

PUBLISHED

**UNITED STATES COURT OF APPEALS
FOR THE FOURTH CIRCUIT**

STATE OF NORTH CAROLINA, ex rel.
Roy Cooper, Attorney General,

Plaintiff-Appellee,

v.

TENNESSEE VALLEY AUTHORITY,

Defendant-Appellant,

STATE OF ALABAMA,

Intervenor,

COMMONWEALTH OF KENTUCKY;
STATE OF LOUISIANA; STATE OF
NORTH DAKOTA; STATE OF SOUTH
DAKOTA; STATE OF UTAH; STATE OF
WYOMING; GERARD V. BRADLEY;
RONALD A. CASS; JAMES L.
HUFFMAN; F. SCOTT KIEFF; JOHN J.
PARK, JR.; JIM COOPER,
Representative; PHIL ROE,
Representative; STEVE COHEN,
Representative; MARSHA
BLACKBURN, Representative;
LINCOLN DAVIS, Representative;
ZACH WAMP, Representative; BART
GORDON, Representative; JOHN
TANNER, Representative; PARKER
GRIFFITH, Representative; TRAVIS
CHILDERS, Representative;
CHAMBER OF COMMERCE OF THE

No. 09-1623

UNITED STATES OF AMERICA;
NATIONAL ASSOCIATION OF
MANUFACTURERS; AMERICAN
PETROLEUM INSTITUTE; PUBLIC
NUISANCE FAIRNESS COALITION;
UTILITY AIR REGULATORY GROUP;
AMERICAN FOREST AND PAPER
ASSOCIATION; STATE OF TENNESSEE,

Amici Supporting Appellant,

ENVIRONMENTAL LAW PROFESSORS;
AMERICAN LUNG ASSOCIATION;
AMERICAN THORACIC SOCIETY;
NATIONAL PARKS CONSERVATION
ASSOCIATION; NATURAL RESOURCES
DEFENSE COUNCIL; SIERRA CLUB;
STATE OF CALIFORNIA; STATE OF
CONNECTICUT; STATE OF DELAWARE;
STATE OF ILLINOIS; STATE OF IOWA;
STATE OF MAINE; STATE OF
MARYLAND; STATE OF
MASSACHUSETTS; STATE OF
MISSISSIPPI; STATE OF NEW
HAMPSHIRE; STATE OF NEW JERSEY;
STATE OF NEW MEXICO; STATE OF
NEW YORK; STATE OF OKLAHOMA;
STATE OF RHODE ISLAND; STATE OF
VERMONT,

Amici Supporting Appellee.

Appeal from the United States District Court
for the Western District of North Carolina, at Asheville.

Lacy H. Thornburg, District Judge.

(1:06-cv-00020-LHT)

Argued: May 14, 2010

Decided: July 26, 2010

Before WILKINSON, NIEMEYER and SHEDD,
Circuit Judges.

Reversed and remanded by published opinion. Judge Wilkinson wrote the opinion, in which Judge Niemeyer and Judge Shedd joined.

COUNSEL

ARGUED: Harriet A. Cooper, TENNESSEE VALLEY AUTHORITY, Knoxville, Tennessee, for Appellant. Kevin Christopher Newsom, BRADLEY ARANT BOULT CUMMINGS, LLP, Birmingham, Alabama, for Intervenor. Christopher Grafflin Browning, Jr., NORTH CAROLINA DEPARTMENT OF JUSTICE, Raleigh, North Carolina, for Appellee. **ON BRIEF:** F. William Brownell, Makram B. Jaber, David J. DePippo, HUNTON & WILLIAMS LLP, Washington, D.C.; Maureen H. Dunn, General Counsel, Frank H. Lancaster, Senior Attorney, Maria V. Gillen, Office of the General Counsel, TENNESSEE VALLEY AUTHORITY, Knoxville, Tennessee, for Appellant. Michael D. Goodstein, Stacey H. Myers, Anne E. Lynch, HUNSUCKER GOODSTEIN & NELSON P.C., Washington, D.C.; Richard E. Ayres, AYRES LAW GROUP, Washington, D.C.; James C. Gulick, Senior Deputy Attorney General, Marc Bernstein, Special Deputy Attorney General, NORTH CAROLINA DEPARTMENT OF JUSTICE, Raleigh, North Carolina, for Appellee. Troy King, Attorney General, Corey Maze, Solicitor General, William G. Parker, Jr., Assistant Attorney General, STATE OF ALABAMA, OFFICE OF THE

ATTORNEY GENERAL, Montgomery, Alabama; Brian M. Vines, BRADLEY ARANT BOULT CUMMINGS, LLP, Birmingham, Alabama, for Intervenor. Jack Conway, Attorney General, Tad Thomas, Assistant Deputy Attorney General, COMMONWEALTH OF KENTUCKY, OFFICE OF THE ATTORNEY GENERAL, Frankfort, Kentucky, for the Commonwealth of Kentucky; James D. "Buddy" Caldwell, Attorney General, STATE OF LOUISIANA, OFFICE OF THE ATTORNEY GENERAL, Baton Rouge, Louisiana, for the State of Louisiana; Wayne Stenehjem, Attorney General, STATE OF NORTH DAKOTA, OFFICE OF THE ATTORNEY GENERAL, Bismarck, North Dakota, for the State of North Dakota; Lawrence E. Long, Attorney General, Roxanne Giedd, Assistant Attorney General, STATE OF SOUTH DAKOTA, OFFICE OF THE ATTORNEY GENERAL, Pierre, South Dakota, for the State of South Dakota; Mark L. Shurtleff, Attorney General, STATE OF UTAH, OFFICE OF THE ATTORNEY GENERAL, Salt Lake City, Utah, for the State of Utah; Bruce A. Salzburg, STATE OF WYOMING, OFFICE OF THE ATTORNEY GENERAL, Cheyenne, Wyoming, for the State of Wyoming, Amici Supporting Appellant. David B. Rivkin, Jr., Lee A. Casey, Mark W. DeLaquil, BAKER & HOSTETLER LLP, Washington, D.C., for Gerard V. Bradley, Ronald A. Cass, James L. Huffman, F. Scott Kieff, and John J. Park, Jr., Amici Supporting Appellant. Erik S. Jaffe, ERIK S. JAFFE, P.C., Washington, D.C.; C. Boyden Gray, Washington, D.C., for Jim Cooper, Phil Roe, Steve Cohen, Marsha Blackburn, Lincoln Davis, Zach Wamp, Bart Gordon, John Tanner, Parker Griffith, and Travis Childers, Amici Supporting Appellant. Charles H. Knauss, Michael B. Wigmore, Robert V. Zener, Sandra P. Franco, BINGHAM MCCUTCHEN LLP, Washington, D.C., for Chamber of Commerce of the United States of America, National Association of Manufacturers, American Petroleum Institute, Public Nuisance Fairness Coalition, Utility Air Regulatory Group, and American Forest and Paper Association; William L. Wehrum, HUNTON & WILLIAMS, Washington, D.C., for

the Utility Air Regulatory Group; Quentin Riegel, NATIONAL ASSOCIATION OF MANUFACTURERS, Washington, D.C.; George S. Kopp, PUBLIC NUISANCE FAIRNESS COALITION, Washington, D.C.; Robin S. Conrad, Amar D. Sarwal, NATIONAL CHAMBER LITIGATION CENTER, INC., for the Chamber of Commerce of the United States; Harry M. Ng, Stacy R. Linden, Office of the General Counsel, AMERICAN PETROLEUM INSTITUTE, Washington, D.C., Jan Poling, Vice President, General Counsel & Corporate Secretary, AMERICAN FOREST & PAPER ASSOCIATION, Washington, D.C., for Amici Supporting Appellant. Robert E. Cooper, Jr., Attorney General and Reporter, Barry Turner, Deputy Attorney General, OFFICE OF THE TENNESSEE ATTORNEY GENERAL AND REPORTER, Nashville, Tennessee, for the State of Tennessee, Amicus Supporting Appellant and Intervenor. Patrick Parenteau, VERMONT LAW SCHOOL, Environmental and Natural Resources Law Clinic, South Royalton, Vermont, for Environmental Law Professors, Amicus Supporting Appellee. Jamie Gibbs Pleune, Staff Attorney, Hope M. Babcock, Senior Attorney/Director, GEORGETOWN UNIVERSITY LAW CENTER, Institute for Public Representation, Washington, D.C., for American Lung Association and American Thoracic Society, Amici Supporting Appellee. John T. Suttles, Jr., SOUTHERN ENVIRONMENTAL LAW CENTER, Chapel Hill, North Carolina, for National Parks Conservation Association, Natural Resources Defense Council, and Sierra Club, Amici Supporting Appellee; Mitchell S. Bernard, NATURAL RESOURCES DEFENSE COUNCIL, New York, New York, for Natural Resources Defense Council, Amicus Supporting Appellee; Jamie Gibbs Pleune, Hope M. Babcock, GEORGETOWN UNIVERSITY LAW CENTER, Institute for Public Representation, Washington, D.C., for National Parks Conservation Association, Natural Resources Defense Council, and Sierra Club, Amici Supporting Appellee. Andrew M. Cuomo, Attorney General, Barbara D. Underwood, Solicitor General, Katherine Kennedy, Special Deputy

Attorney General, Robert Rosenthal, Assistant Attorney General, Monica Wagner, Assistant Solicitor General, STATE OF NEW YORK, Office of the Attorney General, New York, New York; Douglas F. Gansler, Attorney General, Steven M. Sullivan, Solicitor General, William F. Brockman, Deputy Solicitor General, STATE OF MARYLAND, Office of the Attorney General, Baltimore, Maryland, for States of California, Connecticut, Delaware, Illinois, Iowa, Maine, Maryland, Massachusetts, Mississippi, New Hampshire, New Jersey, New Mexico, New York, Oklahoma, Rhode Island, and Vermont, Amici Supporting Appellee.

OPINION

WILKINSON, Circuit Judge:

The Tennessee Valley Authority (TVA) appeals an injunction requiring immediate installation of emissions controls at four TVA electricity generating plants in Alabama and Tennessee. The injunction was based on the district court's determination that the TVA plants' emissions constitute a public nuisance in North Carolina. As a result, the court imposed specific emissions caps and emissions control technologies that must be completed by 2013.

This ruling was flawed for several reasons. If allowed to stand, the injunction would encourage courts to use vague public nuisance standards to scuttle the nation's carefully created system for accommodating the need for energy production and the need for clean air. The result would be a balkanization of clean air regulations and a confused patchwork of standards, to the detriment of industry and the environment alike. Moreover, the injunction improperly applied home state law extraterritorially, in direct contradiction to the Supreme Court's decision in *International Paper Co. v. Ouellette*, 479 U.S. 481 (1987). Finally, even if it could be

assumed that the North Carolina district court did apply Alabama and Tennessee law, it is difficult to understand how an activity expressly permitted and extensively regulated by both federal and state government could somehow constitute a public nuisance. For these reasons, the judgment must be reversed.

I.

The Tennessee Valley Authority (TVA) is a federal executive branch agency, established in 1933 and tasked with promoting economic development in the Tennessee Valley region. 48 Stat. 58 (May 18, 1933). One of TVA's "primary objectives" is to "produce, distribute, and sell electric power." 16 U.S.C. §§ 831d(l), 831i, & 831n-4(f). As a result of this mandate, TVA provides electricity to citizens in parts of seven states. Much of this power is generated by eleven TVA owned and operated coal-fired power plants located in Tennessee, Alabama, and Kentucky.

As a natural byproduct of the power generation process, coal-fired power plants emit sulfur dioxide (SO_2) and nitrous oxides (NO_x). In the atmosphere, both compounds can transform into microscopic particles known as "fine particulate matter" or " $\text{PM}_{2.5}$ " (particulate matter less than 2.5 micrometers in diameter) that cause health problems if inhaled. When exposed to sunlight, NO_x also assists in the creation of ozone, which is known to cause respiratory ailments.

SO_2 , NO_x , $\text{PM}_{2.5}$, and ozone are among the air pollutants extensively regulated through the Clean Air Act, 42 U.S.C. § 7401 *et seq.* Pursuant to the Act, the Environmental Protection Agency (EPA) has issued numerous regulations, and states have enacted further rules implementing the Act and the EPA requirements. Together, these laws and regulations form a system that seeks to keep air pollutants at or below safe levels.

In order to comply with requirements under the Clean Air Act, a number of controls can be fitted to coal-fired power plants to reduce the amounts of SO₂ and NO_x they emit and, by extension, the amounts of PM_{2.5} and ozone_x created. One of the ways SO₂ can be reduced, for example, is by installing a flue gas desulfurization system, or "scrubber." Scrubbers are large chemical plants—often larger than the power plants themselves—that remove SO₂—from plant exhaust and cost hundreds of millions of dollars.

To control NO_x emissions, plants may use selective catalytic reduction (SCR). Like scrubbers, SCRs are building-sized plants that can cost hundreds of millions of dollars to construct. However, they can remove approximately 90% of the NO_x from the flue gasses a coal power plant produces. NO_x emissions can also be reduced in alternative ways, such as retrofitting plants with burners that result in lower NO_x emissions, burning types of coal that have low NO_x output, and installing selective non-catalytic reduction (SNCR) controls. Although SNCRs are not as effective as SCRs, removing some 20 to 40% of NO_x, they have the benefit of costing about one-tenth as much as SCRs.

TVA has already installed numerous pollution controls at its coal-fired plants. SO₂ scrubbers already operating cover 43% of TVA's coal-fired electricity generation capacity, while scrubbers under construction and anticipated to be completed this year will bring that number above 50%. Nationwide, only one-third to one-half of the country's coal plants are equipped with scrubbers. Similarly, while one-third to one-half of the country's coal plants have SCRs to control NO_x, TVA has installed SCRs on 60% of its coal-fired electricity generation capacity. At several plants that do not currently have SCRs, TVA is installing SNCRs and is also burning low NO_x coal.

Unlike TVA, power plants in North Carolina historically had not put sufficient controls on their emissions, choosing

instead to purchase emissions allowances under an EPA cap and trade program implemented by Congress in 1990 to address acid rain. *See* 42 U.S.C. § 7651-7651o (Clean Air Act Title IV, Acid Deposition Control); 42 U.S.C. § 7651b(b) (emissions allowance transfer system under acid rain program). As a result, North Carolina decided to implement more stringent controls on in-state coal-fired plants as a matter of state law, as it is allowed to do under the Clean Air Act. *See* 42 U.S.C. § 7416. It passed the North Carolina Clean Smokestacks Act, N.C. Gen. Stat. § 143-215.107D, which requires investor-owned public utilities that operate coal-fired generating units to reduce their emissions of NO_x and SO₂ to levels even lower than those specified in EPA regulations promulgated pursuant to the Clean Air Act. N.C. Gen. Stat. § 143-215.107D(b)-(e).

Not all emissions are generated by in-state sources, however. Prevailing high pressure weather systems in the states where TVA operates tend to cause emissions to move eastward into North Carolina and other states. *North Carolina v. Tenn. Valley Auth.*, 593 F. Supp. 2d 812, 825 (W.D.N.C. 2009). Although there are lengthy Clean Air Act provisions and regulations controlling such interstate emissions, North Carolina chose to bring a public nuisance suit against TVA in the Western District of North Carolina, seeking an injunction against all eleven of TVA's coal-fired power plants. TVA moved to dismiss based on the discretionary function doctrine and the Supremacy Clause. The district court denied the motions. *North Carolina v. Tenn. Valley Auth.*, 439 F. Supp. 2d 486 (W.D.N.C. 2006). We affirmed, holding that TVA's immunity was waived because the Clean Air Act required federal entities to comply with state and local regulations "in the same manner, and to the same extent as any nongovernmental entity," 42 U.S.C. § 7418(a), and because Congress provided that TVA may "sue and be sued in its corporate name," 16 U.S.C. § 831c(b). *North Carolina v. Tenn. Valley Auth.*, 515 F.3d 344 (4th Cir. 2008) (*TVA I*).

Upon resolution of the interlocutory appeal, the district court held a bench trial, *North Carolina v. Tenn. Valley Auth.*, 593 F. Supp. 2d at 818, at the end of which it issued an injunction against four of the power plants. All of these plants were within 100 miles of the North Carolina border. The injunction required TVA to install and continuously operate scrubbers and SCRs at each of the plants by December 31, 2013. *Id.* at 832. In addition to these requirements, the district court also established a schedule of SO₂ and NO_x emissions limits for each electric generation unit at the four plants, capping the emissions that each unit was allowed to release. *Id.* at 832-33. Primarily because TVA's seven other plants are located farther from North Carolina, the district court concluded there was insufficient evidence that they contributed significantly to pollution in North Carolina. *Id.* at 831-32. As a result, it did not rule that they were a public nuisance.

The cost of compliance with the district court's injunction against the four TVA plants is uncertain, but even North Carolina admits it will be over a billion dollars, while TVA estimates that the actual cost will be even higher. Regardless of the actual amount, there is no question that costs will be passed on in the form of rate increases to citizens who purchase power from TVA. TVA appealed the injunctions against its four plants, and we granted leave to the state of Alabama to intervene on appeal on TVA's behalf.

II.

The desirability of reducing air pollution is widely acknowledged, but the most effective means of doing so remains, not surprisingly, a matter of dispute. The system of statutes and regulations addressing the problem represents decades of thought by legislative bodies and agencies and the vast array of interests seeking to press upon them a variety of air pollution policies. To say this regulatory and permitting regime is comprehensive would be an understatement. To say it embodies carefully wrought compromises states the obvi-

ous. But the framework is the work of many, many people, and it is in place.

The district court's well-meaning attempt to reduce air pollution cannot alter the fact that its decision threatens to scuttle the extensive system of anti-pollution mandates that promote clean air in this country. If courts across the nation were to use the vagaries of public nuisance doctrine to overturn the carefully enacted rules governing airborne emissions, it would be increasingly difficult for anyone to determine what standards govern. Energy policy cannot be set, and the environment cannot prosper, in this way.

A.

North Carolina attempts to frame this case in terms of protecting public health and saving the environment from dirty air. But the problem is not a neglected one. In fact, emissions have been extensively regulated nationwide by the Clean Air Act for four decades. The real question in this case is whether individual states will be allowed to supplant the cooperative federal-state framework that Congress through the EPA has refined over many years.

It is worth describing this system in some detail. The federal Clean Air Act, 42 U.S.C. § 7401 *et seq.*, is the primary mechanism under which emissions in the United States are managed. The Act makes the EPA responsible for developing acceptable levels of airborne emissions, known as National Ambient Air Quality Standards (NAAQS), "the attainment and maintenance of which . . . are requisite to protect the public health." 42 U.S.C. § 7409(b)(1). NAAQS are further subdivided into Primary NAAQS, 42 U.S.C. § 7409(b)(1), and Secondary NAAQS, 42 U.S.C. § 7409(b)(2). Primary NAAQS are intended to protect individuals, while Secondary NAAQS are set to protect the surrounding environment. In practice, the two standards are often, though not necessarily, the same. *See* 40 C.F.R. § 50. As the name suggests, NAAQS

are meant to set a uniform level of air quality across the country in order to guarantee both a healthy populace and a healthy environment. *See Her Majesty the Queen v. City of Detroit*, 874 F.2d 332, 335 (6th Cir. 1989).

As a result of this statutory directive, the EPA has promulgated NAAQS for a number of emissions, including standards for all of the emissions involved in this case. *See* 40 C.F.R. §§ 50.4 & 50.5 (SO₂), 50.9 & 50.15 (ozone), 50.11 (NO_x), & 50.13 (PM_{2.5}). For instance, the NAAQS level for PM_{2.5} across the country is set at an annual average of fifteen micrograms per cubic meter (15 µg/m³) and at thirty-five micrograms per cubic meter (35 µg/m³) for a twenty-four hour period. 40 C.F.R. § 50.13. Such standards, however, are not set arbitrarily by the EPA. Rather, "a reasonable time for interested persons to submit written comments" must be provided before NAAQS may be adopted or modified. 42 U.S.C. § 7409(a)(1)(B), (b)(1) & (2). The EPA also has adopted extensive regulations explaining proper scientific equipment and techniques and providing detailed schematic diagrams for measuring emissions levels and air quality, *see* 40 C.F.R. § 50, apps. A-R, to ensure that measurements will be consistent across the country.

B.

While it establishes acceptable nationwide emissions levels, however, the EPA does not directly regulate actual sources of emissions. In light of the fact that Congress recognized "that air pollution prevention . . . and air pollution control at its source is the primary responsibility of States and local governments," 42 U.S.C. § 7401(a)(3), decisions regarding how to meet NAAQS are left to individual states. 42 U.S.C. § 7410(a)(1). Pursuant to this goal, each state is required to create and submit to the EPA a State Implementation Plan (SIP) "which provides for implementation, maintenance, and enforcement of [NAAQS] . . . within such State." *Id.* While states are responsible for promulgating SIPs, they

must do so consistently with extensive EPA regulations governing preparation, adoption by the state, and submission to the EPA, 40 C.F.R. § 51, and all SIPs must be submitted to the EPA for approval before they become final. 42 U.S.C. § 7410(a)(1), (k)(2) & (3). Once a SIP is approved, however, "its requirements become federal law and are fully enforceable in federal court." *Her Majesty the Queen*, 874 F.2d at 335 (citing 42 U.S.C. § 7604(a)).

States are accorded flexibility in determining how their SIPs are structured, but regardless of their choices, SIPs must "include enforceable emission limitations and other control measures, means, or techniques" to ensure that each state meets NAAQS. 42 U.S.C. § 7410(a)(2)(A). States are also tasked with enforcing the limitations they adopt in their SIPs. They must regulate "the modification and construction of any stationary source within the areas covered by the [SIP]," 42 U.S.C. § 7410(a)(2)(C), and must implement a permit program that limits the amounts and types of emissions that each permit holder is allowed to discharge, 42 U.S.C. §§ 7661a(d)(1), 7661c(a). Sources are prohibited from operating without such a permit, 42 U.S.C. § 7661a(a), and each permit is intended to be "a source-specific bible for Clean Air Act compliance" containing "in a single, comprehensive set of documents, all CAA requirements relevant to the particular polluting source." *Virginia v. Browner*, 80 F.3d 869, 873 (4th Cir. 1996).

Critically for this case, each SIP must consider the impact of emissions within the state on the ability of other states to meet NAAQS. The Clean Air Act requires each state to ensure that its SIP "contain[s] adequate provisions prohibiting . . . any source . . . within the State from emitting any air pollutant in amounts which will contribute significantly to nonattainment in, or interfere with maintenance by, any other State with respect to any such national primary or secondary ambient air quality standard." 42 U.S.C. § 7410(a)(2)(D), (D)(i), & (D)(i)(I) (internal section breaks omitted). This rule prevents

states from essentially exporting most of their emissions to other regions by strategically positioning sources along an arbitrary border line.

In addition, before new construction or modifications of a source of emissions may begin, a SIP must provide for "written notice to all nearby States the air pollution levels of which may be affected by such source at least sixty days prior to the date on which commencement of construction is to be permitted." 42 U.S.C. § 7426(a)(1).

Both Alabama and Tennessee have promulgated SIPs, and as part of its compliance with these regulations TVA has sought and obtained state permits to operate each of its power plants. As far as the record before us indicates, TVA currently operates each of the four plants at issue in this case in conformity with the permits, including limitations on SO₂ and NO_x emissions. Indeed, this suit does not present a challenge to Alabama and Tennessee's SIPs, the permits issued to TVA pursuant to them, or TVA's operation pursuant to the permits.

In addition to this framework, there are a number of checks built into the system to prevent abuses and to address concerns about emissions. As already noted, the EPA retains ultimate authority over NAAQS to determine what levels of emissions are acceptable and has the responsibility to modify those levels as necessary. 42 U.S.C. § 7409(b)(1) & (2). The EPA also has the authority, through a procedure known as a SIP Call, to demand that states modify their SIPs if it believes they are inadequate to meet NAAQS. 42 U.S.C. § 7410(k)(5). Finally, any state that believes that it is being subjected to interstate emissions may file what is known as a section 126 petition. Named after the original section of the Clean Air Act and codified at 42 U.S.C. § 7426(b), the section states that "[a]ny State or political subdivision may petition the Administrator [of the EPA] for a finding that any major source or group of stationary sources emits or would emit any air pollutant in violation of the prohibition of section

7410(a)(2)(D)([i]) of this title or this section."¹ 42 U.S.C. § 7426(b). As noted earlier, section 7410(a)(2)(D)(i)(I) prohibits states from allowing emissions that will interfere with other states' attainment or maintenance of NAAQS air emission levels. Thus, section 126 provides an important method for downwind states like North Carolina to address any concerns they have regarding the adequacy of an upwind state's regulation of airborne emissions.

III.

We have explained at some length the structure of the Clean Air Act in order to emphasize the comprehensiveness of its coverage. The fact that the process has been regulated in such detail has contributed to its inclusiveness and predictability. It was hardly unforeseeable that the aforementioned process and the plans and permits related to it would not meet with universal approbation. Litigation that amounts to "nothing more than a collateral attack" on the system, however, risks results that lack both clarity and legitimacy. *Palumbo v. Waste Techs. Indus.*, 989 F.2d 156, 159 (4th Cir. 1993).

Dissatisfied with the air quality standards authorized by Congress, established by the EPA, and implemented through Alabama and Tennessee permits, North Carolina has requested the federal courts to impose a different set of standards. The pitfalls of such an approach are all too evident. It ill behooves the judiciary to set aside a congressionally sanctioned scheme of many years' duration—a scheme, moreover, that reflects the extensive application of scientific expertise

¹Section 126's cross reference contains an apparent scrivener's error as a result of renumbering during extensive amendments in 1990. The section as printed references section 7410(a)(2)(D)(ii), but section 126(b) prior to amendment referenced what is now section 7410(a)(2)(D)(i). The EPA "contends that the Congress amended § 126 only in order to update the cross-references" and that this "substitution of '(ii)' for '(i)' was inadvertent." *Appalachian Power Co. v. EPA*, 249 F.3d 1032, 1040 (D.C. Cir. 2001) (citation omitted).

and that has set in motion reliance interests and expectations on the part of those states and enterprises that have complied with its requirements. To replace duly promulgated ambient air quality standards with standards whose content must await the uncertain twists and turns of litigation will leave whole states and industries at sea and potentially expose them to a welter of conflicting court orders across the country.

A.

The Supreme Court addressed this precise problem of multiplicity in *International Paper Co. v. Ouellette*, 479 U.S. 481 (1987). It emphasized that allowing "a number of different states to have independent and plenary regulatory authority over a single discharge would lead to chaotic confrontation between sovereign states." *Id.* at 496-97 (quoting *Illinois v. City of Milwaukee*, 731 F.2d 403, 414 (7th Cir. 1984)). This problem is only exacerbated if state nuisance law is the mechanism used, because "nuisance standards often are vague and indeterminate." *Id.* at 496 (citation omitted).

Indeed, the district court properly recognized that "[t]he ancient common law of public nuisance is not ordinarily the means by which such major conflicts among governmental entities are resolved in modern American governance." *North Carolina v. Tenn. Valley Auth.*, 593 F. Supp. 2d at 815. This is at least in part because public nuisance is an all-purpose tort that encompasses a truly eclectic range of activities. It includes such broad-ranging offenses as:

interferences with the public health, as in the case of a hogpen, the keeping of diseased animals, or a malarial pond; with the public safety, as in the case of the storage of explosives, the shooting of fireworks in the streets, harboring a vicious dog, or the practice of medicine by one not qualified; with public morals, as in the case of houses of prostitution, illegal liquor establishments, gambling houses, inde-

cent exhibitions, bullfights, unlicensed prize fights, or public profanity; with the public peace, as by loud and disturbing noises, or an opera performance which threatens to cause a riot; with the public comfort, as in the case of bad odors, smoke, dust and vibration; with public convenience, as by obstructing a highway or a navigable stream, or creating a condition which makes travel unsafe or highly disagreeable, or the collection of an inconvenient crowd; and in addition, such unclassified offenses as eavesdropping on a jury, or being a common scold.

W. Page Keeton et al., *Prosser and Keeton on the Law of Torts* 643-45 (5th ed. 1984) (citing numerous examples). *See also* Restatement (Second) of Torts § 821B cmts. b & c; *Commonwealth Edison Co. v. United States*, 271 F.3d 1327, 1353 (Fed. Cir. 2001) (en banc) ("When discussing the contours and scope of the common law, the Supreme Court has instructed that it is appropriate for us to look to the pertinent Restatement and other secondary sources.") (citing cases and Restatement (Second) of Torts).

Thus, while public nuisance law doubtless encompasses environmental concerns, it does so at such a level of generality as to provide almost no standard of application. If we are to regulate smokestack emissions by the same principles we use to regulate prostitution, obstacles in highways, and bullfights, *see* Keeton, *supra*, at 643-45, we will be hard pressed to derive any manageable criteria. As Justice Blackmun commented, "one searches in vain . . . for anything resembling a principle in the common law of nuisance." *Lucas v. S.C. Coastal Council*, 505 U.S. 1003, 1055 (1992) (Blackmun, J., dissenting).

The contrast between the defined standards of the Clean Air Act and an ill-defined omnibus tort of last resort could not be more stark. We are hardly at liberty to ignore the Supreme Court's concerns and the practical effects of having multiple

and conflicting standards to guide emissions. These difficulties are heightened if we allow multiple courts in different states to determine whether a single source constitutes a nuisance. "Adding another layer of collateral review for agency decisions threatens to put at naught the . . . process established by Congress." *Palumbo*, 989 F.2d at 161. An EPA-sanctioned state permit may set one standard, a judge in a nearby state another, and a judge in another state a third. Which standard is the hapless source to follow? See *Ouellette*, 479 U.S. at 496 n.17.

Indeed, a patchwork of nuisance injunctions could well lead to increased air pollution. Differing standards could create perverse incentives for power companies to increase utilization of plants in regions subject to less stringent judicial decrees. Alabama Br. at 62. Similarly, rushed plant alterations triggered by injunctions are likely inferior to system-wide analysis of where changes will do the most good. Injunction-driven demand for such artificial changes could channel a limited pool of specialized construction expertise away from the plants most in need of pollution controls to those with the most pressing legal demands. Tennessee Br. at 8-9, 12. Even these scenarios probably fail to exhaust the full scope of unpredictable consequences and potential confusion. "It is unlikely—to say the least—that Congress intended to establish such a chaotic regulatory structure." *Ouellette*, 479 U.S. at 497.

B.

We need not hold flatly that Congress has entirely pre-empted the field of emissions regulation. See *Pac. Gas & Elec. Co. v. State Energy Res. Conservation & Dev. Comm.*, 461 U.S. 190, 203-04 (1983). We cannot anticipate every circumstance that may arise in every future nuisance action. In *TVA I*, for example, we held that the savings clause of the Clean Air Act may allow for some common law nuisance suits, although we did not address whether a nuisance action

brought under these circumstances is barred by preemption under the Supremacy Clause. The *Ouellette* Court itself explicitly refrained from categorically preempting every nuisance action brought under source state law. 479 U.S. at 497-99. At the same time, however, the *Ouellette* Court was emphatic that a state law is preempted "if it interferes with the methods by which the federal statute was designed to reach [its] goal," *id.* at 494, admonished against the "tolerat[ion]" of "common-law suits that have the potential to undermine [the] regulatory structure," *id.* at 497, and singled out nuisance standards in particular as "vague" and "indeterminate," *id.* at 496 (quoting *City of Milwaukee v. Illinois*, 451 U.S. 304, 317 (1981)) (internal quotation marks omitted). The upshot of all this is that we cannot state categorically that the *Ouellette* Court intended a flat-out preemption of each and every conceivable suit under nuisance law. We can state, however, with assurance that *Ouellette* recognized the considerable potential mischief in those nuisance actions seeking to establish emissions standards different from federal and state regulatory law and created the strongest cautionary presumption against them.

In particular, it is essential that we respect the system that Congress, the EPA, and the states have collectively established. This is especially so in light of the fact that "the purpose of Congress is the ultimate touchstone in every preemption case." *Wyeth v. Levine*, 555 U.S. ___, 129 S.Ct. 1187, 1194 (2009) (quoting *Medtronic, Inc. v. Lohr*, 518 U.S. 470, 485 (1996)). A field of state law, here public nuisance law, would be preempted if "a scheme of federal regulation . . . [is] so pervasive as to make reasonable the inference that Congress left no room for the States to supplement it." *Pac. Gas & Elec. Co.*, 461 U.S. at 204 (ellipsis in original, citation omitted). Here, of course, the role envisioned for the states has been made clear. Where Congress has chosen to grant states an extensive role in the Clean Air Act's regulatory regime through the SIP and permitting process, field and conflict preemption principles caution at a minimum against

according states a wholly different role and allowing state nuisance law to contradict joint federal-state rules so meticulously drafted.

It is true, as North Carolina argues, that the Clean Air Act's savings clause states that "[n]othing in this section shall restrict any right which any person (or class of persons) may have under any statute or common law to seek enforcement of any emission standard or limitation or to seek any other relief." 42 U.S.C. § 7604(e). We must weigh that admonition, however, in light of the Supreme Court's direction in *Pacific Gas & Electric*, 461 U.S. at 203-13. There the Court explained that when Congress chose to give the Nuclear Regulatory Commission (at the time of the legislation the Atomic Energy Commission) control over issues relating to nuclear safety, it completely occupied the field of nuclear safety regulations, notwithstanding a general savings clause indicating that states retained their traditional power to regulate electrical utilities. *Id.* at 210. As a result, the State of California's claim that "a State may completely prohibit new construction until its safety concerns are satisfied by the Federal Government" was rejected. *Id.* at 212. The Court explained that "[w]hen the Federal Government completely occupies a given field or an identifiable portion of it, . . . the test of preemption is whether 'the matter on which the State asserts the right to act is in any way regulated by the Federal Act.'" *Id.* at 212-13 (quoting *Rice v. Santa Fe Elevator Corp.*, 331 U.S. 218, 236 (1947)). While the Court recognized that California retained the right to regulate for traditional utilities purposes, the case at bar mirrors *Pacific Gas & Electric* insofar as it involves an attempt to replace comprehensive federal emissions regulations with a contrasting state perspective about the emission levels necessary to achieve those same public ends.

Similarly, *Ouellette* held that the Clean Water Act's savings clause, which is similar to the one found in the Clean Air Act, *compare* 33 U.S.C. § 1365(e) *with* 42 U.S.C. § 7604(e), did not preserve a broad right for states to "undermine this

carefully drawn statute through a general savings clause." *Ouellette*, 479 U.S. at 494. The Court indicated that the clause was ambiguous as to which state actions were preserved and noted that "if affected States were allowed to impose separate discharge standards on a single point source, the inevitable result would be a serious interference with the achievement of the 'full purposes and objectives of Congress.'" *Id.* at 493-94 (quoting *Hillsborough County v. Automated Med. Labs., Inc.*, 471 U.S. 707, 713 (1985)). We thus cannot allow non-source states to ascribe to a generic savings clause a meaning that the Supreme Court in *Ouellette* held Congress never intended.

C.

The difficulties with North Carolina's approach in this litigation do not end with the prospect of multiplicitous decrees or vague and uncertain nuisance standards. In addition to envisioning a role for the states that the Clean Air Act did not contemplate, North Carolina's approach would reorder the respective functions of courts and agencies.

One can, of course, debate the respective merits of agency and judicial roles in addressing the problem of air pollution. But Congress in the Clean Air Act opted rather emphatically for the benefits of agency expertise in setting standards of emissions controls, especially in comparison with the judicially managed nuisance decrees for which North Carolina argues. Indeed, the Act directs the EPA to ensure that its air quality standards "accurately reflect the latest scientific knowledge useful in indicating the kind and extent of all identifiable effects on public health or welfare which may be expected from the presence of such pollutant in the ambient air." 42 U.S.C. § 7408(a)(2). The Clean Air Act's extensive coverage allows regulators with expertise in the relevant scientific fields to use their knowledge to create empirically-based emissions standards. The Act even requires the EPA to develop expertise so that it can provide states with information about available emissions controls, including "cost of

installation and operation, energy requirements, emission reduction benefits, and environmental impact of the emission control technology" as well as "data on alternative fuels, processes, and operating methods which will result in elimination or significant reduction of emissions." 42 U.S.C. § 7408(b)(1).

One can argue whether expert witnesses in bench trials can replicate the resources that EPA can bring to bear in deciding appropriate emissions standards. But Congress evidently thought not. It was certainly open to the legislative branch to authorize various private causes of action as the primary means of arriving at emissions standards. Congress, however, thought the problem required a very high degree of specialized knowledge in chemistry, medicine, meteorology, biology, engineering, and other relevant fields that agencies rather than courts were likely to possess. "Congress has entrusted the Agency with the responsibility for making these scientific and other judgments, and we must respect both Congress' decision and the Agency's ability to rely on the expertise that it develops." *Lead Indus. Ass'n, Inc. v. EPA*, 647 F.2d 1130, 1146 (D.C. Cir. 1980). *See also id.* ("We must look at the decision not as the chemist, biologist, or statistician that we are qualified neither by training nor experience to be.") (quoting *Ethyl Corp. v. EPA*, 541 F.2d 1, 36 (D.C. Cir. 1976)); *Chevron, U.S.A., Inc. v. Natural Res. Def. Council, Inc.*, 467 U.S. 837, 865-66 (1984) (acknowledging the EPA's "great expertise" in air quality matters).

The required notice and comment periods detailed above, *see, e.g.*, 42 U.S.C. §§ 7409(a)(1)(B), (b)(1) & (2), 7426(a)(1), are further designed to allow EPA and state regulators to receive broad inputs into the regulatory scheme. Agency rulemaking is a "quasi-legislative power, . . . intended to add substance to the Acts of Congress, to complete absent but necessary details, and to resolve unexpected problems." 3 Jacob A. Stein et al., *Administrative Law* § 14.01. As a result, inputs into the rulemaking process would ideally reflect not

only scientific knowledge, but also the varied practical perspectives of industry and environmental groups. As David Shapiro has explained, the rulemaking process has the benefits of providing proactive instead of reactive control, creating opportunities for notice and comment, allowing flexibility in developing rules, and lowering the likelihood of disturbing reliance interests. David L. Shapiro, *The Choice of Rulemaking or Adjudication in the Development of Administrative Policy*, 78 Harv. L. Rev. 921, 930-37 (1965). Rulemaking can in this manner take advantage of the attributes of legislative hearings, albeit in a more focused and circumscribed manner. Shapiro also observed that the general nature of rulemaking enables uniform application across industries, lessens the likelihood of distortions caused by the influence of individualized facts in cases, and also makes the resulting rules readily accessible in a single location. *Id.* at 935-41.

Injunctive decrees, of course, are rulemakings of a sort. While expressing the utmost respect for the obvious efforts the district court expended in this case, we doubt seriously that Congress thought that a judge holding a twelve-day bench trial could evaluate more than a mere fraction of the information that regulatory bodies can consider. "Courts are expert at statutory construction, while agencies are expert at statutory implementation." *Negusie v. Holder*, 555 U.S. ___, 129 S. Ct. 1159, 1171 (2009) (Stevens, J., concurring in part and dissenting in part). In fact, the district court properly acknowledged that "public nuisance principles . . . are less well-adapted than administrative relief to the task of implementing the sweeping reforms that North Carolina desires." *North Carolina v. Tenn. Valley Auth.*, 593 F. Supp. 2d at 817. As the District of Columbia Circuit has emphasized, courts "would be less than candid if [they] failed to acknowledge that [they] approach the task of examining some of the complex scientific issues presented in cases of this sort with some diffidence." *Lead Indus. Ass'n*, 647 F.2d at 1146.

It is crucial therefore that courts in this highly technical arena respect the strengths of the agency processes on which

Congress has placed its imprimatur. Regulations and permits, while hardly perfect, provide an opportunity for predictable standards that are scientifically grounded and thus give rise to broad reliance interests. TVA, for example, spent billions of dollars on power generation units that supply electricity to seven different states in the belief that its permits allowed it to do so. There is no way to predict the effect on TVA or utilities generally of supplanting operating permits with mandates derived from public nuisance law, but one suspects the costs and dislocations would be heavy indeed. Without a single system of permitting, "[i]t would be virtually impossible to predict the standard" for lawful emissions, and "[a]ny permit issued . . . would be rendered meaningless." *Ouellette*, 479 U.S. at 497 (quoting *Illinois v. City of Milwaukee*, 731 F.2d at 414). This is because "for an uncertain length of time after the agency issues the permit, the permit-holder would face the very real threat that the inquiry into the validity of its permit might be reopened in an altogether different forum." *Palumbo*, 989 F.2d at 162. A company, no matter how well-meaning, would be simply unable to determine its obligations ex ante under such a system, for any judge in any nuisance suit could modify them dramatically. Rather than take this risk in the future, "otherwise worthy permit applicants will weigh the formidable costs in delay and litigation, and simply will not apply." *Id.*

There are, therefore, a host of reasons why Congress preferred that emissions standards be set through agencies in the first instance rather than through courts. The prospects of forum shopping and races to the courthouse, the chances of reversals on appeal, the need to revisit and modify equitable decrees in light of changing technologies or subsequent enactments, would most assuredly keep matters unsettled. Congress opted instead for an expert regulatory body, guided by and subject to congressional oversight, to implement, maintain, and modify emissions standards and to do so with the aid of the rulemaking process and a cooperative partnership with states. In the words of *Ouellette* addressing the similarly com-

prehensive Clean Water Act, the statute "carefully defines the role of both the source and affected States, and specifically provides for a process whereby their interests will be considered and balanced by the source State and the EPA." 479 U.S. at 497. It is not open to this court to ignore the words of the Supreme Court, overturn the judgment of Congress, supplant the conclusions of agencies, and upset the reliance interests of source states and permit holders in favor of the nebulous rules of public nuisance.

IV.

In addition to the problems noted above, the district court's decision compromised principles of federalism by applying North Carolina law extraterritorially to TVA plants located in Alabama and Tennessee. There is no question that the law of the states where emissions sources are located, in this case Alabama and Tennessee, applies in an interstate nuisance dispute. The Supreme Court's decision in *Ouellette* is explicit: a "court must apply the law of the State in which the point source is located." 479 U.S. at 487. While *Ouellette* involved a nuisance suit against a source regulated under the Clean Water Act, all parties agree its holding is equally applicable to the Clean Air Act.

Unfortunately, while the district court acknowledged the proper standard, *North Carolina v. Tenn. Valley Auth.*, 593 F. Supp. 2d at 829 (citing *Ouellette*, 479 U.S. at 487), it for all practical purposes applied North Carolina's Clean Smokestacks Act extraterritorially in Alabama and Tennessee. The decision below does little more than mention the black letter nuisance law of Alabama and Tennessee on its way to crafting a remedy derived entirely from the North Carolina Act. *See id.* at 829-31.

Certainly North Carolina intended for its Clean Smokestacks Act to be applied to TVA. We need look no further than the direct statements of the North Carolina law itself.

The Act orders the state to "use all available resources and means, including . . . litigation to induce other states and entities, including the Tennessee Valley Authority, to achieve reductions in emissions of oxides of nitrogen (NO_x) and sulfur dioxide (SO₂) comparable to those required by [the Clean Smokestacks Act] . . . on a comparable schedule." 2002 N.C. Sess. Laws 4 § 10.

Further, North Carolina repeatedly affirmed its desire to apply the standards found in the Clean Smokestacks Act to TVA. When the North Carolina Attorney General filed the present lawsuit in 2006, he issued a press release stating that "North Carolina is seeking a Court order requiring TVA to control its emissions to levels similar to those required for coal-fired power plants in North Carolina by the North Carolina Clean Smokestacks Act on a similar timetable." And in responding to TVA's first interrogatory, North Carolina indicated that it was requesting the imposition of "emission rates equivalent to North Carolina's Clean Smokestack[s] Act." Even in opening statements before the district court, North Carolina asked the court to require TVA to install controls "in a similar way the State of North Carolina is requiring [in-state power companies] Duke and Progress Energy by statute to put pollution controls in their facilities."

Nor did North Carolina change its tune once the bench trial began. Its primary expert witness, Dr. James Staudt, reiterated often his "opinion [that TVA was a public nuisance was] based upon looking at the Clean Smokestacks Act and the emission rates that would be required for the Clean Smokestacks Act." Dr. Staudt stated that his "benchmark" was "emissions rates that were equivalent to what would be required in the Clean Smokestacks Act in 2013" and used "those equivalent emission rates [to develop] what would be caps for TVA." Indeed, Dr. Staudt believed his suggested 2013 deadline for installation of emissions controls was "an appropriate deadline" because "it is consistent with the Clean Smokestacks Act final deadline."

Importantly, in Plaintiff's Exhibits 95 and 97 Dr. Staudt summarized his findings and recommended installation of scrubbers and SCRs to meet specific emissions caps for each of TVA's coal-fired electricity generation units. Plaintiff's Exhibit 95 showed precisely how many tons of SO₂ and NO_x TVA's system of eleven power plants as a whole would be permitted to emit under the North Carolina Clean Smokestacks Act. Plaintiff's Exhibit 97, revealingly titled "CSA-Equivalent 2013 Emissions," then gave a unit-by-unit breakdown of the emissions each TVA plant would produce if the scrubbers and SCRs were installed per Dr. Staudt's recommendation. At the end of Plaintiff's Exhibit 97, the sum total of the TVA units' emissions under Dr. Staudt's proposed scheme was just below the Clean Smokestacks Act caps presented in Plaintiff's Exhibit 95.

In light of the fact that North Carolina informed the district court in its opening statement that Dr. Staudt would provide this information and again referred to his proposals during closing argument, it is not at all surprising that the district court utilized Exhibit 97's CSA-Equivalent 2013 Emissions calculations in fashioning its injunction. The court essentially granted plaintiff its request. It created "a judicially-imposed injunction requiring the installation and continual, year-round use of appropriate pollution control technology." *North Carolina v. Tenn. Valley Auth.*, 593 F. Supp. 2d at 831. As recommended by Dr. Staudt, the injunction demanded installation of scrubbers and SCRs on each electric generating unit at the four plants closest to the North Carolina border and the continuous operation of those pollution controls once installed. *Id.* at 832. It also adopted Dr. Staudt's 2013 timeline for final completion of all scrubber and SCR construction. *Id.* at 827, 832.

Further, the court's injunction traced, line by line, the emissions caps that Dr. Staudt presented in Plaintiff's Exhibit 97. After ordering that "TVA shall adhere to the following caps on emissions," *id.* at 832, the district court reproduced the

portions of the CSA-Equivalent 2013 Emissions chart that related to each of the twenty-two electric generating units at the four plants it enjoined. *Compare id.* at 832-33 with J.A. 1111-12 (Plaintiff's Ex. 97). For instance, the district court capped emissions from electric generating unit number eight at TVA's Widows Creek plant in northeast Alabama at 860 tons of NO_x and 4,508 tons of SO₂ per year—the precise amounts that Dr. Staudt proposed. *Compare North Carolina v. Tenn. Valley Auth.*, 593 F. Supp. 2d at 833 with J.A. 1112 (Plaintiff's Ex. 97). Indeed, the court imposed the limitations that Dr. Staudt calculated to show how TVA could meet the demands of North Carolina's Clean Smokestacks Act on every single electric generating unit it enjoined.

Yet the state now attempts to argue that the district court did not, after all, impose the Clean Smokestacks Act extraterritorially because it only imposed caps on the four of TVA's eleven plants that were closest to the North Carolina line. North Carolina claims that because the Clean Smokestacks Act demands only system-wide caps, Dr. Staudt's plant-specific calculations do not represent an extraterritorial application of the law.

But, as already explained, the district court's emissions limits on TVA's four plants are clearly drawn from Dr. Staudt's calculations, which he testified that he created to provide a remedy that would be "equivalent to the requirements of the North Carolina Clean Smokestacks Act." North Carolina in fact admits that "Exhibit 97 was intended to demonstrate at least one way that TVA would be capable of meeting North Carolina's proposed system-wide caps for NO_x and SO₂ emissions with the installation of scrubbers and SCR's." The fact that there may have been other ways that TVA could reach the emissions levels demanded by the Clean Smokestacks Act and the fact that the district court ultimately decided to award North Carolina only part of its requested relief cannot obscure what occurred: The district court took the very calculations provided by North Carolina to show how TVA could comply

with an extraterritorial application of its law and used them to fashion an injunction.

The Supreme Court emphasized that only source state law, here that of Alabama and Tennessee, could impose more stringent emission rates than those required by federal law on plants located in those two jurisdictions. *Ouellette*, 479 U.S. at 494-97. Yet exactly the opposite has happened. North Carolina explicitly stated that it wanted out-of-state entities, including TVA, to follow its state rules. North Carolina law provided the basis for Dr. Staudt's opinion that TVA was operating unreasonably. North Carolina law provided Dr. Staudt with the benchmark for his recommendations regarding the steps TVA should take to bring its plants into compliance with the North Carolina Clean Smokestacks Act. And North Carolina law ultimately provided the remedy the district court adopted against the four TVA plants at issue here. Its decision was tied so tightly to the North Carolina Clean Smokestacks Act that it violates *Ouellette's* directive that source state law applies to interstate nuisance suits.

V.

Even were we to accept North Carolina's claim that the district court actually applied source state law from Alabama and Tennessee, it would be difficult to uphold the injunctions because TVA's electricity-generating operations are expressly permitted by the states in which they are located.² It would be odd, to say the least, for specific state laws and regulations to expressly permit a power plant to operate and then have a generic statute countermand those permissions on public nui-

²The parties also dispute whether Alabama and Tennessee allow out-of-state sovereigns to bring public nuisance suits on behalf of their out-of-state citizens. TVA as well as Alabama as intervenor argue with some force that the district court's decision that North Carolina could enforce source state public nuisance law as a "foreign quasi sovereign" has no basis in Alabama and Tennessee law. Our resolution of the other issues in this case makes it unnecessary for us to resolve this issue.

sance grounds. As the Supreme Court has made clear, "[s]tates can be expected to take into account their own nuisance laws in setting permit requirements." *Ouellette*, 479 U.S. at 499.

While North Carolina points out that an activity need not be illegal in order to be a nuisance, that is not the situation before us. There is a distinction between an activity that is merely not illegal versus one that is explicitly granted a permit to operate in a particular fashion. "Courts traditionally have been reluctant to enjoin as a public nuisance activities which have been considered and specifically authorized by the government." *New England Legal Found. v. Costle*, 666 F.2d 30, 33 (2d Cir. 1981). This is especially true "where the conduct sought to be enjoined implicates the technically complex area of environmental law." *Id.*; *see also* Restatement (Second) of Torts § 821B cmt. f. ("Although it would be a nuisance at common law, conduct that is fully authorized by statute, ordinance or administrative regulation does not subject the actor to tort liability.").

Alabama law certainly recognizes this principle. The Alabama Supreme Court has repeatedly explained that "there can be no abatable nuisance for doing in a proper manner what is authorized by law." *Fricke v. City of Guntersville*, 36 So. 2d 321, 322 (Ala. 1948) (quoting *Branyon v. Kirk*, 191 So. 345, 349 (Ala. 1939)) (emphasis added); *see also City of Birmingham v. City of Fairfield*, 375 So. 2d 438, 441 (Ala. 1979) (same); *Johnson v. Bryant*, 350 So. 2d 433, 436 (Ala. 1977) (same); *City of Birmingham v. Scogin*, 115 So. 2d 505, 512 (Ala. 1959) (same). The law draws a distinction between activities which are merely not illegal, *see* Ala. Code § 6-5-120, and those which are expressly permitted. Thus, an entity must behave in a negligent manner if its expressly permitted activities are to constitute a nuisance. *See City of Birmingham v. City of Fairfield*, 375 So. 2d at 441-43; *St. Louis-San Francisco Ry. Co. v. Wade*, 607 F.2d 126, 131 n.6 (5th Cir. 1979) (Under Alabama law, "[n]egligence is an element of a claim

for nuisance . . . if the defendant's activities are specifically authorized by law.").

So too Tennessee. An activity that is explicitly licensed and allowed by Tennessee law cannot be a public nuisance. *See, e.g., O'Neil v. State ex rel. Baker*, 206 S.W.2d 780, 781 (Tenn. 1947); *Fey v. Nashville Gas & Heating Co.*, 64 S.W.2d 61, 62 (Tenn. Ct. App. 1933). Additionally, Tennessee's Deputy Air Director, one of the officials responsible for managing the air permitting process, testified that in issuing emissions permits the state takes into account the same factors that would be considered by a court in a nuisance case. The only way that a permit-authorized activity can be enjoined under a nuisance theory is if it is operating negligently, a claim not before us in this case. *See Fey*, 64 S.W.2d at 62. Thus while it is technically accurate to state that an act that is not illegal can still be a nuisance, that proposition is simply not relevant in this case because TVA's Tennessee plants are expressly permitted to operate as they do. As TVA's facilities operate under permits, required by Congress and EPA regulations, we cannot say that the plant emissions of which North Carolina complains are a public nuisance.

In sum, TVA's plants cannot logically be public nuisances under Alabama and Tennessee law where TVA is in compliance with EPA NAAQS, the corresponding state SIPs, and the permits that implement them. These standards impose more stringent requirements than source state nuisance law. Alabama and Tennessee nuisance law only prohibits activities that substantially interfere with the average person—for example, a person of "*ordinary* health and sensibilities, and *ordinary* modes of living," *Jenkins v. CSX Transp., Inc.*, 906 S.W.2d 460, 462 (Tenn. Ct. App. 1995) (emphasis added), or "an *ordinary* reasonable man," Ala. Code § 6-5-120 (emphasis added); *see also Fowler v. Fayco, Inc.*, 275 So. 2d 665, 669 (Ala. 1973) (nuisance not intended to prevent harms that would "affect only one of a fastidious taste") (quoting Ala. Code § 6-5-120).

In contrast, the EPA's regulations regarding NAAQS and the SIPs implementing them are understandably designed to protect even those individuals particularly sensitive to emissions. "NAAQS must protect not only average healthy individuals, but also 'sensitive citizens'—children, for example, or people with asthma, emphysema, or other conditions rendering them particularly vulnerable to air pollution." *Am. Lung Ass'n v. EPA*, 134 F.3d 388, 389 (D.C. Cir. 1998). This case does not join the issue of whether TVA is in compliance with the various permits under which it operates, and we assume, without deciding, that it is. If TVA is in compliance with the more demanding federal EPA requirements and state law SIPs, it cannot be in violation of less-stringent state law nuisance standards.

VI.

While we must overturn the district court's injunction, North Carolina is by no means without remedy. As already noted, the section 126 process provides protection for states that believe they are suffering from improper interstate pollution. "[D]ownwind states retain their statutory right to petition for immediate relief from unlawful interstate pollution under section 126, 42 U.S.C. § 7426." *North Carolina v. EPA*, 531 F.3d 896, 930 (D.C. Cir. 2008) (per curiam). This section is the primary process for states to address interstate emissions that they believe cause problems with their attainment of NAAQS.

Indeed, North Carolina has already filed section 126 claims with regard to the very TVA plants against which it sought public nuisance rulings in this case. The district court recognized that "even in the present dispute, North Carolina began its pursuit of relief by utilizing the normal administrative channels established by the CAA." *North Carolina v. Tenn. Valley Auth.*, 593 F. Supp. 2d at 816. The EPA initially denied North Carolina's petition because it believed a new set of regulations it had promulgated, known as the Clean Air Interstate

Rule (CAIR), 70 Fed. Reg. 25,162 (May 12, 2005), would address the state's concerns. However, after the D.C. Circuit reversed CAIR because it believed aspects of the rule were inconsistent with the Clean Air Act, *see North Carolina v. EPA*, 531 F.3d at 901, it also remanded North Carolina's section 126 claims for further EPA consideration in light of its decision. *See Sierra Club v. EPA*, 313 Fed. Appx. 331 (D.C. Cir. 2009) (per curiam). Those claims remain pending, and there is no suggestion that the process will fail to provide North Carolina with a full and fair venue for airing its concerns.

Nor is section 126 the only remedy North Carolina could invoke. By federal law, states are required to provide comment periods before SIPs can be issued or modified, and North Carolina "had the opportunity to protect [its] interests before the fact by commenting and objecting to the proposed standard." *Ouellette*, 479 U.S. at 498 n.18. It apparently chose not to do so, and cannot complain now that it desires a different resolution. However, if either Tennessee or Alabama decides to modify its SIP in the future, North Carolina will have ample opportunity to make its views known. In addition, SIPs must provide for written notice before a new source can be constructed or an existing source can be modified. 42 U.S.C. § 7426(a)(1). This notice must be given to any region that may be affected before such changes can take place. *Id.* And should any of these avenues fail to satisfy the state, the Clean Air Act allows petitions for judicial review of a broad range of EPA actions, including promulgation of air standards and EPA approval of SIPs, *see* 42 U.S.C. § 7607(b)(1), while Alabama and Tennessee laws provide for similar administrative and judicial appeals of state permitting decisions, *see* Ala. Code §§ 22-22A-6(a)(4), 22A-7(c)(6); Tenn. Code §§ 68-201-105(a)(1), 68-201-108(a), 4-5-322.

This list of possible remedies does not even include private law remedies that may be available to North Carolina. Indeed, if North Carolina believes that TVA is not complying with its

permits, the Clean Air Act provides for suits "against any person . . . who is alleged to have violated . . . or to be in violation of (A) an emission standard or limitation under this chapter or (B) an order issued by the Administrator or a State with respect to such a standard or limitation." 42 U.S.C. § 7604(a)(1). The statute further grants a cause of action against the EPA if it fails to perform any non-discretionary responsibility, 42 U.S.C. § 7604(a)(2), and also allows suit against any entity that constructs a source of emissions without securing the requisite permits. 42 U.S.C. § 7604(a)(3). If North Carolina believes that any of these violations have occurred, it remains free to pursue such avenues as well.

As this non-exclusive discussion of remedies demonstrates, North Carolina has a number of possible paths to pursue in its entirely laudable quest to guarantee pure air to its citizens. Seeking public nuisance injunctions against TVA, however, is not an appropriate course. The laws in place have been designed by Congress to protect our air and water. Plaintiff would replace them with an unknown and uncertain litigative future. As the Supreme Court has emphasized, the legal difficulties with this approach are legion. No matter how lofty the goal, we are unwilling to sanction the least predictable and the most problematic method for resolving interstate emissions disputes, a method which would chaotically upend an entire body of clean air law and could all too easily redound to the detriment of the environment itself.

VII.

For the foregoing reasons, we reverse the judgment of the district court and remand with directions to dismiss the action.

REVERSED AND REMANDED