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Clean Air Act Issues in the 106th Congress

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SUMMARY

Congress last enacted major amendments to the Clean Air Act in 1990, and the Environmental Protection Agency (EPA) is in the midst of implementing numerous provisions of those amendments. Recent efforts include development of tighter emission standards for vehicles and fuels, promulgation of programs to control regional haze and ozone transport, implementation of controls on sources of 188 air toxics, implementation of Phase 2 of the acid precipitation program, and review of state implementation plans for attaining ozone air quality standards. EPA decisions regarding implementation of these and other programs mandated by the Clean Air Act will provide opportunities for oversight in the remaining days of the 106th Congress.

On the legislative front, bills to diminish the use of MTBE, a gasoline additive, are at the top of the clean air agenda. MTBE is used to meet Clean Air Act requirements that gasoline sold in the nation's worst ozone nonattainment areas contain at least 2% oxygen. The additive makes gasoline burn more cleanly, but it has been implicated in numerous incidents of ground water contamination. Markup of legislation to restrict MTBE use or to waive the oxygen requirement is possible in both House and Senate committees, although the prospects for passage by the full House or Senate remain clouded. Of particular concern are the potential impacts of any such legislation on the use of other oxygenates, principally ethanol. Ethanol is made largely from corn; Governors, Members and Senators from agricultural states are concerned that changes in the Act not adversely affect ethanol's use.

The Clean Air Act and its 1990 amendments appear to have contributed to a marked improvement in air quality nationwide. Of nearly 100 metropolitan areas not meeting air quality standards for ozone in 1990, about two-thirds now do so. Even greater progress has been achieved with carbon monoxide: 36 of 42 areas not in attainment in 1990 now meet the standard. Nevertheless, EPA remains concerned about air pollution. In 1997, the Agency promulgated major revisions to its air quality standards for ozone and particulates, an action that would require most states and urban areas to establish additional controls on a wide range of pollution sources. The revised standards were challenged by numerous parties and the courts have remanded the standards to EPA. Implementation is currently in limbo, pending resolution of appeals.

Other issues that could be the subject of legislation or oversight include how and whether to control long-distance ozone transport, including the desirability of additional regulation for sources of nitrogen oxides such as electric utilities, and whether plans for new highways must conform to emission budgets under the Clean Air Act. A Senate subcommittee has also begun hearings concerning reauthorization of the Act. These hearings are expected to continue this year.

The current Congress has already taken action on one Clean Air Act issue. On August 5, 1999, the President signed S. 880 (P.L. 106-40), a bill that modified the Act's risk management planning requirement for facilities that handle extremely hazardous substances.

ote: This Issue Brief does not discuss the "greenhouse effect" or issues related to global climate change. For a discussion of those issues, see CRS Issue Brief IB89005, *Global Climate Change*, updated regularly.

MOST RECENT DEVELOPMENTS

EPA Administrator Carol Browner, in a joint press conference with Agriculture Secretary Glickman, March 20, pressed Congress to enact legislation to "significantly reduce or eliminate" use of MTBE in gasoline, while boosting the use of ethanol. Browner's statement, which in large part repeated earlier EPA positions, called on Congress to amend the Clean Air Act to replace a requirement that reformulated gasoline use oxygenates, while preserving requirements that such gasoline reduce motor vehicle emissions.

House and Senate committees had already begun work on targeted amendments to the Clean Air Act. On February 2, 2000, the Senate Environment and Public Works Committee reported an amended version of S. 1053. The bill would ease Clean Air Act restrictions on the funding of highway projects that do not conform with plans for achieving air quality standards. On September 30, 1999, the House Commerce Subcommittee on Health and Environment approved an amended version of H.R. 11, a bill to exempt California reformulated gasoline from federal requirements that it contain at least 2% oxygen. The oxygenate requirement has led most refiners to use MTBE, an additive that has contaminated ground and surface waters in California and other states.

Other recent developments affecting implementation of the Clean Air Act have occurred in the courts. On May 22 and May 30, 2000, the Supreme Court agreed to hear appeals from both sides in the case of American Trucking Associations v. EPA. *The case involves whether the Environmental Protection Agency exceeded its authority in promulgating new air quality standards for ozone and particulate matter in July 1997. On October 29, 1999, the U.S. Court of Appeals for the District of Columbia Circuit had denied EPA's request for a rehearing in the case, leaving standing a May 1999 decision that remanded the Agency's standards. On March 3, 2000, on the other hand, the Agency achieved a legal victory when the same Court of Appeals upheld its authority to issue what is called the NOx SIP call, or Ozone Transport Rule, requiring power plants in the Midwest and Southeast to install controls to prevent the transport of pollution to the Northeast.*

BACKGROUND AND ANALYSIS

The Clean Air Act requires the Environmental Protection Agency (EPA) to establish minimum national standards for air quality, and assigns primary responsibility to the states to assure compliance. Areas not meeting the standards, referred to as nonattainment areas, are required to implement specified air pollution control measures. The Act establishes federal standards for autos and other mobile sources of air pollution, for sources of 188 hazardous air pollutants, and for the emissions that cause acid rain. It establishes a comprehensive state-run permit system for all major sources of air pollution. It also addresses the prevention of pollution in areas with clean air, as well as protection of the stratospheric ozone layer.

The last comprehensive amendments to the Act, enacted November 15, 1990 (P.L. 101-549), included the program to control acid rain, new standards for emissions of hazardous air pollutants, new requirements for motor vehicles and fuels, and stringent new requirements for nonattainment areas.

Many of these provisions (notably the acid rain and air toxics provisions, and some of the requirements for autos and fuels) were strenuously debated, but most have not been subject to controversy since enactment. The new provisions on acid rain, air toxics, and automobiles have generally been implemented on schedule, in many cases at less cost than anticipated. There have also been noticeable improvements in air quality in recent years: of 98 metropolitan areas not attaining the 1-hour ozone standard in 1990, two-thirds now do so. Even greater progress has been achieved with carbon monoxide: 36 of the 42 areas not in attainment in 1990 now meet the standard. Nevertheless, major controversies remain concerning implementation of the Act.

Issues in the 106th Congress

MTBE and Reformulated Gasoline

Under the Clean Air Act Amendments of 1990, numerous areas with poor air quality are required to add chemicals called "oxygenates" to gasoline as a means of improving combustion and reducing emissions. The Act has two programs that require the use of oxygenates, but the more significant of the two is the reformulated gasoline (RFG) program, which took effect January 1, 1995. Under the RFG program, areas with "severe" or "extreme" ozone pollution (82 counties with a combined population of 55 million) must use reformulated gas; areas with less severe ozone pollution may opt into the program as well, and many have. In all, portions of 17 states and the District of Columbia use RFG, and a little more than 30% of the gasoline sold in the United States is RFG.

The law requires that RFG contain at least 2% oxygen by weight. Refiners can meet this requirement by adding a number of ethers or alcohols, any of which contain oxygen and other elements. By far the most commonly used oxygenate is MTBE. In 1999, 87% of RFG contained MTBE. MTBE has also been used since the late 1970s in non-reformulated gasoline, as an octane enhancer, at lower concentrations. As a result, gasoline with MTBE has been used virtually everywhere in the United States, whether or not an area has been subject to RFG requirements.

State and local environmental agencies and EPA attribute marked improvements in air quality to the use of oxygenated and reformulated gasoline. The improvements in air quality have not come without controversy. In Alaska and Wisconsin, residents complained of a wide array of effects, including headaches, dizziness, nausea, sore eyes, and respiratory irritation, from exposure to gasoline/MTBE exhaust, before refiners switched to alternative gasoline formulations using ethanol. MTBE from a number of sources, including leaking underground storage tanks, has also been linked to contamination of drinking water supplies.

For a variety of reasons, concerns over MTBE have focused on California in recent years. California has the most extensive reformulated gasoline requirements in the country, with state requirements separate and in addition to the federal. In addition, it has experienced the most significant contamination of drinking water by MTBE. The incidents of drinking water contamination led the state legislature in October 1997 to enact legislation to require state standards for MTBE in drinking water and to require the University of California (UC) to conduct a study of the health and environmental effects of MTBE. The UC report, issued

in November 1998, recommended a gradual phase-out of MTBE use in the state. Based on the report and on subsequent public hearings, on March 25, 1999, Governor Davis of California signed an Executive Order to require a phase-out of MTBE use in the state by December 31, 2002, and requested a waiver of federal requirements to use oxygenates in reformulated gasoline. The waiver request has resulted in months of negotiation between EPA and California, with EPA initially expressing skepticism that it had authority to grant a waiver under the circumstances. A decision on the request is not expected before summer 2000. Without a waiver, ozone nonattainment areas in the state would be required to substitute another oxygenate (most likely, ethanol) when the MTBE ban takes effect.

The MTBE issue received additional attention in late July 1999, when an advisory panel reported to EPA Administrator Carol Browner. The Blue-Ribbon Panel on Oxygenate Use in Gasoline, composed of industry representatives, state and local officials, environmentalists, academics, and others, recommended that Congress remove the RFG program's oxygenate requirement and clarify state authority to regulate gasoline components. Subsequently, on August 4, the Senate adopted by voice vote Senator Boxer's amendment to the FY2000 Agriculture appropriations bill (S. 1233) expressing the sense of the Senate that use of MTBE should be phased out.

The principal issues for Congress are whether Clean Air Act provisions concerning oxygenate use in reformulated gasoline should be waived to allow refiners to discontinue or lessen their use of MTBE and whether stronger steps, such as a ban on MTBE use, should be considered. Legislation to provide a waiver for California refiners (H.R. 11 / S. 266) has the nearly unanimous support of that state's congressional delegation. The legislation would remove the oxygenate requirement for refiners and marketers of RFG provided that the fuel continues to meet all performance (i.e., emission reduction) standards. The bill would apply in California only — not in other states.

The House Commerce Subcommittee on Health and Environment approved H.R. 11, with an amendment, September 30, 1999. Amendments to phase out the use of MTBE, to apply the bill's provisions to areas outside California, and to address international trade issues related to MTBE phase-out were offered and withdrawn during markup, and may need to be addressed before the bill is considered by the full committee. A hearing on these issues was held March 2, 2000, by the Health and Environment Subcommittee. Separate legislation allowing additional flexibility in all states (S. 645, S. 1886, S. 2503, S. 2546, H.R. 1705, H.R. 3449, H.R. 4011, and H.R. 4120) has also been introduced, as have eight bills (H.R. 1367, H.R. 1398, H.R. 1705, H.R. 3449, H.R. 4011, H.R. 4303, S. 1037, and S. 2546) that would phase-out or ban the use of MTBE in gasoline. (For additional discussion of the MTBE issue, see CRS Report 98-290, *MTBE in Gasoline: Clean Air and Drinking Water Issues*.)

While support for waiving the oxygenate requirement seems to be building among environmental groups, the petroleum industry, and states, a potential obstacle to enacting legislation lies among agricultural interests. About 6% of the nation's corn crop is used to produce a competing oxygenate, ethanol. If MTBE use is reduced or phased out, but the oxygen requirement remains in effect, ethanol use would likely soar, increasing demand for corn. Conversely, if the oxygen requirement is waived by EPA or legislation, not only would MTBE use decline, but so, likely, would demand for ethanol. Thus, Members, Senators, and Governors from corn-growing states have taken a keen interest in MTBE legislation. Unless their interests are addressed, they might pose a potent obstacle to its passage.

Reflecting these dual concerns, EPA Administrator Carol Browner and Agriculture Secretary Dan Glickman called on Congress at a press conference, March 20, 2000, to amend the Clean Air Act to "significantly reduce or eliminate" the use of MTBE and to require the use of ethanol in all gasoline. EPA also announced that it would begin the process of requiring a phase-out of MTBE under Section 6 of the Toxic Substances Control Act, a process likely to take "several years" in EPA's estimation. Legislation to mandate the use of ethanol while allowing limits on MTBE use (S. 2503) was introduced by Senators Daschle and Lugar, May 4.

Regulation of Diesel Fuel / Emissions

A new issue on which Congress may hold oversight hearings is the regulation of diesel fuel and diesel engine emissions. Diesel emissions have been among the least regulated major sources of air pollution. While automobiles have been required to reduce emissions more than 90% since the 1970s and face even tighter controls under standards promulgated February 10, diesel emissions have faced relatively few controls.

On May 17, 2000, however, EPA began the process of changing this situation, proposing a greater than 90% reduction in allowable emissions from new diesel engines beginning in 2007. Because sulfur interferes with the effectiveness of the likely emission control technologies, the Agency also proposed a 97% reduction in the allowable sulfur content of diesel fuel, from 500 to 15 parts per million (ppm), effective in June 2006. The proposal appeared in the *Federal Register* June 2.

Engine manufacturers are largely satisfied with the rule, but refiners, service station owners, and the trucking industry argue that achieving the proposed fuel standards would be difficult and costly, would likely result in refinery closures, and could cause shortages of diesel fuel. Instead of 15 ppm, refiners have backed a 50 ppm sulfur standard; EPA and the engine manufacturers say that would not be sufficiently stringent to permit optimal operation of pollution controls. EPA agrees that meeting the sulfur reduction standard will result in increased cost, but places the cost at 3-4 cents per gallon.

As EPA's proposal noted, "The diesel engine is a vital workhorse in the United States, moving much of the nation's freight, and carrying out much of its farm, construction, and other labor." As a result, this proposal affects an unusually large number of economic sectors, and is likely to generate substantial controversy. The Agency plans five public hearings in New York, Chicago, Atlanta, Los Angeles, and Denver during the month of June, and will take public comments until August 14. Congressional oversight hearings are also considered likely.

Risk Management Plans

One Clean Air Act issue that has been the subject of enacted legislation in the 106th Congress is the requirement in Section 112(r) of the Act that operators of stationary sources which produce, process, handle, or store certain extremely hazardous substances prepare risk management plans. The plans are required for facilities that possess more than threshold levels of any of 77 acutely toxic substances or 63 flammable gases; more than 64,000 facilities were believed to be covered by the requirement when it was promulgated. The plans

had to be submitted to EPA by June 21, 1999, and the Act requires that they be made available to the public.

Two issues raised by these regulations were the inclusion of small businesses that use or store propane among the regulated entities, and security concerns raised by the Act's requirement that risk management plans include an evaluation of worst case accidental releases. These concerns were addressed by legislation (S. 880, P.L. 106-40) signed by the President August 5, 1999. As enacted, the bill exempts flammable fuels that are not acutely toxic from the risk management planning provision and establishes a one-year moratorium on public electronic release of detailed information about worst-case accident scenarios. Qualified state and local officials, including fire fighters, will have access to the data during this period, but the general public will not. EPA is to use the moratorium period to regulate distribution of detailed off-site consequence analysis information in order to minimize increases in risk of terrorist and criminal activity, the likelihood of accidental releases, and the likelihood of harm to public health and welfare. In addition, the bill requires companies that file risk management plans, with some exceptions, to hold public meetings to discuss their off-site consequence analyses. (For additional information, see CRS Report RL30228, *Accident Prevention Under the Clean Air Act Section 112(r): Risk Management Planning by Propane Users and Internet Access to Worst-Case Accident Scenarios*.)

Sanctions and "Conformity"

Under the Clean Air Act, there are two provisions that can result in denial of federal highway funding to local areas: sanctions and a lapse in what is called "conformity." The sanction authority is found in Sections 179 and 110(m) of the Act. Under these sections, the EPA Administrator is required to impose highway fund and other sanctions on areas 18 - 24 months after reaching a finding that an area has not submitted or not implemented adequate plans to attain air quality standards. The Act authorizes EPA to use two types of sanctions: 1) imposing what are called "2:1 offsets" on new or modified sources of emissions; and 2) withholding certain federal highway funds. Under the sanction regulations, EPA first imposes the offset sanction, 18 months after reaching a finding (unless the deficiency has been corrected). If the deficiency has still not been corrected 6 months later, both sanctions are applied. It is not failure to attain air quality standards that leads to sanctions, but failure to submit an acceptable plan or to implement the measures identified therein.

When highway fund sanctions are imposed, not all funding is affected. Projects are exempt from sanctions when the Department of Transportation determines that the principal purpose is an improvement in safety. In addition, despite sanctions, DOT may approve several types of projects geared toward improvement of air quality, including transit projects, HOV lanes, breakdown lanes, projects to improve traffic flow, and park-and-ride lots.

The threat of sanctions is a powerful tool; but, perhaps because the threat is powerful, the imposition is a rare event. Since 1990, only 2 areas have had highway sanctions imposed.

Conformity requirements, found in Section 176 of the Act, have been invoked more frequently. This section prohibits federal departments and agencies from approving, permitting, or providing financial support to transportation improvements in areas that have not attained air quality standards, unless such improvements conform with the State Implementation Plan for achieving air quality. Conformity determinations are also a powerful

tool — one meant to integrate transportation and air quality planning. Areas in 29 states have experienced a lapse of conformity at some time since 1993, and 5 areas, the largest of which is Atlanta, currently have lapsed conformity.

Conformity lapses operate in a fashion similar, in some respects, to highway fund sanctions. As with sanctions, exceptions are provided for highway projects that will improve safety or air quality. Further limiting their impact, conformity lapses have, until recently, been applied only to new projects. In many cases, an area simply waits until its next revision of its Transportation Improvement Program (TIP) or its State Implementation Plan to revise the proposed project or through other measures to return to conformity. Thus, until recently, few areas lost funding despite a conformity lapse.

One reason that conformity has come to the attention of Congress in the past year is a court decision: on March 2, 1999, the U.S. Court of Appeals for the District of Columbia Circuit ruled that the Clean Air Act limits grandfathering of funding in conformity situations, overturning EPA's regulations and considerably raising the stakes for Atlanta and other areas that are subject to a conformity lapse. EPA and the Department of Transportation subsequently reached agreement on procedures to implement the court's decision, and the Agency announced on April 16, 1999, that it would not appeal the decision.

This decision and another case awaiting trial in Missouri aroused congressional interest in the sanctions and conformity issues. Two bills (Senator Bond's S. 495 and Representative Baker's H.R. 1626) would repeal the highway fund sanction provisions, and five other bills (Senator Bond's S. 1053, Representative Talent's H.R. 1876, Representative Linder's H.R. 3583, Representative Lewis's H.R. 3686, and Senator Cleland's S. 2088) would either restore the grandfather provisions of the conformity rule overturned by the March 2 court ruling or provide funding to certain transportation projects during a conformity lapse.

The Senate Environment and Public Works Committee held a hearing on the conformity issue July 14 and ordered S. 1053 reported, with substantial amendments, September 29. (The report, S.Rept. 106-228, was filed February 2, 2000.) As amended, the bill would restore the grandfather provisions in effect prior to the March 1999 court decision for a period of one year while EPA writes new regulations. The bill also stipulates that certain projects, including any project approved prior to the court decision, may be implemented even if conformity lapses. It establishes new requirements regarding approval of emissions budgets by EPA, allows the use of non-federal funds for right-of-way acquisition and highway design during periods of conformity lapse, and delays the application of conformity to areas that may be designated nonattainment under the pending 8-hour ozone standard. (For additional background, see CRS Report RL30131, *Highway Fund Sanctions and Conformity Under the Clean Air Act*, updated October 15, 1999.)

Ozone Transport Rule

While not the subject of legislation so far in this Congress, another subject of concern is the ozone transport rule promulgated by EPA on October 27, 1998, and subsequent EPA actions related to ozone transport. The rule, a major element of the ongoing effort to reduce ozone concentrations in the Northeastern states, implements a regional strategy for reductions in emissions of NOx, a pollutant that combines with volatile organic compounds to form ozone in areas downwind of its release.

The ozone transport rule grew out of the efforts of the Ozone Transport Assessment Group (OTAG) to develop a regional strategy for NOx reductions. In June 1997, OTAG (a group composed of the 37 easternmost states) completed its work, recommending regional measures to reduce NOx emissions, but specifying only a broad range rather than an agreed percentage for the targeted reductions. EPA promulgated its regulations implementing the OTAG recommendations on October 27, 1998, calling for average reductions of 28% in NOx emissions in 22 Eastern states and the District of Columbia (later revised to 25%). These reductions would be implemented through State Implementation Plans, beginning in May 2003. The SIPs were to be submitted to EPA by September 30, 1999.

The degree to which the regulations impose additional requirements on utilities and other sources of NOx is the prime area of controversy. The accuracy of the modeling used to determine the distribution of the needed reductions, the form of emissions trading to be allowed under the regulations, and the amount (or lack) of flexibility EPA will give to the states in planning reductions are other issues.

The rule was also a centerpiece of the Agency's implementation plan for the new 8-hour ozone air quality standard, which was overturned on May 14, 1999. The trigger for the ozone transport rule was the statutory 1-hour standard, not the 8-hour standard. However, it was coupled with the 8-hour standard in the final rule. Apparently, EPA's commingling of the standards was sufficient for the U.S. Court of Appeals for the D.C. Circuit to issue an indefinite stay of the transport rule on May 25, 1999 (*Michigan* v. *EPA*). On March 3, 2000, however, the Court upheld EPA's authority to issue the transport rule. While this decision is subject to further appeal, it now appears more likely that the rule will be implemented in something close to the form promulgated.

In a related action, EPA has decided on an approach to what are referred to as the "Section 126 petitions." Under Section 126, any state or political subdivision may petition EPA for a finding that stationary sources in another state are significantly contributing to nonattainment problems in their state. In response to petitions from 8 Northeastern states, EPA found in April, 1999, that 19 Midwestern and Southern states (and D.C.) contributed to nonattainment problems in 6 of the petitioning states with respect to the 8-hour standard, and 12 Midwestern and Southern states (and D.C.) contributed to nonattainment difficulties with respect to the 1-hour standard. Implementation of this finding was to be contingent and coordinated with the state's response to the Ozone Transport Rule (OTR). In June, 1999, however, in response to the court stay of the OTR, EPA announced its intention to decouple the Section 126 findings from the Ozone Transport Rule, and its findings under the 1-hour and 8-hour standards. EPA took final action on four Section 126 petitions December 17, 1999, imposing NOx control requirements on 392 stationary sources located in the 12 states and D.C. The required controls take effect in May 2003.

The transport rule, Section 126 petitions, and other measures (both state and EPA lawsuits) aimed at reducing emissions from electric utilities have come to the attention of Members of Congress from some of the affected states, but there has been no action in the 106th Congress. In the 105th Congress, two bills introduced by Representatives Wise and Ney (H.R. 3690 and H.R. 4136) would have required additional data collection before promulgation of a final ozone transport rule and would have postponed the rule's effective date until no earlier than 2005. No action was taken on these bills. (For additional information on the OTAG process and the promulgated rule, see CRS Report 98-236, *Air*

Quality: EPA's Ozone Transport Rule, OTAG, and Section 126 Petitions — A Hazy Situation?)

Implementation of the National Ambient Air Quality Standards

Another issue that Congress has followed closely, but where the current focus of attention is in the courts, is that of the revised air quality standards promulgated by EPA in 1997. Under the Clean Air Act, EPA sets national standards for ambient (outdoor) air quality and is directed to review the standards every 5 years. On July 18, 1997, the Agency completed its review of two of the six standards, promulgating a new standard for fine particulates (referred to as $PM_{2.5}$) and revised standards for ozone and coarse particles (PM_{10}). (For background on the standards, see CRS Report 97-8, *Air Quality: Background Analysis of EPA's 1997 Ozone and Particulate Matter Standards*.)

The net impact of the promulgated standards would be increased stringency. Several hundred areas now considered to be in compliance with the National Ambient Air Quality Standards (NAAQS) for ozone and particulates are likely not to meet the new standards (as compared to fewer than 100 areas under the old standards). Such an increase in the number of nonattainment areas would have broad implications for the states, affected industries, economic sectors such as agriculture and transportation, and individuals. As a result, Congress has remained interested in the standards and decisions regarding their implementation, and numerous groups have sued EPA to overturn them.

On May 14, 1999, the U.S. Court of Appeals for the D.C. Circuit, in a case filed by the American Trucking Associations and 37 other plaintiffs, remanded both the ozone and particulate standards to EPA. In a split decision (2-1), the court ruled that EPA had unconstitutionally usurped legislative powers. In Sections 108 and 109 of the Clean Air Act, Congress directed EPA to establish ambient air quality standards necessary to protect public health with an adequate margin of safety. But the court found that EPA exercised legislative discretion in actually setting the ozone and PM standards, since it was not clear from the statute or from EPA's interpretation of it where the standard should be set. "Although the factors EPA uses in determining the degree of public health concern associated with different levels of ozone and PM are reasonable, EPA appears to have articulated no 'intelligible principle' to channel its application of these factors; nor is one apparent from the statute," according to the opinion.

The court also considered several other issues — rejecting five arguments the plaintiffs made regarding both standards, but finding in favor of the plaintiffs on various issues specific to one or the other standard. Regarding ozone, the court ruled that the 1990 Clean Air Act Amendments preclude EPA from enforcing a revised ozone standard as a result of language in Section 181(a) that requires all nonattainment areas to be classified on the basis of the old 1-hour ozone standard. The court also held that the Agency erred in not considering possible benefits of ground-level ozone in its analysis of the health effects of the pollutant. Regarding particulates, the court concluded that EPA's choice of PM_{10} as the indicator for coarse particles was arbitrary and capricious. The court concluded that there was "ample support" for the Agency's decision to regulate coarse particles, but argued that the Agency needed to choose an indicator such as $PM_{10-2.5}$ (particles smaller than 10 microns but larger than 2.5) rather than PM_{10} (all particles smaller than 10 microns, including fine particles) in its regulations aimed to control the coarse fraction.

The 105th Congress conducted a number of oversight hearings on standards-related issues and enacted legislation (P.L. 105-178, Title VI) to address some of the concerns raised. The legislation codified EPA's announced implementation schedule, giving the Agency until July 2000 to designate ozone nonattainment areas and December 2005 to designate $PM_{2.5}$ areas (the schedule was longer than that mandated under the Clean Air Act, and some had feared that EPA would be forced by court challenges to implement a speedier schedule).

Beyond concerns over implementation, many in Congress remain concerned that the ozone standard is too strict and will not achieve improvements in public health commensurate with its cost. Many have also questioned the fine particle standard — particularly whether the Agency had sufficient information to determine the appropriate level of the standard, and whether the observed health effects noted in the underlying research were caused by fine particles of all kinds or by some specific subset. The court's decision did not support many of the specific issues raised, but its effect is likely to be a delay in implementation of the standards. How long will depend on the results of further appeals.

After reviewing the court's decision, EPA Administrator Browner categorized it as "extreme, illogical, and bizarre." Since numerous environmental statutes give discretion to the Administrator similar to that termed unconstitutional in this decision, the decision — if left unchallenged — could reshape dramatically EPA's authority to promulgate regulations. Acting on EPA's behalf, the Justice Department requested a rehearing by the full (en banc) Court of Appeals, but the court rejected the request October 29. An appeal to the Supreme Court was accepted on May 22, with oral argument expected in the fall 2000 term. On May 30, the Court also accepted an appeal from the American Trucking Associations and the U.S. Chamber of Commerce, who asked the Court to determine whether EPA must ignore non-health factors, including cost, when it sets National Ambient Air Quality Standards. (For a further discussion of the appeals court ruling, see CRS Report RS20228, *The D.C. Circuit Remands the Ozone and Particulate Matter Clean-Air Standards: American Trucking Associations v. EPA*, June 10, 1999.)

Although legislation on the standards may be introduced, Congress is likely to function as an interested observer until the appeals process runs its course. Nevertheless, the case raises important issues regarding congressional delegation of authority that Members may wish to address at some point in the future.

LEGISLATION

P.L. 106-40, S. 880 (Inhofe)

Amends the Clean Air Act to remove flammable fuels from the list of substances with respect to which reporting and other activities are required under the risk management plan program of Section 112(r). Introduced April 26, 1999; referred to Committee on Environment and Public Works. Reported, amended, June 9, 1999 (S.Rept. 106-70). Passed Senate June 23, 1999. Passed House, amended, July 21, 1999. Senate agreed to House amendments, August 2, 1999. Signed into law August 5, 1999.

H.Con.Res. 256 (Ewing)

Expresses the sense of the Congress that the U.S. Government should promote the continued use of ethanol in reformulated gasoline, allow state and local governments the

option of limiting the use of MTBE as an oxygenate, and require EPA to revise the Phase II RFG regulations to allow ethanol to remain a viable oxygenate within the RFG program. Introduced February 29, 2000; referred to Committee on Commerce.

H.R. 11 (Bilbray)

Amends the Clean Air Act to permit exclusive application of California state regulations regarding reformulated gasoline in federal RFG areas within the state. Introduced January 6, 1999; referred to Committee on Commerce. Hearing held, May 6, 1999, by Subcommittee on Health and Environment. Approved, amended, by Subcommittee on Health and Environment, September 30, 1999.

H.R. 25 (Boehlert)

To reduce acid deposition by requiring additional controls on sources of sulfur dioxide and nitrogen oxides and to provide for a study and controls on emissions of mercury. Introduced January 6, 1999; referred to Committee on Commerce.

H.R. 236 (Rogan)

Amends the Clean Air Act to exempt prescribed burning on National Forest lands from regulation under the Act for a period of 10 years after enactment. Introduced January 6, 1999; referred to Committee on Commerce.

H.R. 657 (Sweeney)

To reduce acid deposition. Similar to H.R. 25. Introduced February 9, 1999; referred to Committee on Commerce.

H.R. 888 (Kildee)

Clean Gasoline Act of 1999. Amends the Clean Air Act to limit sulfur concentrations in gasoline. Introduced March 1, 1999; referred to Committee on Commerce.

H.R. 1367 (Franks)

Amends the Clean Air Act to prohibit the use of the fuel additive MTBE in gasoline. Introduced April 12, 1999; referred to Committee on Commerce.

H.R. 1395 (Hunter)

Amends the Clean Air Act to prohibit imports of gasoline to California and to suspend the application of RFG and oxygenated fuel requirements of state and federal law in California when the retail price of gasoline in the state is 20% greater than its average in the most recent 3-year period. Introduced April 13, 1999; referred to Committee on Commerce.

H.R. 1398 (Pombo)

Amends the Clean Air Act to prohibit the use of the fuel additive MTBE in gasoline. Introduced April 14, 1999; referred to Committee on Commerce.

H.R. 1626 (Baker)

Amends the Clean Air Act to repeal the highway fund sanctions. Introduced April 29, 1999; referred to Committee on Commerce.

H.R. 1705 (Pallone)

Amends the Clean Air Act to waive the oxygenate requirement for reformulated gasoline and to phase out the use of the fuel additive MTBE in gasoline; requires a study by the National Academy of Sciences on the health and environmental effects of all gasoline oxygenates. Introduced May 5, 1999; referred to Committee on Commerce.

H.R. 1755 (Filner)

Border Smog Reduction Accountability Act. Provides for reimbursing states for the costs they incur in implementing the Border Smog Reduction Act of 1998. Introduced May 11, 1999; referred to Committee on Commerce.

H.R. 1790 (Bliley)

Chemical Safety Information and Site Security Act of 1999. Limits public disclosure of accidental release scenario information in risk management plans required under Section 112(r) of the Clean Air Act. Introduced May 13, 1999; referred to Committees on Commerce, Government Reform, and Judiciary. Hearings held by Commerce Subcommittee on Health and Environment May 19 and 26.

H.R. 1876 (Talent)

Amends the Clean Air Act to incorporate the grandfather provisions of the transportation conformity regulations, as in effect on March 1, 1999. Introduced May 19, 1999; referred to Committee on Commerce.

H.R. 2427 (Cox)

Amends the Clean Air Act to remove a provision limiting air pollution grants to individual states to no more than 10% of the total amount appropriated or allocated. Introduced July 1, 1999; referred to Committee on Commerce.

H.R. 2556 (Wolf)

National Telecommuting and Air Quality Act. Requires the Secretary of Transportation to make a grant to a nonprofit private entity to design a pilot program on telecommuting as a means of reducing emissions of air pollutants that are precursors to ground level ozone. Introduced July 19, 1999; referred to the Committees on Commerce and on Transportation and Infrastructure.

H.R. 2667 (Allen)

Omnibus Mercury Emissions Reduction Act of 1999. Amends the Clean Air Act to establish requirements for operation of fossil fueled electric utility generators, commercial and industrial boilers, incinerators, chlor-alkali plants, and Portland cement plants to reduce mercury emissions. Introduced August 2, 1999; referred to Committee on Commerce.

H.R. 2900 (Waxman)

Clean Smokestacks Act of 1999. Amends the Clean Air Act to require reductions in emissions of sulfur dioxide, nitrogen oxides, mercury, and carbon dioxide from electric power plants and to subject older power plants to New Source Performance Standards. Introduced September 21, 1999; referred to Committee on Commerce.

H.R. 2980 (Allen)

Clean Power Plant Act of 1999. Amends the Clean Air Act to require reductions in emissions of sulfur dioxide, nitrogen oxides, mercury, carbon dioxide, and hazardous air pollutants from electric power plants and to provide assistance for workers and communities adversely affected by reduced consumption of coal. Introduced September 30, 1999; referred to Committees on Commerce, on Education and the Workforce, on Transportation and Infrastructure, on Banking and Financial Services, and on Science.

H.R. 3298 (Barr)

Amends the Clean Air Act to exclude from nonattainment areas all counties within a metropolitan statistical area that do not have monitoring data showing violations of air quality standards. Introduced November 10, 1999; referred to Committee on Commerce.

H.R. 3326 (Nadler)

Cleaner Buses for Cleaner Cities Act. Prohibits the making of grants for transportation projects to any local government or entity that has in the previous year purchased diesel-fueled buses for use in an ozone, carbon monoxide, or particulate nonattainment area. Introduced November 10, 1999; referred to Committees on Commerce and on Transportation and Infrastructure.

H.R. 3449 (Greenwood)

Amends the Clean Air Act to provide that petitioning states may waive the requirements concerning the oxygen content of RFG and to provide for a scheduled phasedown of MTBE use. Introduced November 18, 1999; referred to Committee on Commerce.

H.R. 3522 (Andrews)

Amends the Clean Air Act to establish voucher systems for motor vehicle inspection and maintenance in States that have contracted out vehicle testing and inspection services. Introduced January 24, 2000; referred to Committee on Commerce.

H.R. 3583 (Linder)

Amends the Clean Air Act to exempt mass transit projects from the conformity determinations required under Section 176(c) of the Act. Introduced February 8, 2000; referred to Committee on Commerce.

H.R. 3686 (Lewis)

Amends the Clean Air Act and titles 23 and 49, U.S. Code, to provide for continued authorization of funding of transportation projects after a lapse in transportation conformity. Introduced February 16, 2000; referred to Committees on Commerce and on Transportation and Infrastructure.

H.R. 3798 (Forbes)

Amends Section 211 of the Clean Air Act to prohibit the use of MTBE as a fuel additive; also amends the Solid Waste Disposal Act to accelerate the cleanup of MTBE released from leaking underground storage tanks, and the Safe Drinking Water Act to assist communities with MTBE contamination in drinking water supplies. Introduced March 1, 2000; referred to Committee on Commerce.

H.R. 4011 (Ganske)
Amends Section 211 of the Clean Air Act to prohibit the use of MTBE, to provide flexibility within the oxygenate requirement of the RFG program, and to promote the use of renewable ethanol. Introduced March 16, 2000; referred to Committee on Commerce.

H.R. 4120 (Shadegg)
Safe Water and Clean Air Attainment Act. Amends the Clean Air Act to permit states to waive the RFG program's oxygenate requirement. Introduced March 29, 2000; referred to Committee on Commerce.

H.R. 4215 (Pombo)
Methyl Bromide Fairness Act of 2000. Amends Title VI of the Clean Air Act to change the schedule for phasing out methyl bromide. Introduced April 6, 2000; referred to Committee on Commerce.

H.R. 4303 (Ewing)
MTBE Elimination Act. Prohibits the use of MTBE and provides for remediation of water contaminated by it. Introduced April 13, 2000; referred to Committee on Commerce.

H.R. 4501 (Bilbray)
Amends the Clean Air Act to reduce ozone concentrations and fuel consumption associated with auto commuting by removing State constraints against employers offering flextime to their employees. Introduced May 19, 2000; referred to Committee on Commerce.

S. 171 (Moynihan)
Amends the Clean Air Act to limit sulfur concentrations in gasoline. Introduced January 19, 1999; referred to Committee on Environment and Public Works.

S. 172 (Moynihan)
To reduce acid deposition. Similar to H.R. 25. Introduced January 19, 1999; referred to Committee on Environment and Public Works.

S. 266 (Feinstein)
Senate counterpart to H.R. 11. Introduced January 20, 1999; referred to Committee on Environment and Public Works.

S. 268 (Feinstein)
Strengthens emission standards for gasoline-powered marine engines. Introduced January 20, 1999; referred to Committee on Environment and Public Works.

S. 495 (Bond)
Repeals the highway fund sanction provisions of the Clean Air Act. Introduced March 2, 1999; referred to Committee on Environment and Public Works.

S. 645 (Feinstein)
Amends the Act to waive the oxygen content requirement for reformulated gasoline. Introduced March 17, 1999; referred to Committee on Environment and Public Works.

S. 673 (Leahy)

Amends the Clean Air Act to establish requirements concerning the operation of fossil fuel-fired electric utility steam generating units, commercial and industrial boiler units, solid waste incineration units, medical waste incinerators, hazardous waste combustors, chlor-alkali plants, and Portland cement plants to reduce emissions of mercury. Introduced March 19, 1999; referred to Committee on Environment and Public Works.

S. 1037 (Boxer)

Amends the Toxic Substances Control Act to provide for reduction in the use of MTBE. Introduced May 13, 1999; referred to Committee on Environment and Public Works.

S. 1053 (Bond)

Amends the Clean Air Act to incorporate the grandfather provisions of the transportation conformity regulations, as in effect on March 1, 1999. Introduced May 14, 1999; referred to Committee on Environment and Public Works. Reported, amended, February 2, 2000 (S.Rept. 106-228).

S. 1470 (Lautenberg)

Chemical Security Act of 1999. Amends the Clean Air Act to ensure that adequate actions are taken to detect, prevent, and minimize the consequences of accidental releases that result from criminal activity that may cause substantial harm to public health, safety, and the environment. Introduced July 30, 1999; referred to Committee on Environment and Public Works.

S. 1521 (Santorum)

National Telecommuting and Air Quality Act. Similar to H.R. 2556. Introduced August 5, 1999; referred to Committee on Commerce, Science, and Transportation.

S. 1731 (Chafee)

Amends the Clean Air Act to provide that certain environmental reports shall continue to be required to be submitted. Introduced October 14, 1999; referred to Committee on Environment and Public Works. Reported October 14 (S.Rept. 106-191). Passed Senate March 27, 2000.

S. 1886 (Inhofe)

Permits Governors to waive the oxygen requirements for reformulated gasoline, and allows the development of voluntary standards to control the release of MTBE from underground storage tanks. Introduced November 9, 1999; referred to Committee on Environment and Public Works.

S. 1949 (Leahy)

Clean Power Plant and Modernization Act of 1999. Promotes the modernization and efficiency of electric power generation capacity, requires reduction of emissions of mercury, carbon dioxide, nitrogen oxides, and sulfur dioxide, requires that all fossil fuel-fired electric utility generating units meet new source review requirements, and promotes the use of clean coal technologies and alternative energy sources. Introduced November 17, 1999; referred to Committee on Finance.

S. 2088 (Cleland)
Similar to H.R. 3686. Introduced February 23, 2000; referred to Committee on Environment and Public Works.

S. 2362 (Voinovich)
Air Quality Standard Improvement Act of 2000. Amends the Clean Air Act to direct the EPA Administrator to consider risk assessments and cost-benefit analyses as part of the process of establishing a new or revised air quality standard. Introduced April 5, 2000; referred to Committee on Environment and Public Works.

S. 2503 (Daschle)
Amends the Clean Air Act to authorize States to regulate harmful fuel additives and to require fuel to contain fuel made from renewable sources. Introduced May 4, 2000; referred to Committee on Environment and Public Works.

S. 2504 (Craig)
Amends Title VI of the Clean Air Act to change the phaseout schedule for methyl bromide. Introduced May 4, 2000; referred to Committee on Environment and Public Works.

S. 2546 (Bond)
Amends the Clean Air Act to prohibit the use of MTBE, to provide flexibility within the oxygenate requirement of the RFG program, and to promote the use of renewable ethanol. Introduced May 11, 2000; referred to Committee on Environment and Public Works.

CONGRESSIONAL HEARINGS, REPORTS, AND DOCUMENTS

U.S. Congress. House. Committee on Commerce. Subcommittees on Health and Environment and Oversight and Investigations. *Internet Posting of Chemical "Worst-Case" Scenarios: A Road Map for Terrorists?* February 10, 1999.

U.S. Congress. House. Committee on Commerce. Subcommittee on Health and Environment. *H.R. 11*. May 6, 1999.

-----. *H.R. 1790, the Chemical Safety Information and Site Security Act of 1999*. May 19 and 26, 1999.

-----. *National Implementation of the Reformulated Gasoline (RFG) Program.* March 2, 2000.

U.S. Congress. House. Committee on Science. Subcommittee on Energy and Environment. *Reducing Sulfur in Gasoline and Diesel Fuel.* July 21, 1999.

----- *Reformulated Gasoline.* September 14 and 30, 1999.

U.S. Congress. Senate. Committee on Environment and Public Works. *Conformity Regulations.* July 14, 1999.

U.S. Congress. Senate. Committee on Environment and Public Works. Subcommittee on Clean Air, Wetlands, Private Property, and Nuclear Safety. *EPA's Risk Management Plan Program of the Clean Air Act.* March 16, 1999.

----- *Proposed Sulfur Standard for Gasoline*. May 18 and 20 and July 29, 1999.

-----. *MTBE*. October 5, 1999.

-----. *Clean Air Act Reauthorization.* October 14, 1999.

FOR ADDITIONAL READING

CRS Issue Briefs

CRS Issue Brief IB97003. *Stratospheric Ozone Depletion: Implementation Issues*, by Larry B. Parker. (Updated regularly)

CRS Reports

CRS Report 98-236. *Air Quality: EPA's Ozone Transport Rule, OTAG, and Section 126 Petitions — A Hazy Situation?*, by Larry Parker and John Blodgett. Updated March 10, 2000. 24 p.

CRS Report RL30298. *Air Quality and Motor Vehicles: An Analysis of Current and Proposed Emission Standards*, by David M. Bearden. September 2, 1999. 21 p.

CRS Report RL30131. *Highway Fund Sanctions and Conformity Under the Clean Air Act*, by James E. McCarthy. Updated October 15, 1999. 8 p.

CRS Report 98-290. *MTBE in Gasoline: Clean Air and Drinking Water Issues*, by James E. McCarthy and Mary Tiemann. Updated March 21, 2000. 18 p.

CRS Report 96-737. *Nitrogen Oxides and Electric Utilities: Revising the NSPS*, by Larry Parker. Updated October 13, 1998. 6 p.

CRS Report RL30228, *Accident Prevention Under the Clean Air Act Section 112(r): Risk Management Planning by Propane Users and Internet Access to Worst-Case Accident Scenarios*, by Linda-Jo Schierow. June 10, 1999. 8 p.

CRS Report RS20163. *Sulfur in Gasoline*, by Stephen Thompson and James E. McCarthy. Updated July 12, 1999. 6 p.

CRS Report RS20228, *The D.C. Circuit Remands the Ozone and Particulate Matter Clean-Air Standards: American Trucking Associations v. EPA*, by Robert Meltz and James E. McCarthy. June 10, 1999. 6 p.