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# United States Court of Appeals

FOR THE DISTRICT OF COLUMBIA CIRCUIT

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Argued March 11, 2003

Decided April 25, 2003

No. 01-1228

SIERRA CLUB, ET AL.,  
PETITIONERS

v.

ENVIRONMENTAL PROTECTION AGENCY AND  
CHRISTINE TODD WHITMAN, ADMINISTRATOR,  
UNITED STATES ENVIRONMENTAL PROTECTION AGENCY,  
RESPONDENTS

ENGINE MANUFACTURERS ASSOCIATION, ET AL.,  
INTERVENORS

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Consolidated with  
01-1231, 01-1232, 01-1237, 01-1238

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On Petitions for Review of an Order of the  
Environmental Protection Agency

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Bills of costs must be filed within 14 days after entry of judgment. The court looks with disfavor upon motions to file bills of costs out of time.

*James S. Pew* argued the cause for petitioners Sierra Club, et al. With him on the briefs were *Howard Fox*, *David B. Rivkin, Jr.* and *Lee A. Casey*.

*Rachel Zaffrann*, Assistant Attorney General, New York State Attorney General's Office, argued the cause for petitioners States of New York and Connecticut. With her on the briefs were *Eliot Spitzer*, Attorney General, *Peter H. Lehner*, Assistant Attorney General, *Richard Blumenthal*, Attorney General, Connecticut Attorney General's Office, and *Mark Kindall*, Assistant Attorney General. *Kimberly P. Massicotte*, Assistant Attorney General, entered an appearance.

*Claudia M. O'Brien* argued the cause for petitioner International Truck and Engine Corporation. With her on the brief were *Laurence H. Levine* and *Robert M. Sussman*.

*David W. Marshall* was on the brief for *amicus curiae* Clean Air Task Force in support of environmental petitioners.

*Angeline Purdy* and *David J. Kaplan*, Attorneys, U.S. Department of Justice, argued the cause for respondents. With them on the brief was *Patrice Simms*, Counsel, U.S. Environmental Protection Agency. *John C. Cruden*, Assistant Attorney General, U.S. Department of Justice, entered an appearance.

*Claudia M. O'Brien* argued the cause for intervenors International Truck and Engine Corporation, et al. in support of respondent. With her on the brief were *Laurence H. Levine*, *Robert M. Sussman*, *Janice K. Raburn*, *David Thomas Deal*, *Richard A. Penna*, *Howard E. Shapiro*, *Jed R. Mandel* and *Timothy A. French*.

*James S. Pew* and *Howard I. Fox* were on the brief for intervenors Sierra Club, et al. in support of respondent.

Before: RANDOLPH and ROGERS, *Circuit Judges*, and WILLIAMS, *Senior Circuit Judge*.

Opinion for the Court filed by *Senior Circuit Judge WILLIAMS*.

WILLIAMS, *Senior Circuit Judge*: In the 1990 Amendments to the Clean Air Act Congress directed the Environmental Protection Agency to regulate emissions of what the agency calls Mobile Source Air Toxics—that is, toxic chemicals emitted by motor vehicles. Section 202(l) of the amended Clean Air Act requires the Administrator first to complete a study assessing the “need for, and feasibility of, controlling emissions of toxic air pollutants . . . associated with motor vehicles and motor vehicle fuels,” 42 U.S.C. § 7521(l)(1), and then to promulgate regulations “based on” that study, *id.* § 7521(l)(2). The regulations are to contain standards

which the Administrator determines reflect the greatest degree of emission reduction achievable through the application of technology which will be available, taking into consideration the standards established under subsection (a) of this section, the availability and costs of the technology, and noise, energy, and safety factors, and lead time.

*Id.* In March 2001 EPA released the regulations, *Control of Emissions of Hazardous Air Pollutants From Mobile Sources*, 66 Fed. Reg. 17,230 (March 29, 2001) (the “Final Rule”). Here we review challenges brought by the Sierra Club and several other environmental groups; by the states of New York and Connecticut, also seeking greater stringency; and by the International Truck Corporation, seeking removal of “diesel particulate matter and diesel exhaust organic gases” (in sum, diesel exhaust) from the EPA’s list of toxics. Finding most of the claims of the first two sets of petitioners ill founded, and International Truck’s claim unripe, we uphold all aspects of the rule, save one—the agency’s unexplained rejection of proposals to require “on-board diagnostics” for very heavy heavy-duty vehicles.

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Before delving into the environmental and state petitioners’ attacks on specific features of the rule, we begin by addressing three general statutory issues. The environmental peti-

tioners say that the whole rule violated the statutory mandate because it was not “based on” a study meeting the requirements of § 202(l)(1). Petitioners acknowledge that the EPA did conduct a study (several studies, in fact), and that the agency used information gleaned from those studies in the rulemaking. But they claim that the studies were inadequate. As we understand the claim, petitioners do not ask us to grade the study against the substantive standards of (l)(1), but rather to find that its alleged inadequacies doom the Final Rule.

But we do not read the statute as making the validity of the rule depend on that of the study. In the first place, petitioners do not propose a method of review for determining whether a rule was or was not “based on” a study, nor does any seem immediately apparent; moreover, the statute doesn’t say that the rule must be based *exclusively* on the study. More importantly, for purposes of assessing the EPA’s rule, the requirement that the rule be “based on” the study bears no plausible relationship to the criteria that obviously govern the agency—those of § 202(l)(2), quoted above. The study subsection, § 202(l)(1), directs the Administrator only to evaluate the “need for” and “feasibility of” “means and measures” for controlling mobile air toxics. To the extent that a “feasibility” analysis in the study involves the same considerations as § 202(l)(2), it adds nothing; to the extent that it involves something else, we do not think it can override (l)(2)’s explicit requirements. Thus, the agency’s failure to have studied “feasibility” *per se* would not affect the validity of the rule.

The state petitioners’ attacks on EPA’s exposure modeling similarly fail to undermine the rule. EPA acknowledges that its modeling can be improved, updated and refined, but petitioners have identified no portion of the Final Rule in which the agency specifically relied on the exposure modeling for justification, and haven’t pointed to any decision that would have turned out differently but for the modeling’s flaws.

Finally, petitioners point out that § 202(l)(2) is “technology-forcing,” so that the agency must consider future advances

in pollution control capability. See, e.g., *Husqvarna AB v. EPA*, 254 F.3d 195, 201 (D.C. Cir. 2001). This is not disputed, but doesn't take petitioners far. The statute also intends the agency to consider many factors other than pure technological capability, such as costs, lead time, safety, noise and energy. And its language does not resolve how the Administrator should weigh all these factors in the process of finding the "greatest emission reduction achievable." Petitioners offer no construction of the statute contradicting the agency's overall approach, and thus present no occasion for us to attempt any final analysis of the statutory meaning. The sole possible exception to this is a short passage in the environmental petitioners' brief attacking the agency's observation that the "anti-backsliding program [imposed by the agency and discussed below] *at negligible cost* is the most stringent program that we can justify *in the near term*." Final Rule, 66 Fed. Reg. at 17,245/2 (emphasis added); see Environmental Petitioners' Initial Brief at 17 n.11. Petitioners imply that the agency regarded "more than negligible" cost as automatically disqualifying a standard under § 202(l)(2), but the reference plainly doesn't express that idea. Petitioners also quote to us a fragment from *National Lime Ass'n v. EPA*, 627 F.2d 416, 431 n.46 (D.C. Cir. 1980), purportedly to show that we have previously ruled that achievability means "capable of being met." But that snippet merely pointed out that achievability cannot mean something *stronger* than "capable of being met"; the rest of the discussion is not on point. Thus, there is no real issue before us on the degree to which the statute constrains consideration of cost. Compare the very severe constraints that we found under the "feasibility" standard of the Occupational Safety and Health Act. *United Steel workers v. Marshall*, 647 F.2d 1189, 1272-73 (D.C. Cir. 1980). Except for certain explicit statutory questions, therefore, our review will be under the familiar APA standard of "arbitrary and capricious."

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We now turn to petitioners' attacks on specific elements (or omissions) of the Final Rule.

## 1. Fuel Controls

EPA concluded that in light of the drastic regulatory requirements that it was already imposing on the automobile and fuel industries through prior rulemakings, namely “Tier 2,” *Control of Air Pollution from New Motor Vehicles: Tier 2 Motor Vehicle Emission Standards*, 65 Fed. Reg. 6698 (Feb. 10, 2000) and “Heavy-Duty,” *Control of Air Pollution from New Motor Vehicles: Heavy-Duty Vehicle and Engine Standards*, 66 Fed. Reg. 5002 (Jan. 18, 2001), it should for the time being limit anti-toxics regulation of motor vehicle fuel to an “anti-backsliding” provision, also called the “Toxic Performance Requirement” (“TPR”). This provision prevents a refinery or importer from increasing the toxicity of its fuel’s emissions over a baseline level determined by its emissions performance from 1998–2000. Final Rule, 66 Fed. Reg. at 17,245/2. Many refiners have voluntarily overcomplied with existing regulations, finding it economically advantageous to strip their fuel of more toxic chemicals than necessary, evidently because the market value of the extracted chemicals in certain regions more than covers the extra removal costs. Final Rule, 66 Fed. Reg. at 17,245/3. Absent the regulation, backsliding would presumably occur if the chemicals’ market prices fell. The rule measures backsliding by reference to the agency’s “Complex Model,” which calculates the expected toxicity of emissions as a function of the concentrations of five toxic chemicals in the fuel—benzene; formaldehyde; 1,3 butadiene; acetaldehyde; and polycyclic organic matter. Thus the standard aggregates chemicals; a refiner could, for example, offset an increase in benzene with a decrease in acetaldehyde.

The environmental petitioners challenge both the agency’s allowance of aggregation and its failure to impose emissions caps rather than merely preventing backsliding. As to aggregation, they stress that § 202(l)(2) requires that the regulations “shall, at a minimum, apply to emissions of benzene and formaldehyde.” 42 U.S.C. § 7521(l)(2). The anti-backsliding rule, of course, *does* apply to benzene and formaldehyde, as well as to the three other chemicals, so it achieves literal compliance with the statute. Nor does the agency interpreta-

tion appear unreasonable on the facts. We can imagine a case where it would not make sense merely to include benzene or formaldehyde in a basket of toxics. For example, it might be shown that the Complex Model weights chemicals incorrectly in light of their adverse health effects, or that differences among the chemicals, in terms of the relation between health effects and achievable controls, called for some sort of weighting adjustment or even ranking. But no such claim is made. Thus we see neither statutory violation nor capriciousness in the agency's decision to allow companies to trade benzene or formaldehyde increases against less costly reductions in other toxics.

As for the agency's choice of a mere anti-backsliding rule rather than a more aggressive emissions cap, petitioners argue first that the rule achieves no actual "reduction" in emissions, and so cannot be considered the statutorily required "greatest possible reduction achievable." But this errs at the outset by assuming that the emissions level prevailing at some historic point of time is the only permissible baseline against which "reductions" might be measured. The statute does not state any such baseline. Of course, a regulation allowing higher than historic levels could not qualify as a "reduction" if the projected increase were purely hypothetical; but petitioners make no such contention. Furthermore, even if there were no risk that emissions might increase above the status quo, reduction below that level might not be "achievable" in light of the various criteria for assessing achievability.

This takes us to petitioners' argument that more stringency is achievable, namely an emissions cap rather than the agency's anti-backsliding rule. As we noted, petitioners have not argued that the statute embodies some specific system for balancing the relevant variables. But they find a statutory hook in the concept of "lead time." Specifically, they argue that the EPA arbitrarily decided that any regulation it would adopt must take effect by January 1, 2002; this faulty decision, they believe, wrongly tilted the balance against an emissions cap, which would have been impossible to achieve in

that short time frame. More broadly, petitioners assert that the agency's choice of time frame dictated an outcome without meaningful reductions.

In fact, however, we see no evidence that the agency's choice of time frame preceded its evaluation of alternatives. Rather, it focused on the short term because it found itself confronting a situation where—for a brief time—it wouldn't be able to realistically assess achievability on a longer term basis. Its recently promulgated Tier 2 and Heavy-Duty standards required, among other things, deep reductions in the sulfur content of gasoline. Compliance with these regulations can be expected to impose substantial costs on refiners well into this century. Final Rule, 66 Fed. Reg. at 17,253/2. Moreover, at the time it issued these earlier requirements, the agency didn't know what technological fixes refiners and vehicle manufacturers would use to meet them. See, e.g., Tier 2 Regulations, 65 Fed. Reg. at 6774–77. Hence, the regulations' effects on industry are still unknown, and the agency held off socking refiners with drastic additional regulations that could interfere with planning on investments and other compliance matters. With relatively mild action now, it would be able later to assess, in a rulemaking actually scheduled for 2003–04, the impact of the earlier rules and the benefits and costs of further controls. Final Rule, 66 Fed. Reg. at 17,253/2. Given that the agency was shooting at a rapidly moving target (whose mobility was largely driven by its own prior regulation), its temporary rejection of regulations with long or intermediate lead times was not arbitrary.

Petitioners chide the agency for relying on future rulemakings, citing cases to the effect that labeling an action “interim” can't save an invalid rule. See *Chlorine Chemistry Council v. EPA*, 206 F.3d 1286, 1291 (D.C. Cir. 2000). But of course cases of that sort were not ones where the agency decision made sense on the data then available.

## 2. Vehicle Based Controls

The state petitioners primarily challenge the agency's decision not to impose controls on certain motor vehicles already on the road—“in-use” vehicles as opposed to new ones. The



states favor a series of such regulations for in-use heavy-duty vehicles, such as mandatory retrofitting of certain diesel engines with particulate matter traps, and inspection and maintenance requirements on heavy-duty vehicles. EPA gave no real answer in the rulemaking, but now argues that § 202(l)(2) gives it no authority to promulgate regulations for in-use vehicles. Petitioners note that an agency cannot normally prevail on the basis of a justification offered merely by counsel rather than by the agency, see *SEC v. Chenery*, 318 U.S. 80, 93–94 (1943); but that limit is inapplicable when the agency’s conclusion is one “to which it was bound to come as a matter of law,” *United Video, Inc. v. FCC*, 890 F.2d 1173, 1190 (D.C. Cir. 1989).

Section 202(l)(2) instructs the Administrator to “promulgate . . . regulations *under subsection (a)(1)* of this section . . . to control hazardous air pollutants from *motor vehicles* and motor vehicle fuels.” 42 U.S.C. § 7521(l)(2) (emphasis added). The emphasized portions create something of an internal contradiction. The statute defines “motor vehicle” separately from “new motor vehicle,” see 42 U.S.C. § 7550(2), (3), suggesting that any use of the term “motor vehicle” simpliciter encompasses in-use vehicles; but as “subsection (a)(1)” authorizes regulations only for “*new* motor vehicles,” that reference seems to limit § 202(l)(2) to new ones.

There are various rather inconclusive linguistic arguments on each side. Petitioners point out that in the neighboring § 202(m), 42 U.S.C. § 7521(m), added to the Clean Air Act in the same set of amendments as (l)(2), and governing “emissions control diagnostics,” Congress provided both that the regulations were to be promulgated “under subsection (a)” and that they were to apply only to “new light duty trucks.” But the usage in § 202(m) may have been intended only to make assurance double sure, and any inference from the difference between (l) and (m) is somewhat offset by the wording of 42 U.S.C. § 7554(d), in which Congress authorized regulations “under” subsection (a) of § 202 *and* then made explicit that it was authorizing a limited retrofit mandate for the urban buses at issue there. While that section itself indicates that Congress has sometimes intended that

§ 7521(a) regulations should apply to in-use vehicles, it is equally consistent with the idea that when Congress intends such an override, it says so.

The EPA’s reading has its own difficulties. The first, of course, is the reference to “motor vehicles” in § 202(l)(2). This might reflect a purposeful triggering of the definitional section, and thus override the limitation to new vehicles seemingly required by the cross-reference to subsection (a)(1). The government’s view has the advantage of giving a clear utility to the term “under subsection (a)(1),” but petitioners suggest an alternative function, namely, making various other statutory cross-references apply to the toxics regulations. See, e.g., 42 U.S.C. § 7525(g)(2) (disallowing issuance of certificates of conformity for new car models that do not meet standards promulgated under § 7521(a)); 42 U.S.C. § 7417 (requiring the Administrator to consult with advisory committees and independent experts before promulgating regulations under § 7521(a)). So while petitioners may have little evidence supporting their interpretation, they at least point out problems in the agency’s view.

The structure of the statute as a whole, however, seems to us to fatally undermine petitioners’ reading. Subchapter II, Part A of the Clean Air Act, 42 U.S.C. §§ 7521–54, serves primarily to authorize EPA to impose an elaborate regulatory system on fuel refiners and motor vehicle *manufacturers*—not motor vehicle *owners*. As we have seen, § 7521(a) sets forth the general authorization. Section 7525 sets up a system for testing of vehicle and engine prototypes, to be followed by issuance of compliance certificates, without which sale of a new vehicle is unlawful, see § 7522(a)(1). Section 7541 requires warranties by manufacturers and carefully limits the risk that a vehicle purchaser will have to pay directly for significant emissions-related repairs. See §§ 7541(a)(3), (g). Section 7521(a)(1) makes the requirements applicable for vehicles’ “useful life,” which is to be implemented in the system for certification of compliance.<sup>1</sup>

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<sup>1</sup> Ironically petitioners argue that § 202(l)(2)’s cross-reference to § 202(a) can be found to serve a purpose independent of the

In a small number of cases, Congress explicitly departed from that model, granting the EPA carefully hedged authority to impose a *direct* cost on auto owners and users (rather than one buried in the purchase price of a vehicle). For instance, § 7521(a)(3)(D) allows EPA regulations for the “control of rebuilding practices” of heavy-duty engines, though only after a study of rebuilding practices. And § 7554(d) provides for a mandate, to be adopted by November 15, 1991, requiring retrofitting of urban buses—but only ones having their engines rebuilt or replaced more than three years after January 1, 1995. A possible exception to Congress’s great precision in allowing EPA to impose burdens directly on vehicle users is 42 U.S.C. § 7521(j)(4), authorizing regulation “under subsection (a)(1)” of “cold start” carbon monoxide emissions of heavy-duty vehicles and engines. Even if this is intended to encompass in-use vehicles (a point we need not resolve), the linguistic case for such a reading is stronger than for § 202(l)(2), as the authorized regulations’ scope is far more confined (to heavy-duty vehicles, likely to be owned primarily by firms), and an argument can be drawn from the contrasting language of the other subsection of § 7521(j), with their explicit spelling out of lead times. All we need resolve here is that, given § 7521’s focus on new vehicles, and Congress’s restraint and precision in allowing direct EPA burdens on vehicle owners, we cannot read § 202(l)(2)’s omission of the word “new” as *carte blanche* to regulate in-use vehicles in connection with toxics.

The state and environmental petitioners also attack the EPA’s decision not to require on-board diagnostic equipment (“OBD”) for new heavy-duty vehicles *over* 14,000 pounds. EPA’s explanation of this decision did little more than point out that it had previously established such requirements for heavy-duty vehicles *under* 14,000 pounds, and that it “expect[ed] to propose similar requirements for all other heavy-

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latter’s restriction to new vehicles, namely incorporation of the useful life concept. But through its connection to compliance certification, that concept itself is logically pertinent only to manufacturers’ responsibilities.

duty vehicles in the near future.” See *Technical Support Document: Control of Emissions of Hazardous Air Pollutants from Motor Vehicles and Motor Vehicle Fuels* (December 2000) at 152.

To be sure, the agency had previously pointed out the existence of technical barriers to the implementation of OBD requirements for large vehicles. It had explained in 1999, for instance, that a relatively high proportion of large heavy-duty vehicles, such as cement mixers and refrigerator trucks, have “power take-off units,” which use engine energy to operate ancillary equipment that users keep running much of the time; as EPA’s OBD rules for covered vehicles (i.e., ones under 14,000 pounds) allow diagnostics to be disabled during such power take-off operations, imposition of the same requirement on the very heavy ones would be largely ineffective. *Control of Emissions of Air Pollution From 2004 and Later Model Year Heavy-Duty Highway Engines and Vehicles*, 64 Fed. Reg. 58,472, 58,515 (Oct. 29, 1999). In addition, EPA had said that the lack of vertical integration in the field made it hard to coordinate the “engine, transmission, chassis, and safety related diagnostics.” *Id.*

But even assuming these explanations are enough, EPA failed to provide them in the rulemaking, depriving petitioners of an opportunity to offer rebuttal or to show that some sort of requirement might still make sense—a point that EPA seems implicitly to have conceded in its reference to likely future proposals. See *Technical Support Document* at 152; see also Respondent’s Br. at 30. Indeed, those assurances raise the question whether its 1999 observations, on which its brief relies here, fully reflected its thinking at the time of this rulemaking. The decision being at best inadequately explained, we remand for further explanation, though not necessarily for further notice-and-comment rulemaking. See, e.g., *Nat’l Grain and Feed Ass’n v. OSHA*, 903 F.2d 308, 310–11 (5th Cir. 1990) (applying the “usual rule that a reviewing court should leave the agency free on remand to determine whether supplemental fact-gathering is necessary”).

### 3. Listing of Diesel Exhaust

Finally, we turn to International Truck's contention that it was unlawful for EPA to list diesel exhaust as a mobile air toxic that may be regulated in the future. The listing makes clear that it excludes nontoxic components of diesel exhaust, and that EPA intends the "listing" simply to focus its own and others' attention on emissions "potentially responsible" for adverse health effects, or posing a "potential concern for public health." See Final Rule, 66 Fed. Reg. at 17,236/1-2. We dismiss this complaint, however. Under the familiar test of *Abbott Laboratories v. Gardner*, 387 U.S. 136, 149 (1967), looking to the fitness of the issues for judicial review and the hardship to the parties of withholding such review, the mere listing of diesel exhaust for purposes of future consideration presents no ripe issue.

Petitioners claim that the issue is purely legal, and thus presumptively fit for review. Specifically, they argue that § 202(l)(2) authorizes regulations of "hazardous air pollutants," and that diesel exhaust is not a "hazardous air pollutant" within the meaning of 42 U.S.C. § 7412(a)(6). That section defines "hazardous air pollutants" as ones initially listed as such in § 7412(b) or that the agency has listed by going through an elaborate process set out in § 7412(b). But this definition applies only "[f]or purposes" of § 7412 itself (except for subsection (r)), and has no bearing on the term as it appears in § 202(l)(2). Thus the only issue is the propriety of deciding whether a particular chemical is worthy of further study, an issue for the review of which we can see no legal benchmark.

And as to hardship, International Truck points us only to various initiatives of the EPA and the Department of Defense to study the health effects of diesel exhaust. But these are not, so far as appears, actions *legally* triggered by the listing, as were the regulatory consequences that flowed from an agency listing of dioxin as a substance "known to be a human carcinogen," which in *Tozzi v. HHS*, 271 F.3d 301, 310 (D.C.

Cir. 2001), we found enough to show ripeness. Nor do they match the consequences that flow from inclusion of a site on CERCLA's "National Priorities List"—a drastic reputational loss and sharply heightened exposure to very costly enforcement actions—which in *Mead v. Browner*, 100 F.3d 152, 155 (D.C. Cir. 1996), we found adequate for a different issue, standing. Thus we dismiss International's petition for want of jurisdiction.

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In sum, the claims of the environmental and state petitioners are denied on the merits, except for the remanded issue of on-board diagnostics, and that of International is dismissed as unripe.

*So ordered.*