THE GEORGE WASHINGTON UNIVERSITY

WASHINGTON, DC

Public Interest Comment[1] on

The U.S. Army Corps of Engineers and Environmental Protection Agency's Proposed Rule:

Revised Definition of "Waters of the United States"

Docket ID No. EPA-HQ-OW-2018-0149

RIN: 2040-AF75

April 15, 2019

Jonathan H. Adler[2]

The George Washington University Regulatory Studies Center

The George Washington University Regulatory Studies Center improves regulatory policy through research, education, and outreach. As part of its mission, the Center conducts careful and independent analyses to assess rulemaking proposals from the perspective of the public interest. This comment on the U.S. Environmental Protection Agency (EPA) and U.S. Army Corps of Engineers' (Army Corps) proposed rule revising the definition of "waters of the United States" under the Clean Water Act (CWA) does not represent the views of any particular affected party or special interest. In evaluating this proposed rule, this comment draws upon the author's prior research and analysis of the scope of federal regulation under the CWA and related questions of environmental law and policy.[3]

---

[1] This comment reflects the views of the author, and does not represent an official position of the GW Regulatory Studies Center or the George Washington University. The Center's policy on research integrity is available at http://regulatorystudies.columbian.gwu.edu/policy-research-integrity.

[2] Johan Verheij Memorial Professor of Law and Director, Center for Business Law and Regulation, Case Western Reserve University School of Law; Senior Fellow, Property & Environment Research Center.

[3] In particular, this comment draws upon the following papers by the author:

- *Wetlands, Property Rights, and the Due Process Deficit in Environmental Law*, 12 CATO SUP. CT. REV. 139 (2012).

Introduction

In this rulemaking, the EPA and Army Corps are attempting to bring clarity to the muddy debate over the scope of federal regulatory jurisdiction under the CWA. In particular, the two agencies are proposing a new definition of "waters of the United States," to replace the definition adopted by these same two agencies in 2015. This new definition will identify the scope of waters and related lands that are subject to federal regulation under the CWA.

As proposed, "waters of the United States" would be interpreted to encompass all those waters traditionally considered to be "navigable waters," tributaries to such waters, some lakes, ponds, and ditches, and wetlands adjacent to all such waters. It would not, however, include "interstate waters" as a distinct category of water subject to federal jurisdiction. The proposed definition is both more clearly defined and more circumscribed than that promulgated by the Army Corps and EPA in 1986 and 2015. As such, this definition is more consistent with the text of the CWA and applicable Supreme Court precedent than prior definitions.

According to the agencies, the proposed rule is intended to increase the "predictability and consistency" of jurisdictional determinations by "increasing clarity" as to what constitute "waters of the United States" subject to federal regulation. Decades of litigation and legal conflict over the proper scope of CWA jurisdiction has produced substantial uncertainty as to the precise scope of federal regulation. Although there is no way to prevent additional litigation over the scope of federal regulatory jurisdiction, the agencies are attempting to develop a definition that comports with the Constitutional and statutory limits on federal regulatory authority while simultaneously advancing the CWA's environmental protection purposes. The new definition is also intended to facilitate achievement of the CWA's stated goals of restoring and maintaining the quality of covered waters while respecting the longstanding role of state, local, and tribal governments in regulating local land-use and protecting water resources.

In reviewing comments on the proposed revised definition and developing a final rule, to define "waters of the United States" under the CWA, the agencies should keep three principles in mind:

- First, the agencies' regulatory power is circumscribed by the constitutional limits on federal power, as well as the limits of the power delegated to the agencies by Congress

---

- *When Is Two a Crowd: The Impact of Federal Action on State Environmental Regulation*, 31 HARV. ENVTL. L. REV. 67 (2007).
- *Reckoning with* Rapanos*: Revisiting "Waters of the United States" and the Limits of Federal Wetland Regulation*, 14 MO. ENVTL. L. & POL'Y REV. 1 (2006).
- *Jurisdictional Mismatch in Environmental Federalism*, 14 NYU ENVTL L.J. 130 (2005).
- *Judicial Federalism and the Future of Federal Environmental Regulation*, 90 IOWA L. REV. 377 (2005).
- *The Ducks Stop Here? The Environmental Challenge to Federalism*, 9 SUP. CT. ECON. REV. 205 (2001).
- *Wetlands, Waterfowl, and the Menace of Mr. Wilson: Commerce Clause Jurisprudence and the Limits of Federal Wetlands Regulation*, 29 ENVTL. L. 1 (1999).

under the CWA. The power to regulate "waters of the United States" is not the power to regulate all water resources with environmental significance.

- Second, insofar as the statutory phrase "waters of the United States" is ambiguous, Congress has delegated to the agencies the authority to make a reasoned policy judgment about how this term should be defined. Thus, any definition of "waters of the United States" necessarily embodies a policy judgment by the agencies.
- Third, in exercising their regulatory jurisdiction, the agencies should focus on those areas where there is the greatest *federal* interest, including those areas where federal regulation is most necessary to supplement the environmental protection efforts of state, local and tribal governments and non-governmental entities. Such a focus is likely to maximize the value of federal regulation under the CWA and facilitate greater environmental protection efforts by non-federal actors.

Based upon these criteria, the proposed revision to the definition of the "waters of the United States" is a significant improvement over prior definitions, including that adopted in 2015. If the definition contained in the final rule is similar to that which has been proposed, it is likely to provide greater legal certainty for the regulated community and is likely to be less vulnerable to legal challenge than were prior definitions. Additional refinements to the rule and greater consideration of those areas in which the federal government has a comparative advantage in regulating could help focus federal regulatory efforts and do more to maximize the benefits of federal regulation in this area. Such refinements should not come at the expense of clarity and legal certainty, nor should they risk extending the assertion of federal regulatory jurisdiction beyond what is authorized by the CWA or is permissible under the Constitution.

Statutory Authority

This proposed rule is intended to help implement the CWA by defining the scope of federal regulatory jurisdiction under the statute. This regulatory jurisdiction is confined to the "waters of the United States."

The CWA prohibits "the discharge of any pollutant by any person" without an applicable permit.[4] "Discharge of any pollutant" is defined as "any addition of any pollutant to navigable waters from any point source,"[5] and the term "pollutant" is defined broadly to include dredged material, rock, sand, solid and industrial waste, and chemical waste, among other things.[6]

---

[4] 33 U.S.C. §1311(a).

[5] 33 U.S.C. §1362(12). The full definition reads:

> The term "discharge of a pollutant" and the term "discharge of pollutants" each means (A) any addition of any pollutant to navigable waters from any point source, (B) any addition of any pollutant to the waters of the contiguous zone or the ocean from any point source other than a vessel or other floating craft.

[6] 33 U.S.C. §1362(6).

Of particular importance to this rulemaking, the CWA defines "navigable waters" as "waters of the United States."[7] Although the CWA identifies the congressional purposes that motivated the statute's passage, the law itself does not otherwise define the scope this term.

As the Supreme Court has recognized, the decision to define "navigable waters" as "waters of the United States" indicates Congress's intent to reach beyond those waters that are navigable-in-fact. At the same time, the Court has also indicated that the reverence to navigability and Congress's failure to explicitly assert CWA jurisdiction over all waters, water resources, and related lands *within* the United States indicates that not all waters are subject to CWA jurisdiction. Thus, for example, an isolated intrastate pond is not included within the "waters of the United States" even though it constitutes a "water" and is *within* the United States.[8]

In *Solid Waste Agency of Northern Cook County v. U.S. Army Corps of Engineers* ("*SWANCC"*), the Supreme Court rejected the agencies' assertion of CWA jurisdiction over waters that lacked a "significant nexus" to navigable waters.[9] Whereas the "significant nexus" between navigable waters and adjacent wetlands was sufficient for the Court to affirm the agencies' interpretation of "waters of the United States," as applied to such lands, in *United States v. Riverside Bayview Homes*,[10] the lack of such a nexus precluded approving the agencies' assertion of jurisdiction in *SWANCC*. Insofar as the agencies' interpretation of the CWA allowed them to assert regulatory authority over waters lacking a "significant nexus" to navigable waters, that interpretation went beyond what was statutorily authorized.

In *Rapanos v. United States* the Supreme Court reaffirmed the central holding of *SWANCC,* albeit by a divided court.[11] In particular, the plurality and separate opinion by Justice Kennedy both embraced the Court's conclusion in *SWANCC* that "waters of the United States" only extend to those waters and wetlands that have a "significant nexus" to truly navigable waters and are "inseparably bound up with the 'waters' of the United States."[12] Although the two opinions comprising the *Rapanos* majority differed in some respects, they both reaffirmed the existence of meaningful limits on federal regulatory jurisdiction and the importance of construing federal jurisdiction narrowly so as to avoid potential constitutional concerns. As Justice Kennedy noted in his concurrence, one purpose of the "significant nexus" requirement is to "prevent[] problematic applications of the statute.[13]

---

7 33 U.S.C. §1262(7).

8 *See* Solid Waste Agy of N. Cook County v. U.S. Army Corps of Eng'rs (SWANCC), 531 U.S. 159 (2001) (holding that "waters of the United States" does not extend to isolated waters and wetlands).

9 *Id.*

10 474 U.S. 121 (1985).

11 547 U.S. 715 (2006).

12 *SWANCC*, 531 U.S. at 168 (quoting *United States v. Riverside Bayview Homes*, 474 U.S. 121, 134 (1985)).

13 547 U.S. at 743 (Kennedy, J., concurring in the judgment).

As the Supreme Court's decisions reviewing the agencies' interpretations of "waters of the United States" indicates, the existence of a "significant nexus" to navigable waters helps identify the outermost limit of the agencies' regulatory jurisdiction under the CWA. A "significant nexus" marks the outermost limit of federal regulatory jurisdiction. The existence of such a nexus does not, by itself, require federal regulation.

Where the agencies have put forward an interpretation of "waters of the United States" to reach waters or wetlands lacking such a nexus, the assertion of jurisdiction has been rejected. The Court has reached this conclusion on both statutory and constitutional avoidance grounds. As noted in both *SWANCC* and *Rapanos v. United States*, the assertion of regulatory jurisdiction over waters that lack a significant nexus risks exceeding the scope of the federal government's enumerated powers, and the CWA should not be interpreted to justify such assertions of authority.

The scope of "waters of the United States" is somewhat ambiguous, indicating that Congress has delegated authority to the Army Corps and EPA to determine the precise boundaries of their jurisdiction under the act, provided that their conclusions are based upon a permissible interpretation of the relevant statutory text. Under the well-established framework created by *Chevron U.S.A. v. Natural Resources Defense Council*, where Congress has left gaps or ambiguities in a statute, it is generally presumed to have delegated authority to the administering agency (or, in this case, agencies) to resolve such ambiguities and fill such gaps in the process of issuing regulations and otherwise implementing the required regulatory scheme.[14]

Here, Congress authorized the regulation of the discharge of pollutants into "navigable waters," and defined such waters simply as "waters of the United States." In doing so, Congress expressly failed to delineate the precise boundaries of federal regulatory jurisdiction. Therefore, Congress has delegated to the EPA and Army Corps substantial authority to determine the precise scope of federal jurisdiction under the CWA.[15]

The task before the agencies is not to try and identify the best semantic interpretation of "waters of the United States." Nor is it to identify a set of scientifically derived criteria to establish an "objective" basis for federal jurisdiction under the CWA. Rather, the agencies are to adopt a definition that is both consistent with the statutory text as well as with the agencies' reasoned judgment as to how best to fulfill the legislative purposes of the CWA. While scientific analysis of the interconnection among waters and wetlands is relevant to this process, such analyses are not dispositive. Ultimately, the agencies are tasked with making a policy judgment. As the Supreme Court explained in *Chevron*, "an agency to which Congress has delegated policy-making

[14] *See* Chevron U.S.A. Inc. v. Natural Resources Defense Council, Inc., 467 U.S. 837 (1984).

[15] There is an argument that *Chevron* deference should not extend to matters that relate to the existence or scope of an agency's regulatory jurisdiction. *See*, *e.g.*, Jonathan H. Adler & Nathan A. Sales, *The Rest Is Silence: Chevron Deference, Agency Jurisdiction, and Statutory Silences*, 2009 UNIV. ILL. L. REV. 1497 (2009). In 2013, however, the Supreme Court rejected this argument. *See City of Arlington v. FCC*, 569 U.S. 290 (2013).

responsibilities may, within the limits of that delegation, properly rely on the incumbent administration's views of wise policy to inform its judgments."[16]

Justice Kennedy's concurring opinion called upon the agencies to identify those types of waters or those ecological features that can reasonably be assumed to have a sufficient nexus to navigable waters to justify the assertion of jurisdiction under the Act. While the plurality is somewhat more restrictive, it likewise acknowledged the role of the agencies in determining the scope of "waters of the United States." While identifying greater restrictions within the statutory text than did Justice Kennedy, the plurality nonetheless acknowledged that there is "an inherent ambiguity in drawing the boundaries of any 'waters,'"[17] and rather than declare that the statutory text resolved all questions, rejected the agencies' assertion of jurisdiction because it was "not 'based on a permissible construction of the statute.'"[18] Chief Justice Roberts, who joined the plurality, also wrote separately to underscore the point that the relevant statutory phrase is sufficiently ambiguous for the Army Corps to "enjoy[] plenty of room to operate in developing some notion of an outer bound to the reach of their authority."[19]

Scientific research can, indeed must, inform the agencies assessment of which waters are so inseparably bound up with navigable waters or otherwise implicated by interstate water pollution as to require their regulation as "waters of the United States." Yet science does not, itself, determine which connections are "significant" for the purposes of asserting federal regulatory jurisdiction under the CWA. As the agencies have themselves acknowledged in proposing the 2015 definition of "waters of the United States":

> "Significant nexus" is not itself a scientific term. The relationship that waters can have to each other and connections downstream that affect the chemical, physical, or biological integrity of traditional navigable waters, interstate waters, or the territorial seas is not an all or nothing situation. The existence of a connection, a nexus, does not by itself establish that it is a "significant nexus." There is a gradient in the relation of waters to each other.[20]

As the agencies further explained when finalizing the 2015 rule:

> …the science does not point to any particular bright line delineating waters that have a significant nexus from those that do not. The Science Report concluded that

[16] Chevron, 467 U.S. at 865.

[17] *Rapanos*, 547 U.S. at 740; *see also id.* at 742.

[18] *Id.* at 739 (*quoting* Chevron USA v. NRDC, 467 U.S. 837, 843 (1984)).

[19] *Id.* at 758 (Roberts, C.J. concurring).

[20] Definition of "Waters of the United States" Under the Clean Water Act, 79 FR 22188.

> connectivity of streams and wetlands to downstream waters occurs along a gradient.[21]

If a line is to be drawn demarcating the end of federal regulatory jurisdiction, it will ultimately have to be based upon legal and policy concerns. It is permissible for the agency to prefer a clearer and more predictable bright-line rule, such as is provided by portions of the proposed rule, provided the agencies offer a reasoned explanation of their choice and the resulting regulation rests upon a permissible interpretation of the relevant statutory provisions, in this case the phrase "waters of the United States." Just as the EPA in *Chevron* was allowed to adopt a more flexible interpretation of the phrase "stationary source" under the Clean Air Act, the EPA and Army Corps are permitted to adopt a narrower interpretation of the phrase "waters of the United States." Further, as indicated in *Chevron* and subsequent Supreme Court decisions, the fact that prior administrations have reached different policy conclusions and adopted different statutory interpretations does not prevent the agencies from making a different choice today, provided that they acknowledge the change in policy and otherwise engage in reasoned decision-making.[22]

Nowhere in *SWANCC* or *Rapanos* did justices in the majority claim that the agencies are required to regulate all waters or wetlands that may have a hydrological or ecological connection to navigable waters. Both opinions made clear that a demonstrated hydrological or ecological connection between a given water or wetland and navigable waters, by itself, is insufficient for the assertion of federal regulatory authority. Thus, in revising the proposed definition of "waters of the United States," the agencies should be sure not to assert jurisdiction beyond those waters or wetlands that can be reasonably assumed to have a "significant nexus" to navigable waters, yet the mere existence of a connection that may be characterized as "significant" does not necessarily require the assertion of jurisdiction.

While the plurality opinion and Justice Kennedy's concurrence in *Rapanos* recognized limits on the scope of federal jurisdiction under the CWA, these opinions nonetheless left the agencies with substantial leeway in defining "waters of the United States" going forward, provided that the relevant statutory and constitutional constraints are observed.

---

[21] Clean Water Rule: Definition of "Waters of the United States", 80 FR 37054.

[22] In making this point, the proposed rule mis-cites one of the applicable legal authorities. At 84 FR 4169, the agencies cite *Nat'l Ass'n of Home Builders v. EPA*, 682 F.3d 1032, 1038 & 1043 (D.C. Cir. 2012) (citing *FCC v Fox Television*, 556 U.S. 502, 514-15 (2009) (Rehnquist, J.,, concurring in part and dissenting in part)) for the proposition that "'[a] change in administration brought about by the people casting their votes is a perfectly reasonable basis for an executive agency's reappraisal' of its regulations and programs." While this quotation does come from an opinion by Justice Rehnquist, it is not from the *Fox* decision (which was decided after Chief Justice Rehnquist's death).Rather, as indicated in the D.C. Circuit's *NAHB* decision, this quotation is from Justice Rehnquist's separate opinion in *Motor Vehicle Mfrs. Ass'n v. State Farm Mut. Auto. Ins. Co.*, 463 U.S. 29 (1983). *See id.* at 59(Rehnquist, J., concurring in part and dissenting in part). This error is repeated at 84 FR 4195.

Maximizing the Value of Federal Regulation

Under well-established principles, embodied in EO 12866 on Regulatory Planning and Review:

> Federal agencies should promulgate only such regulations as are required by law, are necessary to interpret the law, or are made necessary by compelling public need, such as material failures of private markets to protect or improve the health and safety of the public, the environment, or the well-being of the American people. In deciding whether and how to regulate, agencies should assess all costs and benefits of available regulatory alternatives, including the alternative of not regulating.[23]

In the context of defining the scope of CWA jurisdiction, one question the agencies should consider is the extent to which federal regulation is necessary to supplement the environmental protection efforts engaged in by state, local, and tribal governments (in addition to non-governmental conservation organizations).

Federal regulatory resources are necessarily limited. As a consequence, regulatory agencies can maximize the benefits of their regulatory efforts insofar as they concentrate or target their efforts where federal intervention is likely to do the most good, and the least harm. Accordingly, federal regulatory resources are best utilized if they are targeted at those areas where there is an identifiable *federal* interest or where the federal government is in a particularly good position to advance environmental protection, particularly given available alternatives. For example, there is an undeniable federal interest in regulating the filling or dredging of wetlands where such activities would cause or contribute to interstate pollution problems or compromise water quality in interstate waterways. Where the effects of wetland modification are more localized, the federal interest is less clear. Not coincidentally, in the latter case, the basis for federal jurisdiction is also more attenuated.

Federal regulation of private conduct is not the only means for protecting water quality and conserving wetlands. Both prior to and since the enactment of the CWA, state and local governments have been active participants in water quality protection and wetland conservation efforts. Federal regulation, while often filling needed gaps in the protection offered by state and local governments, also has the potential to hamper or discourage such efforts and compromise the discovery process that can result from allowing different jurisdictions to experiment with different approaches to common problems.[24]

---

[23] Exec. Order No. 12866, Regulatory Planning and Review, §1(a).

[24] For an extended discussion of how federal regulation can influence state-level regulation see Adler, *When Is Two a Crowd?*, at 81-106.

The importance of considering non-federal regulation was stressed in OMB Circular A-4, which noted:

> The advantages of leaving regulatory issues to State and local authorities can be substantial. If public values and preferences differ by region, those differences can be reflected in varying State and local regulatory policies. Moreover, States and localities can serve as a testing ground for experimentation with alternative regulatory policies. One State can learn from another's experience while local jurisdictions may compete with each other to establish the best regulatory policies.[25]

In order to ensure that the agencies are fulfilling a genuine environmental need, and not adopting a more expansive definition of the "waters of the United States" than is necessary, the agencies should consider the extent to which non-federal entities can and are likely to engage in relevant environmental protection efforts and, to the extent that such non-federal efforts are insufficient to meet the stated goals of the CWA, how federal resources and assertions of jurisdiction may be focused so as to maximize their relative contribution. The value of federal regulation in this area will be maximized by focusing federal resources on those waters and resources least likely to be protected or conserved by non-federal actors.

In considering the extent to which federal intervention is necessary or desirable, distinguishing between different potential justifications for federal intervention is important. In particular, just as EO 12866 anticipates that agencies will consider when "market failure" justifies government regulation, the EPA and Army Corps should consider the extent to which non-federal actors, including state, local, and tribal governments, will "fail" to engage in sufficient environmental protection efforts.[26]

In the context of water pollution control and wetland conservation, there are several different possible rationales for federal intervention. Perhaps the most prominent, and most well-substantiated, is the claim that state and local governments are unlikely to provide sufficient levels of environmental protection due to the presence of interstate spillovers, such as occurs when pollution crosses state lines and when resources span across multiple jurisdictions.

Where activity in State A causes pollution in State B, there is an almost unimpeachable case for federal involvement, even if only to adjudicate the relevant dispute.[27] While one may reasonably

---

[25] Office of Management and Budget, Circular A-4, "Regulatory Analysis" (Sept. 17, 2003) at 6; *see also* Exec. Order 13132, Federalism.

[26] *Id.*

[27] *See, e.g.*, Thomas W. Merrill, *Golden Rules for Transboundary Pollution*, 46 DUKE L.J. 931 932 (1997) ("Given the inherent difficulties in regulation by any single state, transboundary pollution would seem to present a clear

expect State A to adopt measures to control the environmental costs of economic activity within State A, policymakers have little reason to be concerned with the harms imposed on other jurisdictions. As a consequence, State A is unlikely to adopt sufficient controls to prevent environmental harm within State B because it would bear the primary costs of any such regulatory measures, whereas the primary beneficiaries of such controls would be elsewhere. Indeed, absent some external controls or dispute resolution system, the presence of interstate spillovers can actually encourage polices that externalize environmental harms, such as subsidizing development near jurisdictional borders so as to ensure that environmental harms fall disproportionately "downstream." Policymakers in State B may wish to take action, but they will be unable to control pollution created in State A without the cooperation of State A. Even where polluting activity imposes substantial environmental harm within State A, the externalization of a portion of the harm is likely to result in the adoption of less optimal environmental controls.

Not all spillovers take the form of State A externalizing the costs of polluting activities onto State B. In some cases, States A and B share in a common resource, such as a watershed or airshed. In such contexts the spillover effect is reciprocal, insofar as each state that shares in the common resource has the ability to externalize the effects of its polluting or resource depleting activities on the others, and a "tragedy of the commons" is likely to result. [28] As with the more direct spillover, however, one cannot reasonably expect states, acting alone, to adopt welfare-enhancing environmental protections as the regulating state will bear a disproportionate share of the costs from such regulation with no guarantee of reaping proportionate benefits. While interstate compacts and other mechanisms are sometimes available to facilitate the management and protection of cross-boundary resources, some form of federal intervention may be necessary to ensure the proper level of environmental protection.

Because of the particular problems that result from interstate spillovers, and the incentives faced by states that share transboundary or interstate water resources, the EPA and Army Corps should pay particular attention to whether the proposed rule provides adequate protection for interstate waters. As proposed, the revised definition of "waters of the United States" does not specifically identify interstate waters as "waters of the United States." This omission is potentially concerning on both statutory and policy grounds.

On statutory grounds, it would seem that of all non-navigable waters, those that touch and concern more than one state fit more securely within the definition of "waters of the United States" than those contained wholly within a single state. The latter may simply be "waters of the state." The former cannot.

---

case for shifting regulatory authority from local to more centralized levels of governance."); Richard Revesz, *Federalism and Interstate Environmental Externalities*, 144 U. PA. L. REV. 2341 (1996).

[28] *See generally* Garrett Hardin, *The Tragedy of the Commons*, 162 SCI. 1243 (1968).

On policy grounds, there are strong reasons to believe that interstate waters are among those waters most vulnerable in the absence of federal regulation. Therefore, insofar as the Army Corps and EPA seek to maximize the net benefits of regulation under the CWA, particular attention should be made to the decision to omit special consideration for interstate waters.

It may be true, as noted in the proposed rule, that most interstate waters will be otherwise included within the definition of the "waters of the United States." Yet the agencies also acknowledge the lack of any firm analytical foundation for this presumption. Given that interstate waters are readily included within the statutory phrase and that the nature of transboundary resources makes federal action particularly appropriate, the agencies should reconsider the exclusion of interstate waters as a separate category within "waters of the United States." If, as the agencies admit, they "lack the analytical ability" to determine the implications of this omission, it is not clear that this aspect of the definition would satisfy the requirements of reasoned decision-making.

A second argument that is made for federal regulatory intervention is that in the absence of federal regulation, interstate competition will result in suboptimal regulation across jurisdictions as states "race to the bottom." Unlike the concern for spillovers and transboundary resources, interjurisdictional competition does not counsel in favor of a more expanded federal regulatory role.

The race-to-the-bottom theory presumes that interjurisdictional competition creates a prisoner's dilemma for states. Each state wants to attract industry for the economic benefits that it provides. Each state also wishes to maintain an optimal level of environmental protection. However, in order to attract industry, the theory holds, states will lower environmental safeguards so as to reduce the regulatory burden they impose upon firms. This competition exerts downward pressure on environmental safeguards as firms seek to locate in states where regulatory burdens are the lowest, and states seek to attract industry by lessening the economic burden of environmental safeguards. Because the potential benefits of lax regulation are concentrated among relatively few firms, these firms can effectively oppose the general public's preference for environmental protection regulation. This will lead to social welfare losses even if environmental harm does not spill over from one state to another.

The race-to-the-bottom argument is probably the most common argument for federal environmental regulation, particularly for wholly or largely intrastate environmental problems, such as local air or water quality. Despite its currency, the theory has been subject to substantial criticism, and empirical evidence that interjurisdictional competition produces downward pressure on state-level environmental regulations is almost wholly absent. As documented in recent literature reviews, there is little evidence for any race-to-the-bottom in environmental regulation,

and some evidence (albeit limited) that the adoption of environmental measures in one state increases the likelihood of the adoption of similar measures by neighboring states.[29]

State regulatory behavior does not suggest the existence of a race to the bottom in the context of water quality or wetland protection. Focusing on wetlands, if the race-to-the-bottom theory were accurate, one would expect states to lag behind the federal government in developing programs to protect wetlands, and states with the greatest proportion of wetlands to be slower to protect wetlands than those with a lower proportion of wetlands. Assuming that limiting the use and development of wetlands imposes costs on industry and discourages economic investment, these costs will be greatest in states with the greatest proportion of wetlands that might be burdened by regulation. At the same time, the marginal cost of developing an acre of wetlands will be less in states with the greatest proportion of wetlands because such development will have a smaller proportionate impact on that state's wetland inventory and, presumably, the ecological benefits that the wetlands provide. From this one can outline a testable hypothesis: "As a general rule, the larger a state's wetland inventory, the more important it is to the nation, but the less important saving it may appear to the state itself—indeed, the more onerous the burden of protecting it will appear."[30]

The history of state wetland regulation, however, paints quite a different picture. Not only did states not wait for the federal government to begin regulating wetlands, but the order in which states began to act is the precise opposite of what the race-to-the-bottom theory would predict.[31] Specifically, those states with the largest wetland acreages tended to regulate first, where as those states with less wetland acreage regulated later, if at all. Further, despite the existence of federal wetland regulation since 1975, many states have adopted programs that reach beyond federal requirements. The observed pattern of state regulation seems to be driven as much by local knowledge and experience with the value of ecological resources as it is by any interstate competitive pressures. More broadly, there is evidence that state and other efforts to address water pollution began to produce benefits prior to the enactment of the CWA.[32] However inadequate

---

[29] *See* Daniel L. Millimet, *Environmental Federalism: A Survey of the Empirical Literature*, 64 CASE W. RES. L. REV. 1669 (2014); Bruce G. Carruthers and Naomi R. Lamoreaux*, Regulatory Races: The Effects of Jurisdictional Competition on Regulatory Standards*, 54 J. ECON. LIT. (2016); *see also* PAUL TESKE, REGULATION IN THE STATES (2004); Richard L. Revesz, *Rehabilitating Interstate Competition: Rethinking the 'Race to the Bottom' Rationale for Federal Environmental Regulation*, 67 N.Y.U. L. REV. 1210 (1992).

[30] Oliver A. Houck & Michael Rolland, *Federalism in Wetlands Regulation: A Consideration of Delegation of Clean Water Act Section 404 and Related Programs to the States*, 54 MD. L. REV. 1242, 1253 (1995).

[31] This history is summarized in Adler, *Wetlands, Waterfowl and Mr. Wilson*, at 41-54.

[32] *See, e.g.*, David A. Keiser & Joseph S. Shapiro, *Consequences of the Clean Water Act and the Demand for Water Quality*, NBER Working Paper No. 23070 (June 2018); *see also* A. Myrick Freeman, *Water Pollution Policy*, in *Public Policies for Environmental Protection* 114 (Paul Portney ed., 1990)(noting pre-CWA improvements in water quality).

such efforts may have been, the history does not support a presumption that interjurisdictional competition is a barrier to non-federal environmental protection efforts.

Adopting a clear definition of "waters of the United States" that provides regulatory certainty is not only beneficial for the regulated community. It may also help facilitate environmental conservation efforts by non-federal actors, including state and local governments. State policymakers are more likely to act when they are more certain of the potential benefits of their interventions. Insofar as the agencies would like non-federal actors to help fill any gaps created by legal limits on federal jurisdiction, they should provide a clear and stable definition of "waters of the United States" so that state and local policymakers are able to identify where their respective efforts are most needed and will be the least duplicative.

Conclusion

The proposed revision of the definition of "waters of the United States" is a substantial improvement over prior definitions, not least because it acknowledges the statutory and constitutional limits on federal regulatory jurisdiction under the CWA and takes seriously the need for greater clarity and certainty about the scope of federal regulatory jurisdiction. In reviewing comments and revising this proposal, the agencies should acknowledge that the decision to adopt a particular definition of "waters of the United States" is ultimately a policy decision, albeit a policy decision informed by statutory text and scientific understanding. The agencies should resist efforts to re-extend their assertion of jurisdiction beyond that which has been clearly authorized by Congress under the CWA, as interpreted by the Supreme Court. Similarly, the agencies should resist pressure to muddy the definition of "waters of the United States," as a lack of clarity in the definition will generate needless uncertainty, which can itself discourage environmental protection efforts by non-federal actors. The agencies should also reconsider whether failing to include "interstate waters" as a category of waters subject to regulation is consistent with the text and purpose of the CWA, and use the definition of "waters of the United States" to help focus federal regulatory efforts where federal intervention is most necessary and most beneficial.