, however, supporters of the ESA fail to mention one of the primary obstacles to delisting—the fact that not only must a species population recover, but protections must be put in place to ensure that the species' decline will not recur.⁷⁵ That, of course, is no simple task; in fact, it is, in many instances, “not a realistic expectation.”⁷⁶

Meanwhile, efforts are afoot in Congress to speed the delisting process. During the 115th Congress, a bill called the Less Imprecision in Species Treatment Act (LIST Act) was introduced in the House of Representatives with 30 cosponsors.⁷⁷ The bill would have eliminated the requirement to consider the inadequacy of existing regulatory mechanisms, which is currently required for delistings.⁷⁸ Instead, the bill would have directed the Fish and Wildlife Service to

69. See, e.g., Noah Greenwald et al., *Extinction and the U.S. Endangered Species Act*, PEERJ 1 (2019), <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6482936/pdf/peerj-07-6803.pdf> (referring to the “common refrain” among opponents in Congress who assert that the Act is a “failure because only 2% of the listed species have been fully recovered and delisted”); Erik Stokstad, *What's Wrong With the Endangered Species Act?*, 309 SCIENCE 2150, 2150 (Sept. 30, 2005).

70. See, e.g., Daniel M. Evans et al., *Species Recovery in the United States: Increasing the Effectiveness of the Endangered Species Act*, ISSUES IN ECOLOGY, Winter 2016, at 1, 2; *The Endangered Species Act Is Under Political Attack*, EARTHJUSTICE (Feb. 26, 2020) <https://earthjustice.org/features/endangered-species-act-under-attack>.

71. See, e.g., Evans et al., *supra* note 70, at 2; Greenwald, *supra* note 69, at 3.

72. See, e.g., Ketcham, *supra* note 6, at 6; Greenwald, *supra* note 69, at 1; Evans et al., *supra* note 70, at 3; Stokstad, *supra* note 69, at 2151.

73. See Evans et al., *supra* note 70, at 9–10; Stokstad, *supra* note 69, at 2152. Recovery efforts for the vast majority of species with recovery plans were severely underfunded between 1980 and 2014; see Leah R. Gerber, *Conservation Triage or Injurious Neglect in Endangered Species Recovery*, 113 PROC. NAT'L ACAD. SCI. 3563, 3566 (2016). Since the Tea Party revolution in 2010, federal funding per species has decreased even further after accounting for inflation. See Michael Evans, *The Importance of Properly Funding the ESA*, DEFENDERS WILDLIFE (Feb. 20, 2019), https://defenders-cci.org/analysis/ESA_funding/. The Fish and Wildlife Service's entire budget for species recovery in 2018 amounted to just \$91 million. See U.S. FISH & WILDLIFE SERV., BUDGET JUSTIFICATIONS AND PERFORMANCE INFORMATION FISCAL YEAR 2020 ES-10 (2020), <https://www.fws.gov/budget/2020/FY2020-FWS-Budget-Justification.pdf>.

74. See Evans et al., *supra* note 70, at 10; NOAH GREENWALD ET AL., CTR. FOR BIOLOGICAL DIVERSITY, *SHORTCHANGED: FUNDING NEEDED TO SAVE AMERICA'S MOST ENDANGERED SPECIES* 4, <https://www.biologicaldiversity.org/programs/biodiversity/pdfs/Shortchanged.pdf>.

75. See *supra* notes 20-25 and accompanying text (referring to 16 U.S.C. § 1533(a)(1)(D) (2018)).

76. Doremus, *supra* note 2, at 10446.

77. H.R. 6356, 115th Cong. (2018).

78. See *id.* § 2(a) (adding § 4(b)(9)(B) to § 4(b) of the ESA, 16 U.S.C. § 1533(b) and providing that delisting decisions under § 4(c)(2) of the ESA, 16 U.S.C. § 1533(c)(2), would no longer have to be

remove a species from the list in cases where the Service either “produced or received substantial scientific or commercial information demonstrating that the species is recovered or that recovery goals set for the species . . . have been met.”⁷⁹ The LIST Act has been introduced once again, this time by Representative Gianforte, with four co-sponsors in the 116th Congress.⁸⁰ Such efforts, if successful, would spare many landowners from the “burdensome” regulatory strictures provided by the ESA, but it would also create a scenario in which countless species would likely slide back down to the fragile condition that prompted their listings in the first place.

V. CONCLUSION

The ESA is not short-term medicine for most species. Delisting would not end the management and regulatory pain for most species.⁸¹ Most will only be properly delisted if some active conservation mechanism is created that would take the place of the protective shield provided by the Act, a prospect that appears unlikely for most species, at least in the foreseeable future.⁸²

Delisting is thus an exceedingly poor way to judge the success of the ESA since delisting is a nearly impossible ambition, at present, for most species. To ignore that fact plays into the arms of those who would like to remove species from listing as quickly as possible by resorting to biological criteria alone. Those who support the Act should not fall into that trap.

Polls and studies conducted over the past two decades reveal a consistently high level of support for the ESA among Americans.⁸³ Support has ranged from a low of 79 percent to a high of 90 percent, while opposition has varied from 7 percent to 16 percent.⁸⁴ Nevertheless, much of this support may be symbolic and subject to erosion in the face of repetitive attacks on the Act in Congress and the media.

To guard against the whittling away of support among members of the public and in Congress, those who are committed to the goals enshrined in the ESA should endeavor to better frame what constitutes success under the Act. Delisting does not necessarily connote success since most of the patients will likely require care for decades to come. The threats posed by habitat degradation, exotic species, and climate change are not going away, and many will intensify. Some form of regulation or management, within or without the Act, will remain necessary for

made in accordance with ESA § 4(a), 16 U.S.C. § 1533(a), including consideration of the inadequacy of existing regulatory mechanisms).

79. *Id.* § 2(a) (adding § 4(b)(9)(B) to § 4(b) of the ESA, 16 U.S.C. § 1533(b)). Such delisting decisions would no longer be made pursuant to notice and comment rulemaking but instead would “consist solely of a notice of such removal.” *Id.* (adding § 4(b)(9)(C) to ESA § 4(b), 16 U.S.C. § 1533(b)).

80. See H.R. 5579, 116th Cong. (2d Sess. 2020).

81. See Doremus, *supra* note 2, at 10446.

82. See *supra* notes 52-58 and accompanying text.

83. See Jeremy T. Bruskotter et al., *Support for the U.S. Endangered Species Act Over Time and Space: Controversial Species Do Not Weaken Public Support for Protective Legislation*, 11 CONSERVATION LETTERS 1, 3-4 (2018), <https://doi.org/10.1111/conl.12595>.

84. *Id.* at 3.

most species. Recovery, in short, must be sustainable; this is “the new norm,” as Dale Goble put it.⁸⁵ Both the public and our political leadership must come to know this fact if our society is ever going to confront the true magnitude of the challenge we face. “We have become nature and must accept the responsibilities that come with the role.”⁸⁶

85. Goble, *A Fish Tale*, *supra* note 4, at 362.

86. *Id.*