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Testimony of
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on behalf of the National Association of Clean Air Agencies
on the U. S. Environmental Protection Agency's Supplemental Notice of Proposed Rulemaking for Prevention of Significant Deterioration, and Nonattainment New Source Review: Emissions Increases for Electric Generating Units (May 8, 2007), 72 *Federal Register* 26202)
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Good morning. My name is John Paul and I am the Supervisor of the Regional Air Pollution Control Agency, a six-county local agency centered in Dayton, Ohio. I appear today on behalf of the National Association of Clean Air Agencies (NACAA), formerly STAPPA/ALAPCO, which is the national association representing air pollution control agencies in 54 states and territories and over 165 metropolitan areas across the country. I am the Immediate Past-President of ALAPCO and Co-Chair of the New Source Review (NSR) Committee. I am testifying today on EPA's Supplemental proposed rulemaking that would change the emissions test for electric generating units (EGUs) under the NSR program of the Clean Air Act.

I previously testified against this proposal on behalf of NACAA at EPA's public hearing in December 2005. Subsequently, the association submitted written comments opposing this proposal in February 2006. In addition, NACAA filed an *amicus* brief opposing a legal or regulatory interpretation of "modification" that would require an hourly test as an NSR trigger in the Supreme Court case, *Environmental Defense vs. Duke Energy Corporation*. The Supplemental proposal that I now address contains nothing that would cause us to change our views. NACAA continues to strongly oppose this proposed rule and to support continuation of an NSR trigger based on actual annual increases in emissions. The actual annual test is currently the law and should not be changed (*New York v. EPA,* 413 F.3d 3. (D.C. Cir. 2005)).

EGUs are the most significant sources of air pollution in this country. Nationally, utilities are responsible for 66 percent of annual sulfur dioxide (SO_2) emissions and 22 percent of nitrogen oxide (NO_x) emissions. Furthermore, it is important to note that, in some areas of the country, power plant contributions to SO_2 and NO_x levels are

considerably higher. Add to these no fewer than 67 hazardous air pollutants, which power plants also emit in substantial quantities, including mercury, for which electric utilities account for 33 percent of the nation's emissions. In addition, electric utilities are responsible for 40 percent of U.S. carbon dioxide emissions, which contribute to global warming.

Emissions from old, coal-fired EGUs are the single largest contributor to concentrations of SO_2, NO_x, ozone, and $PM_{2.5.}$ A 2005 interim report on NSR from the National Research Council of the National Academy of Sciences found that 71 percent of the nation's coal-fired capacity is between 26 and 56 years old, with emission rates for SO_2 ranging from more than double to quadruple the emission rates of modern coal-fired units built since 1990. It is crucial that, as the primary administrators of the Clean Air Act, states and localities not be foreclosed from controlling emissions from these dirty, old power plants by this proposed rule.

Yet, if finalized, the rule would prevent us from imposing controls and otherwise regulating EGUs through the NSR program. We believe that EPA's proposal 1) contravenes Congressional intent, essentially eliminating modifying EGUs from the requirements of the NSR program; 2) allows annual emission increases without evaluation of the impact on the annual National Ambient Air Quality Standards (NAAQS), and hampers state and local efforts to prevent significant deterioration of air quality; 3) is based upon an inappropriate set of assumptions; 4) would give an unfair competitive advantage to existing poorly controlled EGUs making future modifications and life-cycle extensions; and 5) will achieve none of the emissions reductions that have been realized by NSR enforcement of unpermitted modifications for which actual, annual emissions have increased. I would now like to address these points in greater detail.

First, the NSR program was enacted by Congress in 1977 in part because the New Source Performance Standard program (NSPS) had not been up to the task of protecting air quality in clean areas. Congress recognized that NSPS had failed and intended NSR to be a new, stronger legislative tool. As the Supreme Court stated recently in the *Duke Energy* decision, "NSPS…did too little to 'achiev[e] the ambitious goals of the 1970 Amendments,' [citation omitted] and the Clean Air Act Amendments of 1977, 91 Stat. 685, included the PSD provisions, which aimed at giving added protection to air quality in certain parts of the country 'notwithstanding attainment and maintenance of the NAAQS.'" The Clean Air Amendments of 1977 and 1990 also strengthened the Nonattainment NSR provisions of the Act.

Thus, Congress required NSR permitting, installation of modern pollution controls, and air quality analysis in PSD and nonattainment areas. However, the 1977 Clean Air Act exempted existing coal-fired power plants and other facilities from the strict pollution control requirements that all new operations had to meet because Congress intended that older, high-emitting sources would gradually be upgraded or phased out. Under the law, the exemption for the so-called "grandfathered" plants ends when a facility is physically modified in a way that increases its emissions. At that point,

NSR is triggered and the facility is required to install modern pollution controls and must evaluate impacts on local air quality.

If EPA's proposed rule is finalized, however, power plants will not be required to comply with NSR because they will rarely, if ever, increase their hourly emissions. Under the rule, when old plants make renovations, their emissions will increase, units will be operated – without pollution controls – for longer hours, and emissions will increase. EPA's proposal, therefore, nullifies Congressional intent to provide an end-point for "grandfathering" and, in effect, exempts power plants from NSR indefinitely. EGUs that make modifications will be allowed to bypass NSR forever if the proposed rule is promulgated.

In effectively nullifying the NSR program for EGUs, EPA exceeds the bounds of discretion afforded it under *Chevron U.S A Inc. v. Natural Resources Defense Council, Inc.* As the D.C. Circuit Court of Appeals stated in its June 2007 opinion in *South Coast Air Quality Management District v. EPA,* "…under *Chevron,* agency action that does not constitute a reasonable interpretation of the statute must be vacated." EPA's substitution of an NSPS hourly test for the NSR actual annual emissions test would frustrate Congressional purpose in enacting the added protection of NSR and is therefore not a reasonable interpretation of the Clean Air Act under *Chevron.* The proposed rule is thus legally flawed.

Second, NACAA is very troubled that EPA's rule will interfere with the ability of state and local agencies to develop plans that achieve and maintain the NAAQS. As EPA is fully aware, agencies across the country are faced with the daunting challenge of developing SIPs for the 8-hour ozone and PM2.5 standards. In order for that SIP planning process to be successful, our agencies must not only have an accurate and complete understanding of all existing sources of emissions in their jurisdictions, they must be able to account for and regulate increases in emissions occurring from major modifications to these facilities. When we are unable to appropriately assess and regulate increased levels of emissions from EGUs, it undermines our efforts to protect the public health and welfare. This will not only undercut our SIP efforts, but also will place an unfair burden on other sources of pollution—including small businesses—who will be forced to make up for these emissions with far more expensive and considerably less cost-effective strategies.

In addition, EPA has just announced a tightening of the ozone standard that will require state and local agencies to impose even more stringent requirements on sources emitting NO_x and VOCs, both of which contribute to ozone formation. Also, last year the fine particulate ambient air quality standard was tightened. If utility emissions are, in effect, exempt from NSR, states and localities will face an even more daunting task in locating and controlling smaller sources in order to attain the new ozone and particulate NAAQS.

Many agencies have submitted comments to the docket illustrating the difficulty the proposed rule will pose, if finalized. We cite two examples below. One involves an

eastern industrial state working to attain the air quality standards; the other involves a western state whose PSD increment attainment is apt to be jeopardized by promulgation of this rule.

In New Jersey, the state completed a process to identify strategies for 8-hour ozone and PM2.5 attainment. The New Jersey Department of Environmental Protection focused detailed evaluations on about 60 potential emissions reduction measures. Aside from controls on EGUs, the four most effective measures identified to reduce SO2, which is a major contributor to the formation of PM2.5, can achieve a combined total reduction statewide of less than 14,000 tons per year. These measures include significantly reducing the sulfur content of home heating oil; further tightening emission controls at New Jersey's refineries (which are already heavily controlled); and reducing sulfur in heavy oil used in industrial and commercial boilers. New Jersey plans to include all these measures in its PM2.5 SIP. The emission reductions potential of each of the other 60 SO2 reduction measures identified is far less. By contrast, installing scrubbers on existing New Jersey coal-fired EGUs that currently do not have scrubbers will achieve almost 60,000 tons per year of SO2 reductions. The amount of emissions reductions from coal fired EGU's is unmatched by any other SO2 source category, or even the combination of all other SO2 source categories in New Jersey.[1]

In North Dakota, the Department of Health has completed a periodic PSD review examining the impacts of sulfur dioxide emissions on its Class I areas. The review indicated that current actual emissions for SO_2 were 140,905 tons per year in 2003, while allowable or permitted emissions of SO_2 are 275,807 tons per year. The state concluded, "under the proposed [hourly] regulation, virtually no EGUs will be subject to PSD review…[The] hourly test does not take into account emission increases from modifications at an EGU which could have an adverse effect on the environment, impact air quality related values in North Dakota's Class I areas, or cause a violation of the PSD increments. Actual annual emissions could rise dramatically without PSD/NSR review being required or any consideration of this rise on PSD increment compliance."

Third, we strongly disagree with EPA's main rationale for this rule, namely that EGU emissions reductions are not necessary because other programs already result in sufficient reductions of pollutants. The Clean Air Interstate Rule (CAIR), the Best Available Retrofit Technology Rule (BART), the Acid Rain Program, and the NOx SIP Call will not—individually or collectively—compensate for the loss of NSR for EGUs. Nor can our association dismiss, as does EPA's proposal, the increased local impacts that will occur as a result of this rule.

A. CAIR, BART, the Acid Rain Program, and the NOx SIP Call Do Not Compensate for the Loss of NSR for EGUs.

[1] Fortunately, NSR enforcement has resulted in enforceable agreements to install scrubbers on 5 of the 10 coal-fired EGUs in New Jersey, with 3 of the remaining units already well controlled because of NSR permitting prior to construction.

The Clean Air Interstate Rule will not compensate for the loss of NSR for EGUs for several reasons. First, CAIR does not cover the 22 western states. Nor does it require sources to install best available control technology (BACT) or achieve the lowest achievable emissions rate (LAER). In fact, CAIR requires no pollution control equipment at all for the first five years that it is in effect. Moreover, CAIR addresses NO_x and SO_2 emissions only, while NSR addresses all pollutants covered under the Clean Air Act, including PM, VOCs and CO, all of which can be expected to increase when EGUs are no longer required to comply with NSR requirements. In addition, CAIR controls for utilities that do in fact install them are unlikely to be in place soon enough to help states achieve the new health standards for 8-hour ozone and $PM_{2.5.}$ Finally, EPA has exempted EGUs that comply with CAIR from Reasonably Available Control Technology (RACT) in its $PM_{2.5}$ Implementation Rule and in the Phase 2 rulemaking to implement the 8-Hour Ozone NAAQS. Therefore, EGUs that purchase credits from others under CAIR will have no obligations whatsoever to curb their NO_x or $PM_{2.5}$ emissions through CAIR. If the EGU annual test is eliminated as an independent trigger, NSR will also no longer be effective at controlling existing power plant emissions.

Neither will BART compensate for the loss of NSR for EGUs. In fact, many believe that BART is inadequate because it applies only to a limited number of units, and because there are many exceptions to the requirements to install controls. Many states have expressed serious concern that BART would not be a sufficient safety net if EGUs are no longer subject to NSR. For example, in commenting in February 2006 on the first EGU Hourly proposal, the New Mexico Environment Department stated that EGUs in New Mexico are not subject to CAIR or the NO_x SIP call, and that, furthermore, "…the BART rule…only applies to a minor subset of the sources that significantly affect New Mexico's air quality, those sources brought into operation between 1962 and 1977…[and] reductions [from the acid rain program] are minimal compared to reductions that would occur under existing BACT or LAER requirements." The comments also stated, "The other federal air programs do not provide New Mexico, or other states, with the same authority to effectively manage air quality and assure attainment of ambient air quality standards that it has had with a strong NSR program."

In sum, NACAA does not share EPA's optimism that the effect of the EGU Hourly rule will be "minimal." 72 *Federal Register* 26210. Even a relatively small EGU can still be a significant source of air pollution, typically emitting tens of thousands of tons of pollution per year. It appears unlikely that CAIR or BART will impact the emissions of many EGUs.

Moreover, a 2003 Public Interest Research Group (PIRG) study on the effect of the NO_x SIP Call and the Acid Rain program indicates that neither of these programs can compensate for the loss of NSR for EGUs. The PIRG study concluded that, despite national and regional NO_x reduction initiatives implemented during the 1990s, more power plants increased their NO_x emissions between 1995 and 2000 than decreased these emissions. Specifically, 263 of the oldest 500 power plants increased their NO_x emissions, even while collectively these 500 power plants decreased their total NO_x

emissions. The same report concluded that, although the Acid Rain program has clearly reduced aggregate SO_2 emissions, 300 of the 500 power plants analyzed by PIRG actually increased their SO_2 emissions between 1995 and 2000, resulting in local emissions impacts despite overall national advances.

B. Local Impacts on Air Quality Should Not Be Minimized or Ignored

NACAA does not agree with EPA' approach to local health concerns in the proposed rule, namely that local and regional increases in pollution are not significant. EPA states that its Technical Support Document (TSD) shows that "revised NSR applicability tests would result in a somewhat different pattern of local emissions, with some counties experiencing reductions, some experiencing increases, and some remaining the same compared to emissions changes under CAIR/CAMR/CAVR 2020…" EPA continues, "[P]rojected increases in EGU $PM_{2.5}$ VOC, and CO emissions…are small in magnitude and sparse across the continental U.S… [and] we would expect these increases to cause minimal changes in local ambient effect…"

Because CAIR is a market-based, cap-and-trade program, however, there is no way to ascertain which power plants will buy credits and continue to pollute and which will not – just as there is no way to ascertain how many EGUs will make modifications in the wake of a final EGU Hourly Rule. When EPA ceases to follow the blueprint of the NSR Clean Air Act requirements, leaving decision-making to the regulated, pollution becomes random and difficult to control. Moreover, the national statistics contained in EPA's TSD have no bearing on the health of individuals living in communities near power plants that choose to pay to pollute under CAIR and increase emissions under the NSR Hourly proposal.

In addition, none of the programs cited by EPA requires air quality modeling to determine the impacts of increase emissions on either local or regional air quality. Hence, increases in actual emissions could exacerbate local air quality problems or cause new violations of air quality standards without the evaluation of the air quality impacts of those increases that ordinarily would be required under NSR. This has serious public health implications. Under EPA's proposal, EGUs could increase annual actual emissions without informing the air agency or the public, without evaluating air quality impacts, and without correcting violations of public health and welfare standards. In the debate on NSR, the topic is frequently the NSR technology requirements (BACT and LAER) for upgrading of air pollution control of existing equipment. Equally important, however, is the NSR requirement to evaluate local air quality impacts of emission increases. No other Clean Air Act program would fulfill the air quality evaluation gap left by an ineffective NSR program.

Fourth, under the current NSR/PSD applicability test, modified sources have no significant advantage over new units. Under the proposed test, however, existing units are likely to rebuild and increase their annual tons of emissions, deteriorating limited air resources and placing those who build new units at a competitive disadvantage since many old units lack air pollution control for one or more of the criteria pollutants. Plant

managers are likely to choose to rebuild old boilers at existing units to recapture lost capacity without installing BACT. It can be expected that this practice will consume available annual increments, reduce the number of new unit installations (thereby sacrificing efficiency increases), and retard the development of new technologies.

Fifth, the NSR utility enforcement cases brought both by EPA and states that have alleged illegal modifications based on increases in actual, annual emissions have resulted in huge reductions of pollutants. The health and quality of life of millions of people have been improved by the reductions in emissions that have been achieved. For example, settlement of the *Ohio Edison* case resulted in annual reductions of 134,000 tons of NO_x and SO_x. The *Illinois Power* case led to reductions of emissions of 54,000 tons of NO_x and SO_x. And, most recently, decisions favorable to EPA in the *Cinergy* case may also lead to significant emissions reductions. It is highly doubtful, however, that these or other cases of similar magnitude could ever be brought if the EGU Hourly Rule is finalized. As a practical matter, if the Rule is promulgated, identifying and prosecuting violations of hourly emissions will be problematic at best. The dramatic improvements in air quality that were previously possible through NSR enforcement will simply not be realized.

To summarize our views, NACAA believes that this proposal contravenes Congressional intent in enacting NSR, makes our work of achieving healthful air and preventing deterioration of clean air infinitely more difficult, is based on assumptions about CAIR, BART, and other programs that we do not share, gives unfair competitive advantages to modifying EGUs, and will severely curtail NSR utility enforcement. We rather believe, as did Congress in 1977, that it makes sense to install state-of-the-art controls on EGUs when they are making major modifications, that is, when they are renovating boilers to recapture lost capacity or when they are conducting life-extension activities. This is the logical juncture to take steps to protect public health and the environment. This rule eviscerates NSR for EGUs and should not be finalized.

I would be happy to take any questions.