

## ENVIRONMENT

# Redefining “Waters of the United States”

## *Can the Trump administration constrain wetland regulation?*

BY JONATHAN H. ADLER

**D**uring the 2016 presidential campaign, Donald Trump promised to “eliminate the unconstitutional Waters of the U.S. rule” and constrain federal regulation of private land use. According to then-candidate Trump, the Obama administration’s 2015 regulation defining “waters of the United States” under the Clean Water Act (CWA)—the so-called WOTUS rule—was “so extreme that it gives federal agencies control over creeks, small streams, and even puddles or mostly dry areas on private property.” While guaranteeing “crystal clear” water under his administration, Trump also pledged to lessen the federal regulatory burden on landowners.

Two years into the president’s term, the Environmental Protection Agency and the U.S. Army Corps of Engineers are trying to make good on Trump’s promise. In December 2018, the two agencies proposed a revised WOTUS definition that would significantly curtail federal regulatory jurisdiction under the CWA. If the effort is successful, it could clear the muddy waters of the federal government’s regulatory reach. The effort to rewrite WOTUS will also be a test of the Trump administration’s ability to navigate the shoals of the administrative process in pursuit of its deregulatory goals.

### “WATERS OF THE UNITED STATES”

The precise scope of the federal government’s regulatory authority under the CWA has been a source of conflict, confusion, and litigation since the law’s enactment in 1972. The CWA prohibits “the discharge of any pollutant by any person” without an appli-

cable permit from the EPA, Army Corps, or approved state agency. “Discharge of any pollutant” is defined as “any addition of any pollutant to navigable waters from any point source,” and the term “pollutant” is defined broadly to include dredged material, rock, sand, solid and industrial waste, and chemical waste, among other things. In other words, the CWA prohibits more than the dumping of sewage, sludge, or chemical waste into the nation’s waters.

The scope of the EPA and Army Corps’ regulatory authority is somewhat murky because the CWA defines “navigable waters” as “waters of the United States.” Although the CWA identifies the congressional purposes that motivated the statute’s passage, the law itself does not otherwise define the scope of this term, leaving the precise outer bounds of federal regulatory jurisdiction less than clear. On the one hand, Congress embraced ambitious environmental goals in the CWA’s statements of purpose. On the other hand, in the same text Congress reaffirmed its intent to “preserve, and protect the primary responsibilities” of states over their own land and water resources.

As the Supreme Court has recognized repeatedly, 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 reference 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 and wetlands within the nation’s borders are subject to CWA jurisdiction. Thus, for example, an intrastate pond lacking any discernible connection to a navigable waterway is not included within the “waters of the United States” even though it constitutes a “water” and is within the United States.

Beginning in the 1980s, the EPA and Army Corps began adopting an expansive interpretation of their own regulatory authority. In 1982, the agencies promulgated regulations purporting to reach all waters or wetlands “the use, degradation or destruction of which

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could affect interstate commerce,” including many waters and wetlands that were intermittent or ephemeral. At the same time, the agencies claimed the power to regulate all manner of activities that could result in the deposit of dirt or other fill material into or onto regulated waters and wetlands, including recreational activities.

The agencies’ excessive view of their own regulatory authority exceeded the bounds of what is constitutionally permissible, not to mention what was authorized by statute. The federal power to regulate “commerce ... among the states” reaches those activities with a “substantial effect” on interstate commerce, not those (as claimed by the agencies) that merely “could affect” interstate commerce. Even after the Supreme Court reaffirmed the constitutional limits on federal power in cases such as *United States v. Lopez*, it took some time for the EPA and Army Corps to learn this lesson.

In the early 2000s, landowner challenges to the expansive assertion of regulatory authority under the CWA eventually reached the Supreme Court. In two separate cases, the Court made clear

that the EPA and Army Corps needed to adopt a more restrained understanding of their own authority in order to satisfy both statutory and constitutional constraints.

In 2001, 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 a pond that had formed in an abandoned gravel pit. Because this water lacked a “significant nexus” to any navigable waters, the Court held, it lay beyond the EPA and Army Corps’ reach. Whereas the “significant nexus” between navigable waters and adjacent wetlands had been sufficient for the Court to affirm the agencies’ interpretation of “waters of the United States” as applied to such lands in an earlier case (*United States v. Riverside Bayview Homes*), the lack of such a nexus precluded approving the agencies’ assertion of jurisdiction in *SWANCC*.

The Supreme Court had sent the EPA and Army Corps a powerful message about the scope of their regulatory ambitions, but the agencies refused to listen. After briefly considering revising

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their regulations in light of the *SWANCC* opinion, the two agencies continued to assert broad regulatory authority throughout much of the country. The Army Corps and EPA issued a notice of proposed rulemaking to consider revising their jurisdictional regulations in 2003, but abandoned the effort in response to criticism from environmentalist and conservationist groups that feared a regulatory rollback.

Five years later, in *Rapanos v. United States*, the Supreme Court reaffirmed *SWANCC*'s core holding that regulatory jurisdiction under the CWA is limited. One of the parcels at issue in *Rapanos* was over 10 miles from the nearest navigable waterway. The Army Corps nonetheless claimed jurisdiction because water from wetlands on the site drained into a ditch that drained into a creek that, in turn, flowed into a navigable river. This, in the Army Corps' opinion, made the land subject to regulation as part of the "waters of the United States." Consequently, landowner John Rapanos faced criminal prosecution, up to five years in jail, and hundreds of thousands of dollars in fines for knowingly depositing fill material on the parcel without a federal permit.

Although no single opinion in *Rapanos* captured a majority of the Court, five justices agreed that the statutory phrase "waters of the United States" only extends 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." While the agencies and their environmentalist group supporters alleged that ecological connections across waters justified broad assertions of authority, Justice Anthony Kennedy explained in his concurrence that "environmental concerns provide no reason to disregard limits in the statutory text."

Although the two opinions compromising 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 Kennedy noted, one purpose of the "significant nexus" requirement is to "prevent[] problematic applications of the statute" such as those that could extend beyond the scope of the federal commerce power.

While Justice Antonin Scalia's 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 were observed.

### WOTUS IS POLICY, NOT SCIENCE

The *SWANCC* and *Rapanos* decisions reaffirmed the existence of meaningful limits on the scope of the CWA, but they also left a fair amount of uncertainty. It is one thing to recognize that the conferral of authority over "waters of the United States" only confers authority over those wetlands and other waters with a "significant nexus" to navigable waters. It is quite another to catalog the ecological and other criteria upon which a finding

of "significant nexus" can be made. The latter is a task agencies are equipped to handle and courts are not.

The precise meaning of "waters of the United States" is necessarily ambiguous. Congress could have provided a more detailed and specific definition, but did not. Accordingly, under the doctrine announced by the Supreme Court in *Chevron USA v. Natural Resources Defense Council*, Congress implicitly delegated to the agencies responsibility for resolving this ambiguity by providing a more precise definition. While the statutory language limits the agencies' discretion, it also leaves ample room to make a policy judgment about what waters should be subject to federal regulation.

Under *Chevron*, the task for 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.

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 WOTUS definition:

"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.

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.... Connectivity of streams and wetlands to downstream waters occurs along a gradient.

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, provided the agencies offer a reasoned explanation of their choice and the resulting regulation rests upon a permissible interpretation of the relevant statutory provisions. Just as the EPA was allowed to adopt a more flexible interpretation of the phrase "stationary source" under the Clean Air Act in *Chevron v. NRDC*, the EPA and Army Corps are permitted to adopt a narrower interpretation

of the phrase “waters of the United States.” 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 decisionmaking.

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, the agencies cannot assert jurisdiction beyond those waters or wetlands that can be reasonably assumed to have a “significant nexus” to navigable waters. On the other hand, because this is an outer limit on the scope of the agencies’ authority, the mere existence of an ecological or hydrological connection that may be characterized as “significant” *does not necessarily require* the assertion of jurisdiction. The agencies are not required to resolve the relevant statutory ambiguities in favor of more expansive federal regulation.

### THE WOTUS WARS

Although the Court’s *Rapanos* decision left open the possibility of a new rule defining the scope of CWA jurisdiction, it would be nearly a decade before such a rule would be in place. During the latter half of the George W. Bush administration and most of the Obama administration, the EPA and Army Corps were content to issue various guidance documents minimizing the extent to which the principles underlying *SWANCC* and *Rapanos* called for narrowing the scope of federal regulation. The agencies’ failure to respond to *SWANCC* or *Rapanos* with a new jurisdictional rule meant that the agencies were forced to engage in ad hoc case-by-case determinations about whether a given water or wetland was subject to federal regulation.

In 2014, the Army Corps and EPA finally proposed a WOTUS rule to bring clarity to CWA jurisdiction. This new WOTUS definition also sought to reclaim much of the regulatory jurisdiction cut back by the Supreme Court. Consistent with longstanding agency practice, the underlying premise of a new WOTUS definition seemed to be that the Army Corps and EPA best fulfill their environmental missions by casting the widest net possible. Maximizing environmental conservation under the Clean Water Act, the theory goes, requires maximizing federal regulatory authority.

Finalized in 2015, the Obama administration’s WOTUS rule did indeed cast a wide net. In addition to asserting jurisdiction over traditional categories of “waters” subject to regulation—such as waters capable of navigation, interstate waters, and the territorial seas—the rule adopted an expansive definition of tributaries and waters “adjacent” to navigable waters. For instance, virtually all waters within a riparian area or floodplain would be classified as “adjacent” to navigable waters and therefore subject to

federal regulation.

Unsurprisingly, the new rule prompted substantial controversy and near-immediate litigation. In August 2015, just as the new definition was set to take effect, the WOTUS rule was enjoined in a dozen states as a federal court concluded that the EPA and Army Corps had likely exceeded the scope of their statutory authority. Judge Ralph Erickson of the U.S. District Court for North Dakota concluded the agencies had adopted a definition that would enable the federal government to regulate “vast numbers of waters that are unlikely to have a nexus to navigable waters within any reasonable understanding of the term.” In addition, he was convinced the agencies arbitrarily asserted jurisdiction over waters based upon no more than their physical distance from navigable waters and had “failed to establish” a rational basis for the agencies’ claimed jurisdiction over remote and intermittent waters. To top it off, he also concluded the agencies likely violated some of their obligations under the Administrative Procedure Act.

Erickson was not alone in his skepticism of the lawfulness of the 2015 WOTUS rule. After a great deal of legal wrangling to determine which courts had jurisdiction to hear challenges to the rule—wrangling that reached the Supreme Court—federal judges in Georgia and Texas reached similar conclusions. By September 2018, the 2015 WOTUS rule was enjoined from operation in 28 of the 50 states.

### TRUMPING WOTUS

While legal challenges to the Obama administration rule proceeded in court, the Trump administration set about crafting its own rule. In February 2017, President Trump issued an executive order calling upon the EPA and Army Corps to reconsider the 2015 WOTUS rule and consider drafting an alternative definition of “waters of the United States” that would limit the scope of federal power and provide greater regulatory leeway for the states. With this order, the administration sought to demonstrate that it was fulfilling its campaign pledge, but it’s not that easy.

Issuing an executive order is relatively simple. Rescinding and replacing a major federal regulation is not. As a general matter, federal agencies must undertake the same lengthy process to repeal or revise a rule that was required to adopt the rule in the first place. For something like the definition of “waters of the United States,” this would mean several months of study and planning before even issuing a regulatory proposal, and then many more months of soliciting and evaluating public comments before imposing a final rule.

As with several of its other deregulatory efforts, the Trump administration was in a bit of a hurry. The administration proposed a rule to rescind the 2015 WOTUS definition in July 2017, but was not able to put forward its proposed alternative until December 2018. In the meantime, as the 2015 WOTUS rule was set to take effect, the Trump administration issued a separate rule—the so-called “suspension rule”—to delay the applicability

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date of the 2015 WOTUS rule until 2020, thereby buying time for the Army Corps and EPA to come up with a replacement. Yet the suspension rule was a bit rushed and lacked adequate legal support, leading to its rejection in federal court. As a consequence, by the end of 2018, about half the country (the 22 states not subject to the three judicial rulings) was subject to the 2015 WOTUS rule and the other half was subject to the murky pre-2015 jurisdictional morass left by *SWANCC* and *Rapanos*.

## A WOTUS REVISION

It early 2019, the Trump administration sought public comment on its proposed, narrower WOTUS rule. The proposed definition is far more restrictive than any previously adopted by the EPA and Army Corps, and would provide greater certainty about where federal regulatory authority ends and exclusive state and local authority begins. But just like the 2015 WOTUS rule, these revisions will almost certainly end up in court.

As proposed, “waters of the United States” would be interpreted to encompass all those waters traditionally considered to be “navigable waters,” tributaries that contribute perennial or intermittent flow 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, nor would it reach water features that flow only in response to precipitation or that are merely within a specified distance of navigable waters. It also expressly excludes various categories of waters that were potentially subject to regulation under prior rules, such as ephemeral water features, upland stormwater control features, artificially irrigated areas that would revert to upland were irrigation to cease, and artificial lakes and ponds that are not and could not be used for interstate commerce.

The Trump administration’s proposed definition of WOTUS is more circumscribed than that promulgated by the Army Corps and EPA in 1986 and 2015. Whereas prior definitions sought to cast as broad a regulatory net as possible, the new proposal is more focused on identifying those waters that are more appropriately considered “waters of the United States” subject to federal regulation. Whereas the 2015 definition presumed the existence of a “significant nexus” between water features or wetlands within a specified distance of navigable waters, the Trump proposal requires a more defined and determinate connection such as a continuous physical connection to navigable waters for at least some portion of the year. Mere physical proximity would be insufficient.

One express purpose of the revision is to “distinguish between water that is a ‘water of the United States’ subject to federal regulation under the CWA and water or land that is subject to exclusive State or tribal jurisdiction.” By clarifying this bound-

ary, the proposed redefinition should make it less difficult for landowners to determine whether their properties are subject to federal regulation and make it less likely that given assertions of federal regulatory authority are subject to legal challenge for exceeding the scope of federal jurisdiction. As such, this definition is more consistent with the text of the CWA and applicable Supreme Court precedent than prior definitions because it takes seriously the notion that federal regulatory jurisdiction is limited.

## COMPARATIVE FEDERAL ADVANTAGE

An underlying premise of the 2015 WOTUS rule and prior broad assertions of federal regulatory authority is that maximizing the scope of federal regulatory authority maximizes the environmental benefits of federal regulation. But this is not necessarily so.

Federal regulatory resources are necessarily limited. As a consequence, regulatory agencies can maximize the benefits of their regulatory efforts if they target their efforts. Federal regulatory resources should be used only if there is an identifiable federal interest or where the federal government is in a particularly good

*Federal regulatory resources should be used only if there is an identifiable federal interest or where the federal government is in a particularly good position to advance environmental protection given available alternatives.*

position to advance environmental protection given available alternatives. The most prominent situation is when pollution crosses state lines and the affected states are unable to resolve the conflict on their own.

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

activity imposes substantial environmental harm within *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 *A* externalizing the costs of polluting activities onto *B*. In some cases, *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. As with the more direct spillover, however, one cannot reasonably expect states, acting alone, to adopt welfare-enhancing environmental protections because 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 for such resources.

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” *did 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.

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. Respect for the states’ traditional role in regulating land use and many environmental concerns counsels careful consideration of where states are likely to be capable of advancing and protecting their own environmental interests and where they are likely not.

### RACE TO NOWHERE

Many argue that federal regulatory intervention is necessary to prevent a “race to the bottom” among states. But the evidence suggests that states do not simply cater to industry to the exclusion of concern for environmental amenities.

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. In order to attract industry, the theory asserts, 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, 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.

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 effect 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.

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. Specifically, those states with the largest wetland acreages tended to regulate first, whereas 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



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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. However inadequate 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 Trump administration’s effort to narrow and focus federal regulatory efforts under the CWA is among the most significant, and potentially the most beneficial, of the administration’s

efforts to reform environmental regulation. It is also one of the few instances that can be implemented at the agency level, without legislative change. Much of the over-expansiveness of federal environmental regulation is written directly into the various federal environmental statutes. Thus, there is only so much agencies can do to target federal resources at truly federal problems. Even if only as a first step toward rationalizing federal regulation, redefining WOTUS would be welcome. R

## READINGS

- “An Opening for Meaningful Reform,” by David Sunding. *Regulation* 26(2): 30–35 (Summer 2003).
- “Reckoning with *Rapanos*: Revisiting ‘Waters of the United States’ and the Limits of Federal Wetland Regulation,” by Jonathan H. Adler. *Missouri Environmental Law & Policy Review* 14(1) (2006).
- “The Clean Water Land Grab,” by Jonathan H. Adler. *Regulation* 32(4): 28–33 (Winter 2009–2010).
- “The Economics of Environmental Regulation by Licensing: An Assessment of Recent Changes to the Wetland Permitting Process,” by David Sunding and David Zilberman. *Natural Resources Journal* 42(1): 59–90 (Winter 2002).
- “Wetlands, Property Rights, and the Due Process Deficit in Environmental Law,” by Jonathan H. Adler. *Cato Supreme Court Review* 12: 139–165 (2012).
- “Wetlands, Waterfowl, and the Menace of Mr. Wilson: Commerce Clause Jurisprudence and the Limits of Federal Wetlands Regulation,” by Jonathan H. Adler. *Environmental Law Journal* 29: 1–67 (1999).

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