

September 1992

## The WEPCO-"Fix": Out of the Wisconsin Electric Power Co. v. Reilly Decision, and the Clean Air Act Amendments of 1990, a Pro-Utility Solution Evolved

Anne M. Skalyo

Follow this and additional works at: <https://digitalcommons.pace.edu/pelr>

---

### Recommended Citation

Anne M. Skalyo, *The WEPCO-"Fix": Out of the Wisconsin Electric Power Co. v. Reilly Decision, and the Clean Air Act Amendments of 1990, a Pro-Utility Solution Evolved*, 10 Pace Env'tl. L. Rev. 331 (1992)

DOI: <https://doi.org/10.58948/0738-6206.1517>

Available at: <https://digitalcommons.pace.edu/pelr/vol10/iss1/10>

This Article is brought to you for free and open access by the School of Law at DigitalCommons@Pace. It has been accepted for inclusion in Pace Environmental Law Review by an authorized administrator of DigitalCommons@Pace. For more information, please contact [dheller2@law.pace.edu](mailto:dheller2@law.pace.edu).

COMMENT

**The WEPCO-“Fix”: Out of the *Wisconsin Electric Power Co. v. Reilly* Decision, and the Clean Air Act Amendments of 1990, a Pro-Utility Solution Evolved**

Anne M. Skalyo

*[More than two years ago, ten years of legislative gridlock ended] with passage of the most sweeping environmental law ever. If properly implemented, it will bring clean air to America's cities, dramatically reduce the releases of toxic air pollutants, help protect the stratospheric ozone layer, and, of course reduce acid rain.*

*The issue is now whether President Bush [allowed] EPA to implement the law. After [two] full years, it is clear that the President actively work[ed] to undermine the clean air law. Through the White House Council on Competitiveness and Vice President Quayle, the President [allowed] industry free reign to dictate changes in EPA's control programs under the Clean Air Act. In many cases, industry has been granted gaping loopholes that were proposed to the Congress and explicitly rejected during the legislative process.*

*This is not the process by which laws are made and*

*implemented in our democratic society. Under the Constitution, the President has a duty to faithfully implement the law as passed by . . . Congress. If he felt that the law was too tough on polluters, he had the option of a veto. But having chosen to sign the [bill into law], the President cannot surreptitiously rewrite the legislation to include breaks for polluters that Congress would not [have] approve[d]. Sadly, this is exactly what [has happened].<sup>1</sup>*

I. Introduction	334
II. Historical Background	337
A. Statutory Background: The Applicable Clean Air Act Title I Pollution Control Programs	337
1. The CAA of 1970	337
2. The 1977 CAAA's	339
B. Regulatory Background Prior to the WEPCO-"Fix"	344
III. The WEPCO Decision	346
A. General Holding	346
B. The Facts	347
C. The Specific Holdings	350
1. Whether WEPCO's Replacement Program Constituted a "Modification" Triggering the NSPS and PSD-NSR Programs?	350

---

1. *Clean Air Act Implementation: Hearing[] Before the Subcomm. on Health and the Env't of the House Comm. on Energy and Commerce, Part II*, 102d Cong., 1st Sess. 1 (1991) [hereinafter *Clean Air Act Hearing*] (statement of Rep. Henry Waxman).

America's new clean air programs and, in important ways, the integrity of the legislative process itself, are placed at risk through the wantonly illegal activities of the White House Council on Competitiveness. In many ways the Council, which apparently thinks itself beyond public accountability and beyond the law of the land, is a domestic version of the Iran-Contra operations of the National Security Council during the Reagan era.

*Id.*

a.	The First Prong: Whether The Replacement Project Constituted an "Operational or Physical Change"?	351
b.	The Second Prong: Whether the WEPCO Project Would Create an "Increase in Emissions" for NSPS and PSD-NSR Purposes?	353
i.	NSPS Measurements	354
ii.	PSD-NSR Measurements	356
2.	Whether WEPCO's Units Could Escape NSPS If WEPCO's Replacement Program, When Combined With a Fuel Switch, Would Not Result in an Increase in Emission Rates for Those Units?	359
IV.	The Evolution of the WEPCO Proposal	360
A.	The Perceived Possible Impacts of the WEPCO Decision Without A WEPCO Solution	360
1.	The Perceived Possible Impacts on Utility Maintenance and Life-Extension Projects	360
2.	The Perceived Possible Impacts on Utility Clean Coal Technology Projects and Voluntary Shifts to Lower Polluting Fuels	363
3.	The Perceived Possible Impacts on Utilities' Response to Environmental Control Requirements Under the Proposed Acid Rain Legislation	363
4.	The Perceived Possible Impacts on the Administration's National Energy Strategy	364
B.	The CAAA's of 1990 Fell Short of a Comprehensive WEPCO Solution	367
C.	A Comprehensive WEPCO-"Fix" was Included in the Senate Energy Bill	371
D.	The Proposed WEPCO-"Fix" Evolved	372

V. Analysis of the WEPCO-"Fix" .....	377
A. Provision Removed From the Final WEPCO-"Fix": New Source Review - BACT presumption for NO <sub>x</sub> .....	378
B. Provisions of the Final WEPCO-"Fix" ...	381
1. Applicability of NSR to Pollution Control Projects: The Pollution Control Exclusion .....	381
2. New Source Review - "Baseline" .....	385
3. New Source Review - "Actual to Future Actual" or "Representative Actual Annual Emissions" .....	386
4. New Source Review - The Causation Requirement .....	388
5. New Source Review - Applicability Determinations .....	388
6. New Source Performance Standards - "Baseline" .....	388
VI. Conclusion .....	389

### I. Introduction

In *Wisconsin Electric Power Co. v. Reilly*,<sup>2</sup> the Seventh Circuit Court of Appeals affirmed the Environmental Protection Agency's (EPA's) final determination that the Wisconsin Electric Power Company's (WEPCO's) "like-kind" replacement project<sup>3</sup> constituted a "modification" triggering the Clean Air Act's (CAA's) New Source Performance Standards (NSPS) review program. However, the court set aside the EPA's final determination that the replacement project equaled a "major modification" invoking the CAA's Prevention of Significant Deterioration New Source Review (PSD-

---

2. 893 F.2d 901, 914, 915 (7th Cir. 1990) [hereinafter *WEPCO*].

3. WEPCO proposed a project that would replace rear steam drums in four of its five coal-fired steam generating units at its Port Washington electric power plant. *Id.* at 906. Renovations also "required were repair and replacement of the turbine-generators, boilers, mechanical and electrical auxiliaries and the common plant support facilities." *Id.*

NSR) program.<sup>4</sup>

The WEPCO holding later took on added significance in light of the acid rain proposals which became part of the Clean Air Act Amendments (CAAA's) of 1990.<sup>5</sup> Due to the WEPCO decision and the emissions requirements of the acid rain proposals, electric utilities feared that the implementation of either Clean Coal Technology (CCT) projects or pollution control projects could trigger the "modification" requirement of the NSPS program, and the "major modification" requirement of the PSD-NSR program or Nonattainment New Source Review (NNSR) program.<sup>6</sup>

Congress responded to the utilities' concerns by limiting the applicability of new source requirements to changes involving repowering and CCT projects.<sup>7</sup> However, the House and Senate WEPCO solutions, to clarify whether implementation of pollution control projects would invoke the "modification" requirement, were deleted without prejudice by the House-Senate conferees.<sup>8</sup> Further, recognizing the importance of a comprehensive and consistent strategy for review, both the conferees and President Bush urged EPA to arrive at a quick WEPCO resolution.<sup>9</sup>

---

4. *Id.* at 918. For purposes of this article, New Source Review (NSR) will pertain to both Prevention of Significant Deterioration New Source Review (PSD-NSR) and Nonattainment New Source Review (NNSR) unless otherwise indicated.

5. Air Pollution Control Act, Pub. L. No. 101-549, secs. 401-413, §§ 103, 110-111, 169, 401-416, 104 Stat. 2399, 2584-2634 (1990)(codified at 42 U.S.C. §§ 7403, 7410-7411, 7479, 7651-7651o (1988 & Supp. II 1990)).

6. Jill S. Baylor, *Acid Rain Impacts On Utility Plans for Plant Life Extension*, 125 No. 5 FORT. 22, 26 (1990).

7. Air Pollution Control Act, Pub. L. No. 101-549, sec. 401, §§ 409, 415, 104 Stat. 2399, 2619-21, 2625-26 (1990) (codified at 42 U.S.C. §§ 7651h, 7651n (Supp. II 1990)).

8. H.R. CONF. REP. No. 952, 101st Cong., 2d Sess. 335 (1990), reprinted in 1990 U.S.C.C.A.N. 3867, 3876 [hereinafter CONFERENCE REPORT]. "The deletion of most provisions relating to the WEPCO decision is not intended to affect or prejudice in any way the issues or resolution of the WEPCO matter. At the same time the conferees urge a quick resolution of the WEPCO matter by EPA as appropriate." *Id.*

9. Statement on Signing the Bill Amending the Clean Air Act, PUB. PAPERS 1602 (Nov. 15, 1990), reprinted in 1990 U.S.C.C.A.N. 3887-1, 3887-2. In signing S. 1630, President Bush directed William Reilly to:

implement this bill in the most cost effective manner possible. This means insuring that plants can continue to use emission trading and netting to the maximum extent allowed by the law; that the Administration's proposed pol-

This comment explores the EPA's WEPCO-"fix" that evolved largely due to the *WEPCO* decision and the acid rain provisions of the 1990 CAAA's. The WEPCO-"fix" is a pro-utility solution. The "fix" determines if the proposed renovation of an electric utility constitutes: (1) a "modification" triggering the NSPS program; and/or (2) a "major modification" invoking the NSR program. Two new situations developed from the WEPCO-"fix" that require our acute attention. First, this pro-utility solution may soon apply to all sources subject to the CAA, including sources affected by the CAA's new toxics requirements.<sup>10</sup> Second, the Natural Resources Defense Council (NRDC) recently challenged the legality of the WEPCO-"fix."<sup>11</sup>

To begin with, section II outlines the pre-1990 CAAA's statutory and regulatory background necessary to understand New Source Performance Standards (NSPS), Prevention of Significant Deterioration New Source Review (PSD-NSR),

---

icy on WEPCO is implemented to the extent allowed by the law as quickly as possible.

*Id.*

10. WEPCO RULE, *infra* note 232, at 32,332-33.

The EPA . . . currently has underway a separate rulemaking which will consider the desirability of adopting for other source categories the NSR pollution control project exclusion and the changes to the methodology for determining whether a source change constitutes a *modification* that have been adopted today for utilities. . . .

Prior to proposal of [the WEPCO-"fix"], EPA considered going forward with a rule that applied to all source categories. However, the complexity of that task meant that the rule could not be developed in a short time frame, a fact that posed unique and serious difficulties for one source category, utilities.

*Id.* (emphasis added).

11. NRDC Challenges EPA's WEPCO Rule; Utilities Also Petition For Review, *UTIL. ENV'T REP.*, Oct. 16, 1992, at 11.

In October, NRDC filed its statement of issues in the U.S. Court of Appeals for the District of Columbia Circuit. *Id.* (citing NRDC v. EPA, Docket No. 92-1409). NRDC attorney David Hawkins will brief the case; he intends to challenge six items in detail. *Id.* In addition to NRDC's challenge, the Utility Air Regulatory Group (UARG) filed a petition for review of the "fix" and a motion to intervene in NRDC's suit. *Id.*

Due to both the recent date at which these events occurred and an impending publication deadline, this article does not explore these events in further detail. However, a follow-up article may ensue in another journal.

and Nonattainment New Source Review (NNSR). Section III provides a detailed explanation and analysis of the facts and holdings of *WEPCO*. Next, section IV traces the evolution of the *WEPCO*-"fix." Section IV further provides a brief background on the perceived need for a *WEPCO* solution and describes those forces that influenced the formation of the *WEPCO*-"fix." Section V follows up this background with an analysis of the provisions in the *WEPCO*-"fix." The final section, section VI, contains concluding remarks.

## II. Historical Background

### A. Statutory Background: The Applicable Clean Air Act Title I Pollution Control Programs

#### 1. The CAA of 1970

Prior to the 1990 adoption of Title IV of the CAA,<sup>12</sup> sulfur dioxide (SO<sub>2</sub>) and nitrogen oxides (NO<sub>x</sub>) were regulated solely for the purpose of maintaining or establishing minimum air quality standards.<sup>13</sup> Although the standards were initially outlined in the Air Quality Act of 1967, the procedures for establishing and enforcing such ambient air standards were adopted in the CAA of 1970.<sup>14</sup> The CAA requires the Administrator to: (1) designate "air quality control regions;"<sup>15</sup> and (2) issue air pollutant information<sup>16</sup> pertaining to "air quality criteria"<sup>17</sup> and "control techniques."<sup>18</sup> Further, the CAA pro-

---

12. See *supra* note 5.

13. Clean Air Act Amendments of 1970, Pub. L. No. 91-604, sec. 4, §§ 107-11, 84 Stat. 1676, 1678-84 (current version at 42 U.S.C. §§ 7407-7411)(1988 & Supp. II 1990)). The current values for the standards are codified at 40 C.F.R. § 50.5 (1991) (sulfur dioxide), and 40 C.F.R. § 50.11 (1991) (nitrogen dioxide).

14. WILLIAM H. RODGERS, JR., 1 ENVIRONMENTAL LAW, AIR AND WATER § 3.6, at 233 (1986).

15. See CAA § 107, 42 U.S.C. § 7407 (1988 & Supp. II 1990).

16. CAA § 108, 42 U.S.C. § 7408 (1988 & Supp. II 1990).

17. See CAA § 108(a)(2), 42 U.S.C. § 7408(a)(2) (1988). Air quality criteria for an air pollutant "shall accurately reflect the latest scientific knowledge useful in indicating the kind and extent of all identifiable effects on public health or welfare which may be expected from the presence of such pollutant in the ambient air, in varying quantities." *Id.*

18. See CAA § 108(b)(1), 42 U.S.C. § 7408(b)(1) (1988).

[Information on air pollution control techniques] shall include data relating



cedures instruct the Administrator to establish primary and secondary National Ambient Air Quality Standards (NAAQS) for each "air quality criteria" pollutant.<sup>19</sup> In carrying out Congress' instructions for the development of air quality standards, EPA established primary and secondary NAAQS for SO<sub>2</sub> and NO<sub>x</sub>.<sup>20</sup> After the EPA promulgates or revises such a NAAQS, the CAA requires each state to develop a State Implementation Plan (SIP) providing for "implementation, maintenance, and enforcement" of a primary or secondary NAAQS within the air quality control regions within the State's borders.<sup>21</sup> Finally, the CAA set forth procedures for the review, revision, and enforcement of SIP's.<sup>22</sup>

In addition to the ambient air-quality scheme based upon primary and secondary NAAQS, the 1970 CAA also required the EPA to promulgate "technology-based" New Source Per-

---

to the cost of installation and operation, energy requirements, emission reduction benefits, and environmental impact of the emission control technology. Such information shall include such data as are available on available technology and alternative methods of prevention and control of air pollution. Such information shall also include data on alternative fuels, processes, and operating methods which result in elimination or significant reduction of emissions.

*Id.*

19. CAA § 108(a)(1), 42 U.S.C. § 7408(a)(1) (1988 & Supp. II 1990).

Primary NAAQS are the standards whose attainment and maintenance are necessary "based on [air quality criteria of section 108 to allow[] an adequate margin of safety . . . to protect the public health." CAA § 109(b)(1), 42 U.S.C. § 7409(b)(1) (1988). Secondary NAAQS are the standards, based on the air quality criteria of section 108, necessary to "protect the public welfare from any known or anticipated adverse effects" of a pollutant. CAA § 109(b)(2), 42 U.S.C. § 7409(b)(2) (1988).

EPA set standards for only the following criteria pollutants: SO<sub>2</sub>, NO<sub>x</sub>, carbon monoxide, hydrocarbons, lead, particulate matter, and ozone. *See* 40 C.F.R. §§ 50.4-50.12 (1991).

20. 40 C.F.R. §§ 50.4, 50.11 (1991). The EPA promulgated primary NAAQS for SO<sub>2</sub> that set a maximum 24-hour ambient concentration of 365 micrograms per cubic meter of SO<sub>2</sub>. *Id.* § 50.4.

21. CAA § 110(a)(1), 42 U.S.C. § 7410(a)(2) (Supp. II 1990). The EPA has 13 criteria to use to reject or approve a SIP. CAA § 110(a)(2)(A)-(M), 42 U.S.C. § 7410(a)(2)(A)-(M) (Supp. II 1990). When the EPA rejects a SIP, or when the state fails to submit, revise, or implement a SIP, the EPA is required to promulgate a Federal Implementation Plan (FIP). CAA §§ 110(c)(1), (3), 42 U.S.C. §§ 7410(c)(1), (3) (1988 & Supp. II 1990).

22. *See* CAA § 110(a)(2),(3), 42 U.S.C. § 7410(a)(2),(3) (Supp. II 1990).

formance Standards (NSPS).<sup>23</sup> NSPS's are applicable to the construction or *modification* of stationary sources that "cause[] or contribute[] significantly to[] air pollution which may reasonably be anticipated to endanger public health or welfare."<sup>24</sup> The EPA promulgated New Source<sup>25</sup> Performance Standards for the fossil-fuel-fired steam generator category.<sup>26</sup> Consequently, NSPS's apply if the construction or modification of a fossil-fuel-fired steam generator commenced after August 17, 1971.<sup>27</sup>

Application of this NSPS to the renovation or replacement programs of a fossil-fuel-fired steam generator depends on the definition and application of the term "modification." The CAA defines "modification" as "any physical change in, or change in the method of operation of, a stationary source which increases the amount of an air pollutant emitted by such source or which results in the emission of any air pollutant not previously emitted."<sup>28</sup>

## 2. The 1977 CAAA's

The 1977 amendments<sup>29</sup> to the CAA introduced an alternative approach to pollution control for different areas of the country.<sup>30</sup> In concert with this alternative approach, Congress revised the NSPS program so that sources, subject to the NSPS program, were required to use "the best system of continuous emission reduction, which (taking into consideration the costs of achieving such emission reduction, *and any*

---

23. Clean Air Act Amendments of 1970, Pub. L. No. 91-604, sec. 4, § 111, 84 Stat. 1676, 1683-84 (current version at 42 U.S.C. § 7411 (1988 & Supp. 1990)).

24. CAA § 111(b)(1)(A), 42 U.S.C. § 7411(b)(1)(A) (1988) (emphasis added).

25. "New Source" means "a stationary source, the construction or modification of which is commenced after the promulgation of regulations (or, if earlier, proposed regulations) prescribing a standard of performance under this section which will be applicable to such source." CAA § 111(a)(2), 42 U.S.C. § 7411(a)(2) (1988).

26. 40 C.F.R. §§ 60.40-60.49c (1991).

27. *Id.* § 60.40(c); see CAA § 111(a)(2), (b)(1)(A)-(B), 42 U.S.C. § 7411(a)(2), (b)(1)(A)-(B) (1988 & Supp. II 1990).

28. CAA § 111(a)(4), 42 U.S.C. § 7411(a)(4) (1988).

29. Clean Air Act Amendments of 1977, Pub. L. No. 95-95, 91 Stat. 685 (current version at 42 U.S.C. §§ 7401-7671q) (1988 & Supp. II 1990).

30. WEPCO, 893 F.2d at 904.

*nonair quality health and environmental impact and energy requirements*) the Administrator determines has been adequately demonstrated for that category of sources."<sup>31</sup> The NSPS program thus became a technology-forcing program that addressed hourly rates of emission.<sup>32</sup>

In the 1977 amendments, Congress also added pre-construction permitting requirements for major new and modified sources under two programs: (1) the Prevention of Significant Deterioration New Source Review (PSD-NSR) program;<sup>33</sup> and (2) the Nonattainment New Source Review (NNSR) program.<sup>34</sup> The Prevention of Significant Deterioration (PSD) program was intended to prevent degradation of air quality in attainment ("clean air") areas.<sup>35</sup> This program evolved from the 1970 CAA's express purpose to "protect and enhance" the quality of the nation's air.<sup>36</sup> Areas subject to PSD regulation are divided into three classes, and maximum allowable increases in ambient concentrations of air pollutants, above initial "baseline concentrations,"<sup>37</sup> are defined for each class.<sup>38</sup>

---

31. Compare Clean Air Act Amendments of 1970, Pub. L. No. 91-604, sec. 4, § 111(a)(1), 84 Stat. 1676, 1683 (current version at 42 U.S.C. § 7411(a)(1) (1988)) with Clean Air Act Amendments of 1977, Pub. L. No. 95-95, sec. 109(c)(1)(A), § 111(a)(1)(C), 91 Stat. 685, 700 (codified at 42 U.S.C. § 7411(a)(1)(C) (1988)) (emphasis added to show how the 1977 Amendments revised the NSPS program).

32. *WEPCO*, 893 F.2d at 905.

33. The PSD program is contained in part C of the Clean Air Act Amendments of 1977, Pub. L. No. 95-95, sec. 127, §§ 160-169, 91 Stat. 685, 731-42 (current version at 42 U.S.C. §§ 7470-7479 (1988)).

34. The Nonattainment program is contained in part D of the Clean Air Act Amendments of 1977, Pub. L. No. 95-95, sec. 129, §§ 171-178, 91 Stat. 685, 745-51 (current version at 42 U.S.C. §§ 7501-7515 (1988 & Supp. II 1990)).

35. RODGERS, *supra* note 14, § 3.21, at 351.

The PSD program requires that State Implementation Plans (SIPs) "include measures to 'prevent the significant deterioration' of air quality in areas designated by the states under section 107 as having ambient air quality better than the applicable NAAQS, or for which there is insufficient data to make a determination of the air quality." ROGER W. FINDLEY & DANIEL A. FARBER, *ENVIRONMENTAL LAW: IN A NUT SHELL* 91 (1988 2d ed.). It is important to note that "classification of areas is pollutant-specific, [thus] the same geographical area may be a 'clean air [(attainment)] area' with respect to one pollutant but a 'nonattainment' area with respect to another pollutant." *Id.*

36. RODGERS, *supra* note 14, § 3.22, at 358.

37. Section 169(4) of the CAA defines "baseline concentration" as follows:

[W]ith respect to a pollutant, the ambient concentration levels which exist at

The 1977 Amendments required new or modified<sup>39</sup> major emitting facilities<sup>40</sup> within areas subject to PSD regulation to receive a pre-construction PSD-NSR permit.<sup>41</sup> To receive a permit these facilities are required to satisfy various pre-construction requirements.<sup>42</sup> These requirements include a demonstration that the construction or modification: (1) "[will] not cause, or contribute to [emissions] in excess of any (A) maximum allowable increase or maximum allowable concentration for any pollutant in any [PSD] area . . . , (B) [any NAAQS] in any air quality control region, or (C) any other

---

the time of the first application for a permit in an area subject to this part, based on air quality data available in the Environmental Protection Agency or a State air pollution control agency and on such monitoring data as the permit applicant is required to submit. Such ambient concentration levels shall take into account all projected emissions in, or which may affect, such area from any major emitting facility on which construction commenced prior to January 6, 1975, but which has not begun operation by the date of the baseline air quality concentration determination. Emissions of sulfur oxides and particulate matter from any major emitting facility on which construction commenced after January 6, 1975, shall not be included in the baseline and shall be counted against the maximum allowable increases in pollutant concentrations established under this part.

CAA § 169(4), 42 U.S.C. § 7479(4) (1988).

38. CAA §§ 162(a),(b)(1)-(3), 164(a), 42 U.S.C. §§ 7472(a),(b)(1)-(3), 7474(a) (1988); see David R. Everett, *The Hazy Future: Are State Attempts to Reduce Visibility Impairment in Class I Areas Caught Between Scylla and Charybdis? The Effects of the Clean Air Act Amendments of 1990 on Visibility Protection*, 8 PACE ENVTL. L. REV. 115, 125 (1990). Class I areas allow minute increases of air pollutants in areas "deemed to be nationally important." *Id.* at 125, n.1. Class II areas permit moderate increases of pollutants in "areas which are not class I, but have not been reclassified as class III." *Id.* Class III areas contain the largest maximum allowable increases in pollutants. *Id.*

39. Congress incorporated in the PSD-NSR program the same definition of the term "modification" set forth in the NSPS program. See CAA §§ 111(a)(4), 169(2)(C), 42 U.S.C. §§ 7411(a)(4), 7479(2)(C).

40. Section 169(1) of the CAA defines "major emitting facility" as:

[A]ny of the following stationary sources of air pollutants which emit or have the potential to emit, one hundred tons per year or more of any air pollutant from the following types of stationary sources: fossil-fuel fired steam electric plants of more than two hundred and fifty million British thermal units per hour heat input, . . . fossil-fuel boilers of more than two hundred and fifty million British thermal units per hour heat input. . . .

CAA § 169(1), 42 U.S.C. § 7479(1) (Supp. II 1990).

41. CAA § 165(a)(1), 42 U.S.C. § 7475(a)(1) (1988).

42. See generally CAA § 165(a)(1)-(8), 42 U.S.C. § 7475(a)(1)-(8) (1988).

applicable emission standard or standard of performance<sup>43</sup> under [the CAA]";<sup>44</sup> and (2) will use the "best available control technology [(BACT)]"<sup>45</sup> for each pollutant subject to regulation under [the CAA] emitted from, or which results from such facility . . . ."<sup>46</sup>

The 1977 amendments also introduced the Nonattainment ("dirty air") New Source Review (NNSR) to control pollution in certain areas of the country.<sup>47</sup> Congress incorporated into the NNSR program and the PSD-NSR program the same definition of the term "modification" set forth in the NSPS provisions.<sup>48</sup>

The NNSR requirements that must be satisfied before a new or modified facility may receive a construction permit are

43. These standards include NSPS under § 111 and hazardous pollutant standards under § 112. See CAA §§ 111, 112, 42 U.S.C. §§ 7411, 7412 (1988 & Supp. II 1990).

44. CAA § 165(a)(3), 42 U.S.C. § 7475(a)(3) (1988) (citation added).

45. The CAA defines "best available control technology" as:

[A]n emission limitation based on the maximum degree of reduction of each pollutant subject to regulation under this [Act] emitted from or which results from any major emitting facility, which the permitting authority, on a case-by-case basis, taking into account energy, environmental, and economic impacts and other costs, determines is achievable for such facility through application of production processes and available methods, systems, and techniques, including fuel cleaning, *clean fuels*, or treatment or innovative fuel combustion techniques for control of each such pollutant. In no event shall application of "best available control technology" result in emissions of any pollutants which will exceed the emissions allowed by any applicable standard established pursuant to section 7411 or 7412 of this title.

Clean Air Act Amendments of 1977, Pub. L. No. 95-95, sec. 127, § 169(3), 91 Stat. 685, 741-42 (current version at 42 U.S.C. § 7479(3) (1988 & Supp. II 1990) (emphasis added to show 1990 amendments)).

*Emissions from any source utilizing clean fuels, or any other means, to comply with this paragraph shall not be allowed to increase above levels that would have been required under this paragraph as it existed prior to [November 15, 1990] enactment of the Clean Air Act Amendments of 1990.*

Air Pollution Control Act, Pub. L. No. 101-549, sec. 403(d), § 169(3), 104 Stat. 2399, 2631-32 (1990) (codified at 42 U.S.C. § 7479(3) (Supp. II 1990)) (emphasis added to show 1990 amendments).

46. CAA § 165(a)(4), 42 U.S.C. § 7475(a)(4) (1988) (citation added).

47. See *supra* note 34. The Nonattainment provisions provide for a pollutant-by-pollutant review "as a precondition for the construction or modification of any major stationary source." See CAA § 171(a), 42 U.S.C. § 7501(a) (1988).

48. Compare CAA § 111(a)(4), 42 U.S.C. § 7411(a)(4) (1988) with CAA §§ 169(2)(c), 171(4), 42 U.S.C. §§ 7479(2)(C), 7501(4) (1988).

contained in section 173 of the Act.<sup>49</sup> The pre-construction requirements include a showing that: (1) "sufficient offsetting emissions reductions"<sup>50</sup> will be obtained by the expected construction or modification commencement date;<sup>51</sup> (2) the source will comply with the "lowest achievable emission rate" (LAER);<sup>52</sup> (3) all major stationary sources controlled by the same source owner "are in compliance, or on a schedule for compliance, with all applicable emission limitations and standards;"<sup>53</sup> (4) "the Administrator has not determined that the applicable implementation plan is not being adequately implemented;"<sup>54</sup> and (5) "an analysis of alternative sites, sizes, production processes, and environmental control techniques for such proposed source demonstrates that benefits of the proposed source significantly outweigh the environmental and social costs imposed as a result of its location, construction, or modification."<sup>55</sup>

49. See CAA § 173, 42 U.S.C. § 7503 (1988 & Supp. II 1990).

50. RODGERS, *supra* note 14, § 3.12, at 282.

[T]he central premise of the nonattainment provisions is that the overall pollution pie should become progressively smaller. Emissions from new sources, in combination with other sources, must be "sufficiently less" than emissions previously allowed to represent "reasonable further progress" toward eventual compliance.

*Id.* "Reasonable further progress" is defined in § 171(1). CAA § 171(1), 42 U.S.C. § 7501(1) (Supp. II 1990).

51. CAA § 173(a)(1)(A), 42 U.S.C. § 7503(a)(1)(A) (Supp. II 1990)(citation added).

52. CAA § 173(a)(2), 42 U.S.C. § 7503(a)(2) (1988).

The CAA defines "lowest achievable emissions rate" as:

[F]or any source, that rate of emissions which reflects-

(A) the most stringent emission limitation which is contained in the implementation plan of any State for such class or category of source, unless the owner or operator of the proposed source demonstrates that such limitations are not achievable, or

(B) the most stringent emission limitation which is achieved in practice by such class or category of source, whichever is more stringent.

In no event shall the application of this term permit a proposed new or modified source to emit any pollutant in excess of the amount allowable under applicable new source standards of performance.

CAA § 171(3), 42 U.S.C. § 7501(3) (1988).

53. CAA § 173(a)(3), 42 U.S.C. § 7503(a)(3) (1988).

54. CAA § 173(a)(4), 42 U.S.C. § 7503(a)(4) (1988 & Supp. II 1990).

55. CAA § 173(a)(5), 42 U.S.C. § 7503(a)(5) (Supp. II 1990). The fifth require-

In sum, after the 1977 Amendments, Title I of the CAA had three programs specifically designed to ensure that no new air pollution, either from new sources or from modifications to existing sources, is emitted unless the new or modified source complies with the new source requirements. The new source requirements are included in the three programs: (1) the technology-based New Source Performance Standards (NSPS) program;<sup>56</sup> (2) the air quality-based Prevention of Significant Deterioration New Source Review (PSD-NSR) program for attainment areas;<sup>57</sup> and (3) the air quality-based Nonattainment New Source Review (NNSR) program for nonattainment areas.<sup>58</sup>

## B. Regulatory Background Prior to the WEPCO-“Fix”

EPA promulgated its own “modification” regulations for both the NSPS program and the NSR program.<sup>59</sup> The NSPS regulations defined “modification” as “any physical or operational change to an existing facility which results in an increase in the emission rate<sup>60</sup> to the atmosphere of any pollu-

---

ment was added by the Clean Air Act Amendments (CAAA's) of 1990. Air Pollution Control Act, Pub. L. No. 101-549, sec. 102, 104 Stat. 2399, 2416 (1990) (codified at 42 U.S.C. § 7503(a)(5) (Supp. II 1990)).

56. See *supra* notes 23-32 and accompanying text.

57. See *supra* notes 33-46 and accompanying text.

58. See *supra* notes 47-55 and accompanying text.

59. See 40 C.F.R. § 52.21 (1991) (PSD-NSR program); 40 C.F.R. § 60.14 (1991) (NSPS program).

60. 40 C.F.R. § 60.14(b) (1991).

[The] [e]mission rate shall be expressed as kg/hr of any pollutant discharged into the atmosphere for which a standard is applicable. The Administrator shall use the following to determine emission rate:

(1) Emission factors . . . in cases where the utilization of emission factors demonstrate that the emission level resulting from the physical or operational change will either clearly increase or clearly not increase[; or]

(2) [When it is not appropriate, as described in this paragraph, to use the emission factors as referenced in paragraph (b)(1), use] [m]aterial balances, continuous monitor data, or manual emission tests. . . . When the emission rate is based on results from manual emission tests or continuous monitoring systems, the procedures specified in Appendix C of this part shall be used to determine whether an increase in emission rate has occurred. Tests shall be conducted under such conditions as the Administrator shall specify to the owner or operator based on representative performance of the

tant to which a standard applies shall be considered a modification within the meaning of section 111 of the Act."<sup>61</sup> Thus, the "modification" test consists of two prongs: first, an assessment of whether the proposed project would constitute a "physical or operational change," and second, an analysis of whether the physical or operational change would create an "increase in emissions."

The "physical or operational change" assessment is virtually the same for the NSPS and NSR programs; both programs do not apply to every change.<sup>62</sup> However, the NSPS

facility. At least three valid test runs must be conducted before and at least three after the physical or operational change. All operating parameters which may affect emissions must be held constant to the maximum feasible degree for all test runs.

*Id.*

61. *Id.* § 60.14(a). The "routine exemption" for NSPS purposes provides that the following shall not, by themselves, trigger the NSPS "modification" rule:

(1) Maintenance, repair, and replacement which the Administrator determines to be routine for a source category, subject to the provisions of (c) of this section and [NSPS "reconstruction" regulations].

(2) An increase in production rate of an existing facility, if that increase can be accomplished without a capital expenditure on that facility.

(3) An increase in the hours of operation.

(4) Use of an alternative fuel or raw material if, prior to the date any standard under this part becomes applicable to that source type, . . . the existing facility was designed to accommodate that alternative use. A facility shall be considered to be designed to accommodate an alternative fuel or raw material if that use could be accomplished under the facility's construction specifications as amended prior to the change. Conversion to coal required for energy considerations, as specified in section 111(a)(8) of the Act, shall not be considered a modification.

(5) The addition or use of any system or device whose primary function is the reduction of air pollutants, except when an emission control system is removed or is replaced by a system which the Administrator determines to be less environmentally beneficial.

(6) The relocation or change in ownership of an existing facility.

*Id.* § 60.14(e) (NSPS program); compare 40 C.F.R. § 52.21(b)(2)(iii) (PSD-NSR program); see also *infra* note 62 and accompanying text.

62. *Id.* § 52.21(b)(2)(iii). The "routine exemption" for PSD-NSR purposes provides that the following shall not, by themselves, trigger the PSD-NSR "major modification" rule:

(a) Routine maintenance, repair, and replacement;

...

(e) Use of an alternative fuel or material which:

(1) The source was capable of accommodating before January 6, 1975 [that is not prohibited by a federally-enforceable PSD-NSR permit



and NSR programs embody separate definitions of an "increase in emissions." Therefore, to determine if a physical change constituted a modification under the NSPS program, EPA determined whether the change increased the facility's hourly rate of emissions.<sup>63</sup> In comparison, for PSD-NSR, the regulations required a "significant net emissions increase" (increase in actual annual emissions of a pollutant) to trigger the "major modification" provisions of NSR.<sup>64</sup>

EPA's "reconstruction" regulations, closely related to the NSPS "modification" regulations, apply to the replacement of an existing facility.<sup>65</sup> These regulations establish that the replacement of depreciable components costing more than fifty percent of the cost of a comparable new facility subjects the "reconstructed" facility to NSPS.<sup>66</sup> There is no "reconstruction" regulation for the PSD-NSR program.<sup>67</sup>

### III. The WEPCO Decision

#### A. General Holding

The dispute in *Wisconsin Electric Power Co. v. Reilly*,<sup>68</sup> focused on whether WEPCO's proposed changes to its Port Washington electric power plant constituted a "modification" triggering both the CAA's NSPS program and PSD-NSR program. The Seventh Circuit Court of Appeals agreed that

---

condition];

...  
(f) An increase in the hours of operation or in the production rate [that is not prohibited by a federally-enforceable PSD-NSR permit condition].

40 C.F.R. § 52.21(b)(2)(iii) (PSD-NSR Program); compare 40 C.F.R. § 60.14(e) (NSPS program); see *supra* note 61 and accompanying text.

63. 40 C.F.R. § 60.14(b).

64. *Id.* § 52.21(b)(2)(i).

65. *Id.* § 60.15.

66. *Id.* § 60.15(b)(1); Also, it must be "technologically and economically feasible [for the facility] to [qualify as a 'reconstruction']." *Id.* § 60.15(b)(2); "Reconstruction" triggers NSPS even when there is no increase in emission rates. *Id.* § 60.15(a).

67. EPA decided not to adopt a "reconstruction" rule for the PSD-NSR program since "the general PSD objective of safeguarding existing air quality from significant degradation will not be undermined by deleting the requirement for review of reconstructions." 45 Fed. Reg. 52,703 (1980).

68. 893 F.2d 901 (7th Cir. 1990).

WEPCO's "like-kind" replacement program, which WEPCO termed a "life-extension" project, constituted an NSPS "modification."<sup>69</sup> However, the court set aside the EPA's final determination that the replacement project triggered the PSD-NSR program.<sup>70</sup>

## B. The Facts

The five 80-MW (megawatt) coal-fired units (Units 1 through 5) located at WEPCO's Port Washington<sup>71</sup> plant were installed in 1935, 1943, 1948, and 1950.<sup>72</sup> In 1983, WEPCO and its consultant conducted a study to evaluate the condition of the Port Washington plant.<sup>73</sup> The study "concluded 'that extensive renovation of the five units and the plant's common facilities [would be] needed if operation of the plant [was to] continue[.]'"<sup>74</sup>

---

69. *Id.* at 914-15.

Two determinations of NSPS applicability:

(1) *In re Baldwin Paving Co.*, 1984 WL 19045, at \*1 (Ga. Bd. Natural Res. Nov. 2, 1984), determined that the movement of an asphalt plant from Texas and reassembly in Georgia did not trigger NSPS. The Administrative Board reasoned that the plant was constructed in 1965 and the reassembly constituted "neither construction or modification, so as to render the plant a 'new source.'" *Id.* at \*3.

(2) *In re Applications-by-Hydra Co. Generations, Inc.*, 1988 WL 158330, at \*11 (N.Y. Dept. Envtl. Conserv. Sept. 6, 1988), the Commissioner determined that "the distinct difference of the definition of the term modification under state and federal rules makes it readily apparent that the Department considers the addition of the air cleaning and/or pollution control devices to be a modification." *Id.* The Department's definition of "modification" includes the installation of air cleaning hardware. N.Y. COMP. CODES R. & REGS., tit. 6, § 200.1(hh)(2) (1992); compare 40 C.F.R. § 60.14(e)(5), *supra* note 61.

70. *WEPCO*, 893 F.2d at 918.

71. The Port Washington plant is located north of Milwaukee, Wisconsin, on Lake Michigan. *Id.* at 905.

72. *Baylor*, *supra* note 6, at 24.

73. *WEPCO*, 893 F.2d at 905.

74. *Id.* (quoting letter from Thomas J. Cassidy, Executive Vice President of WEPCO, to Jacqueline K. Reynolds, Secretary to the Public Service Commission of Wisconsin, at 2 (July 8, 1987)). Deterioration prevented the air heaters on units 1 through 4 from operating at full capacity. *Id.* Air heaters preheat combustion air to improve the efficiency of steam generating units. *Id.* (citing BABCOCK & WILCOX, STEAM: ITS GENERATION AND USE 13-4 (1978)). Also, safety concerns about steam drum blow-out required a "reduction in pressure (and output)" in units 2 and 3. *Id.* Steam drums separate saturated steam from water within the boiler. *Id.* n.5. Plus, rear steam drums in units 2 through 4 experienced serious cracking. *Id.* In 1985, due to

As a result of the deterioration identified by the study, WEPCO submitted a proposed "life-extension" project to the Wisconsin Public Service Commission for approval, as required by state law.<sup>75</sup> WEPCO's "life-extension" project stated that the renovations needed "were repair and replacement of the turbine-generators, boilers, mechanical and electrical auxiliaries and the common plant support facilities."<sup>76</sup> These renovations were expected to allow the units to operate beyond their planned retirement dates.<sup>77</sup>

The Wisconsin Public Service Commission made a preliminary review to determine whether a pre-construction PSD-NSR permit was needed for the replacement and repair program.<sup>78</sup> The Commission then consulted the Wisconsin Department of Natural Resources, which in turn consulted David Kee, Director of EPA's Region V Air and Radiation Division.<sup>79</sup> David Kee referred the issue to EPA headquarters.<sup>80</sup>

On September 9, 1988, Don R. Clay, EPA's Acting Assistant Administrator, preliminarily concluded that WEPCO's replacement project was a "modification"<sup>81</sup> subject to NSPS and a "major modification"<sup>82</sup> subject to PSD-NSR permitting requirements.<sup>83</sup> This determination dismissed WEPCO's contention that the replacement work was "routine"<sup>84</sup> and thus did not constitute a "modification" for NSPS and PSD-NSR

---

age-related deterioration, "units 1 through 4 were re-rated to 45, 65, 75, and 55-MW, respectively." *Id.*; Baylor, *supra* note 6, at 24, 25. In addition, great concerns about steam drum blow-out forced WEPCO to shut down unit 5. Baylor, *supra* note 6, at 25.

75. WEPCO, 893 F.2d at 906 (citing Wis. STAT. § 196.49 (1987)).

76. *Id.*

77. *Id.* Units 1 and 2 would be able to operate beyond their 1992 retirement date, and units 3, 4, and 5 beyond their 1999 retirement date, thus rendering the units capable of operating at their 80-MW designed capacity until 2010. *Id.*

78. *Id.*

79. *Id.*

80. *Id.*

81. *Id.*; see *supra* part II.B.

82. WEPCO, 893 F.2d at 906; see *supra* part II.B.

83. WEPCO, 893 F.2d at 906. The preliminary determination concluded that the project would constitute a physical change that would result in an increase of production and emissions. *Id.*

84. *Id.*

purposes.<sup>85</sup> The EPA Administrator Lee M. Thomas adopted the preliminary determination in its entirety.<sup>86</sup> The EPA's final determination was:

(1) The life extension project, as proposed, will render WEPCO's Port Washington plant subject to the [PSD-NSR] requirements of Part C of the Clean Air Act as a *major modification* within the meaning of the Act and the EPA regulations at 40 C.F.R. § 52.21.

(2) The proposed life extension project will render each of five steam generating units at the Port Washington plant subject to the NSPS requirements of section 111 of the Clean Air Act as a *modification* within the meaning of the Act and the EPA regulations at 40 C.F.R. [§ 60.14].<sup>87</sup>

Subsequently, the EPA issued a "revised final determination" based on new capacity tests conducted by WEPCO.<sup>88</sup> The revised determination concluded that NSPS would not apply to units 2 and 3 "so long as the capacity of (units 2 and 3) after completion of the work [would be] no higher than demonstrated in [WEPCO's] tests."<sup>89</sup> However, the "revised NSPS determination [did] not affect [the] determination that the [PSD-NSR] provisions would be applicable to the proposed work on [units 2 and 3]."<sup>90</sup>

---

85. *Id.*

86. See Gene A. Lucero, *Litigation and Administrative Practice Course Handbook Series - Coping With Environmental Enforcement And Compliance Under The New Administration: A Satellite Program*, 377 PLI/LIT 167, App. B-1 (Sept. 12, 1989) [hereinafter Lucero, *Thomas Memorandum*] (containing letter from Lee M. Thomas, Administrator of the EPA, to John W. Boston, Vice President of WEPCO (Oct. 14, 1988)).

87. *Id.* (emphasis added).

88. See Gene A. Lucero, *Litigation and Administrative Practice Course Handbook Series - Coping With Environmental And Compliance Under The New Administration: A Satellite Program*, 377 PLI/LIT 167, App. B-2 (Sept. 12, 1989) [hereinafter Lucero, *Revised Determination*] (containing letter from Don R. Clay, Acting Assistant Administrator for Air and Radiation of the EPA, to John W. Boston, Vice President of WEPCO (Feb. 15, 1989)).

89. *Id.*

90. *Id.*

### C. The Specific Holdings

WEPCO appealed the EPA's final determination. The United States Court of Appeals for the Seventh Circuit had jurisdiction to hear the appeal pursuant to the judicial review provision of the CAA, section 307.<sup>91</sup> The court applied the standard enunciated by the United States Supreme Court in *Chevron U.S.A. v. NRDC, Inc.* in reviewing the EPA's conclusion.<sup>92</sup>

#### 1. Whether WEPCO's Replacement Program Constituted a "Modification" Triggering the NSPS and PSD-NSR Programs?

Both prongs of the "modification" definition must be satisfied before a change in a stationary source will trigger the NSPS and PSD-NSR programs.<sup>93</sup> To constitute an NSPS "modification," or a PSD-NSR "major modification," a stationary source must undergo: (1) "a[] physical change, or change in the method of operation," and (2) "[the physical or operational change must] increase[] the amount of any air pollutant emitted by such source or . . . result[] in the emission of any air pollutant not previously emitted."<sup>94</sup> Thus, there must be an "operational or physical change," and an "increase in emissions," for a replacement to be considered a "modification."

---

91. *WEPCO*, 893 F.2d at 906.

92. 467 U.S. 837, 842-45 (1984). The *Chevron* Standard: Both the courts and the agencies must give effect to the expressed intent of Congress. However, if the statute is silent or ambiguous with respect to the issue to be determined, the court may only decide if the agency's interpretation is based on a permissible construction of the statute. *Id.* Moreover, a court must defer even more to an agency's construction of its own regulations. *Id.* (citing *Udall v. Tallman*, 380 U.S. 1, 16-17 (1965)). Finally, according to § 706(2) of the Administrative Procedure Act, agency actions are to be set aside only if they are "arbitrary, capricious, an abuse of discretion, or otherwise not in accordance with the law." *WEPCO*, 893 F.2d at 906.

93. See CAA §§ 111(a)(4), 169(2)(C), 42 U.S.C. §§ 7411(a)(4), 7479(2)(C)(1988). The EPA's "modification" rule is essentially the same as Congress' "modification." *Id.*

94. CAA §§ 111(a)(4), 169(2)(C), 42 U.S.C. §§ 7411(a)(4), 7479(2)(C)(1988).

- a. The First Prong: Whether The Replacement Project Constituted an "Operational or Physical Change"?

The Seventh Circuit concluded that WEPCO's replacement project constituted a "physical change"<sup>95</sup> for both NSPS and PSD-NSR purposes. Further, the court stated that the project did not fall within the EPA's "routine maintenance" exemption of the "modification" rule.<sup>96</sup>

WEPCO asserted that the plain meaning of "modify," according to Webster's Dictionary, means "to change or alter."<sup>97</sup> As a result, WEPCO contended that Congress did not intend "like-kind" or simple replacement procedures to constitute a "modification."<sup>98</sup> However, the court rejected the term's plain meaning.<sup>99</sup> The Seventh Circuit instead applied the *Chevron* standard and focused on Congress' intent and agency construction, rather "than on glosses found in the dictionary."<sup>100</sup> Congress intended the term "modification" to include "any" physical change.<sup>101</sup> In addition, the court stated that no case law supported WEPCO's narrow construction.<sup>102</sup> Moreover, the court pointed out that if NSPS and PSD-NSR programs were not invoked by "like-kind" replacements, application of these programs might be postponed into the future, contrary to Congress' intent.<sup>103</sup>

---

95. WEPCO's replacement program proposed "to replace rear steam drums on units 2, 3, 4, and 5; each of these steam drums measures 60 feet in length, 50.5 inches in diameter and 5.25 inches in thickness." *WEPCO*, 893 F.2d at 907. Also, the air heaters in units 1-4 were to be replaced. *Id.* at 908. Moreover, the four-year replacement program would take each of the units out of service for successive nine-month periods. Thus, the court reasoned WEPCO's proposed "life-extension" project amounted to a "physical change." *Id.*

96. *Id.* at 913.

97. *Id.* at 908.

98. *Id.*

99. *Id.*

100. *Id.*; see *supra* note 92.

101. *WEPCO*, 893 F.2d at 908.

102. *Id.* (citing *National-Southwire Aluminum Co. v. EPA*, 838 F.2d 835 (6th Cir.), *cert. denied*, 488 U.S. 955 (1988) (turning off pollution equipment constitutes a "physical change")).

103. *Id.* at 909.

There is no reason to believe that such a result was intended by Congress.

Furthermore, the court found its interpretation of the phrase "any physical change" consistent with two basic goals of the 1977 Amendments. First, Congress followed a balanced approach for both the NSPS and PSD-NSR programs.<sup>104</sup> Congress exempted existing plants from the NSPS and PSD-NSR requirements.<sup>105</sup> However, at the time of new or modified construction both programs would be invoked.<sup>106</sup> Thus, pollution control measures will be undertaken when they are most effective.<sup>107</sup> Second, the interpretation is consistent with the 1977 Amendments' basic goal of "technology forcing."<sup>108</sup> "The development of emission[] control systems is not furthered [when] operators [can], without exposure to the standards of the 1977 Amendments, increase production (and pollution) through the extensive replacement of deteriorated generating systems."<sup>109</sup>

After deciding that "any" physical change would trigger the CAA's "modification" provisions, the Seventh Circuit analyzed the EPA's "routine maintenance" exemption. The EPA regulations define "modification" as "any physical or operational change to an existing facility which results in an increase in the emission rate to the atmosphere of any pollutant to which a standard applies."<sup>110</sup> The regulation's "routine maintenance" exemption states that "[m]aintenance, repairs, and replacement which the Administrator determines to be routine for a source category," shall not by themselves be considered a "modification."<sup>111</sup>

---

The Clean Air Act Amendments were enacted to "speed up, expand, and intensify the war against air pollution in the United States with a view to assuring that the air we breathe throughout the Nation is wholesome once again."

*Id.* (quoting H.R. REP. NO. 1146, 91st Cong., 2d Sess. 1, reprinted in 1970 U.S.C.C.A.N. 5356, 5356).

104. *Id.*

105. *Id.*

106. *Id.*

107. *Id.*

108. *Id.*

109. *Id.*

110. 40 C.F.R. § 60.14(a); compare 40 C.F.R. § 60.14(b) with C.F.R. § 52.21(b)(2); see *supra* note 60.

111. See 40 C.F.R. § 60.14(e)(1); see *supra* notes 61-62 and accompanying text.

The EPA considered the nature, extent, purpose, frequency, cost and other factors to determine whether WEPCO's proposed project satisfied the "routine" exemption of the "modification" rule.<sup>112</sup> WEPCO's renovation project was not "routine," consequently, the project satisfied the "physical change" requirement of the "modification" rule under both the NSPS and PSD-NSR programs.<sup>113</sup>

b. The Second Prong: Whether the WEPCO Project Would Create an "Increase in Emissions" for NSPS and PSD-NSR Purposes?

There is no analytical difference between NSPS and PSD-NSR procedures for determining whether a "physical change" has occurred. However, the NSPS and PSD-NSR programs measure emissions in different manners and consequently apply different criteria to determine whether an "increase in emissions" has occurred.

---

112. *WEPCO*, 893 F.2d at 910. To see if a proposed change is "routine" the EPA makes a case-by-case determination. *Id.*

113. *Id.* To begin with, the EPA determined that the "nature and extent of the project was substantial," and that the nine-month expected down time for each unit was more than "routine." Also, WEPCO admitted in its permit application that typical maintenance was not included in the application. This suggested to the EPA that not even WEPCO considered the work routine. Furthermore, the EPA could find no renovation work at any electric utility that approached the nature and extent of WEPCO's. Second, the purpose was to extend the life of the deteriorating plant and to restore the units to original capacity. Finally, the frequency and cost of the work was found to be non-routine. *Id.* The project included replacement or renovation of items that would normally occur once or twice during a unit's expected life, at a cost of at least \$70.5 million. All of the above factors led the EPA to determine that the project was not "routine." *Id.* at 910-11.

WEPCO contended the cost, extent, and nature of its "life-extension" project should not be used to determine whether the project is "routine." *Id.* at 912. WEPCO asserted that these factors are already addressed in the EPA's "reconstruction" rule. *Id.*; see also 40 C.F.R. § 60.15.

Judge Cudahy, writing for the Seventh Circuit responded:

WEPCO's analysis fails to note, however, the fundamental differences distinguishing the reconstruction and modification provisions. The reconstruction provision applies to any substantial replacement (more than 50% of the cost of a new facility) even if the replacement causes no subsequent increase in emissions. In sharp contrast, the modification provision applies to any physical change, without regard to cost, that causes an increase in emissions.

*WEPCO*, 893 F.2d at 912.



### i. NSPS Measurements

The technology-based "NSPS program is concerned primarily with increases in emission rates, expressed in kilograms per hour of discharged pollutants."<sup>114</sup> The EPA compares the hourly emissions of the unit at its current maximum capacity to its potential emissions at maximum capacity after the modification.<sup>115</sup>

To make an accurate comparison, the court considered whether the pre-change emissions baseline, against which post-change emissions could be compared, was properly figured. EPA initially relied on WEPCO's 1987 figures for the actual operations and emissions of each unit to calculate the pre-change emissions baseline.<sup>116</sup> Since WEPCO believed units 1 through 4 were capable of operating at higher rates of production than the 1987 figures indicated, it challenged the use of those figures to calculate the preliminary baselines.<sup>117</sup> Consequently, WEPCO conducted tests to determine each unit's maximum capacity.<sup>118</sup> As a result of these tests, the EPA agreed that units 2 and 3 could be operated at their designed capacities, and subsequently revised the units' baseline levels.<sup>119</sup> Since there would be no increase in production or emissions for units 2 and 3 after renovation, NSPS would not apply.<sup>120</sup> However, NSPS would apply to units 1, 4 and 5.<sup>121</sup>

Next, the Seventh Circuit considered whether the NSPS

---

114. *WEPCO*, 893 F.2d at 913; see 40 C.F.R. § 60.14(b); see also *supra* note 60.

115. *WEPCO*, 893 F.2d at 913; see 40 C.F.R. § 60 app. C (formula for determining a change in the baseline emissions).

116. *WEPCO*, 893 F.2d at 913.

117. *Id.*

118. *Id.*

119. *Id.*

120. *Id.*

121. *Id.* The court dismissed WEPCO's assertion that the 1987 figures should not be used to determine the baseline rates for units 1, 4 and 5. WEPCO argued that the 1987 figures reflected voluntary safety considerations and low electricity demands, and that the figures did not reflect the units' operating capacity. *Id.* The court countered by noting that the baseline determinations were based on WEPCO's own data, and the EPA permitted WEPCO to conduct new tests that were eventually used to revise the baseline for units 2 and 3. *Id.* at 914.

program required the use of a "representative" year in determining a pre-change baseline rate of emissions.<sup>122</sup> The EPA determined the baseline emission rate for each unit by using the unit's hourly maximum capacity just prior to the renovations.<sup>123</sup> However, WEPCO argued that a "representative" year must be used to determine a pre-change baseline rate of emissions.<sup>124</sup>

The court disagreed with WEPCO's assumption that the phrase "representative performance of the facility" required the EPA to choose a "representative" year. The court felt that the phrase "refer[red] generally to all conditions of the test, not specifically to its timing."<sup>125</sup> This interpretation ensures that the "operator will not doctor testing conditions to produce favorable emission results" and is supported by the EPA's explanation of the NSPS regulations.<sup>126</sup>

In conclusion, the Seventh Circuit held that the EPA's determination, that WEPCO's "life-extension" project would create an "increase in emissions" in three of WEPCO's five units, was properly supported.<sup>127</sup> EPA adequately ensured that the emissions data reflected the pre-change baseline performance levels of WEPCO's units. The pre-change emissions baseline for units 1, 4, and 5 were significantly lower than the

---

122. *Id.*

123. *Id.*; see 40 C.F.R. § 60.14(b)(1), (2).

124. *WEPCO*, 893 F.2d at 914.

125. *Id.* at 915.

Tests shall be conducted under such conditions as the Administrator shall specify to the owner or operator based on *representative performance* of the facility. At least three valid test runs must be conducted before and at least three after the physical or operational change. All operating parameters which may affect emissions must be held constant to the maximum feasible degree for all test runs.

40 C.F.R. § 60.14(b)(2) (emphasis added); compare 40 C.F.R. § 52.21(b)(21)(ii) (PSD-NSR program) ("The Administrator shall allow the use of a different *time period* upon a determination that it is more *representative* of normal source operation.") *Id.* (emphasis added).

126. *WEPCO*, 893 F.2d at 915.

"[E]ach set of emission tests (using manual tests or continuous monitors) conducted before and after a physical or operational change would consist of at least three runs and would be conducted under *representative operating conditions*." *Id.* (quoting 39 Fed. Reg. 36,946, 36,947 (1974)) (emphasis added).

127. *Id.*

units' post-change emissions potential. As a result, units 1, 4, and 5 fulfilled the "increases in emissions" prong for the NSPS "modification" rule, thus satisfying both prongs needed to constitute an NSPS "modification."<sup>128</sup> On the other hand, the post-change emissions potentials of units 2 and 3 could never exceed their pre-change emissions baseline. Consequently, since units 2 and 3 would not create an "increase in emissions" both were effectively removed from the NSPS program.<sup>129</sup>

## ii. PSD-NSR Measurements

In sharp contrast to NSPS, the air quality-based PSD-NSR is constrained to measuring yearly net emissions increases, represented in tons per year.<sup>130</sup> The PSD-NSR program subjects all facility major modifications or construction to pre-construction review.<sup>131</sup> EPA's PSD-NSR regulations defined "major modification" as "any physical change in or change in the method of operation of a major stationary source that would result in a significant net emissions increase of any pollutant subject to regulation under the Act."<sup>132</sup>

To detect whether the proposed "life-extension" project would result in a net emissions increase, EPA applied an "actual-to-potential" methodology; EPA compared WEPCO's actual pre-change emissions with WEPCO's post-change potential emissions.<sup>133</sup> To accomplish this "actual-to-potential" "increase in emissions" determination, "EPA first examined the 2-year period of 1983 through 1984 as the pre-[change] baseline period . . . ."<sup>134</sup> However, the Administrator decided

---

128. *Id.* at 907, 913-15.

129. *Id.* at 913, 915.

130. *Id.* at 915; see *infra* note 134 and accompanying text.

131. *WEPCO*, 893 F.2d at 915.

132. 40 C.F.R. § 52.21(b)(2)(i).

133. *WEPCO*, 893 F.2d at 916.

134. *Id.*; see 40 C.F.R. § 52.21(b)(21)(ii).

In general, actual emissions as of a particular date shall equal the average rate, in tons per year, at which the unit actually emitted the pollutant during a two-year period which proceeds the particular date and which is representative of normal source operation. The Administrator shall allow the use of a different time period upon a determination that is more representa-

to rely on data from earlier years as the pre-change baseline period to determine whether the "life-extension" would cause a net increase in emissions.<sup>135</sup> Also, to determine if there would be an increase in net emissions levels over the pre-construction baseline levels, the EPA calculated the plant's post-change "potential to emit" based on "round-the-clock" operations.<sup>136</sup>

In determining the validity of EPA's "increase in emissions" calculation, the court first considered whether EPA accurately invoked the "potential to emit" concept by using an "actual-to-potential" methodology in calculating the net emissions increase. The PSD-NSR regulations provided that the EPA may utilize, as a post-change baseline, a facility's potential to emit if the unit "has not begun normal operations on the particular date."<sup>137</sup> EPA argued that the phrase "has not begun normal operations" can be applied to both new and modified units.<sup>138</sup> On the other hand, WEPCO contended that it should only be applied to new units that have never been in operation.<sup>139</sup> Also, EPA contended that in calculating net emissions increases EPA "consistently assumed that 'new or modified units' would be deemed to operate at maximum physical or federal enforceable levels."<sup>140</sup> The Seventh Circuit found EPA's analysis unsound, and thus would not accept EPA's determination that there was an "increase in emissions," since the existing regulations did not support such an application.<sup>141</sup> However, the court added that the "EPA may,

---

tive of normal source operation. Actual emissions shall be calculated using the unit's actual operating hours, production rates, and types of materials processed, stored, combusted, during the selected time period.

*Id.*

135. *WEPCO*, 893 F.2d at 916. Due to recent cracks in the rear steam drums, earlier years were used because they were more "representative of normal source operation" than the years 1983 and 1984. *Id.*

136. *Id.*

137. 40 C.F.R. § 52.21(b)(21)(iv).

138. *WEPCO*, 893 F.2d at 917.

139. *Id.*

140. 45 Fed. Reg. 52,676, 52,718 (1980).

141. *WEPCO*, 893 F.2d at 917.

[I]n order to demonstrate that the Port Washington like-kind replacement project constitutes a modification, the EPA applie[d] the potential to emit

if it wishes undertake notice and comment procedures to apply the potential to emit concept to like-kind replacement."<sup>142</sup>

Moreover, in determining the validity of EPA's "increase in emissions" determination, the court decided whether the EPA was correct in assuming "round-the-clock" operations in calculating the facility's "potential to emit." The EPA's assumption of "round-the-clock" operations, in calculating the facility's "potential to emit" after renovation, troubled the court.<sup>143</sup> The court held that the calculations should be based on "'emissions that can be generated while operating the source as it is intended to be operated and as it is normally operated.'"<sup>144</sup> Consequently, the court rejected the EPA's assumption and application of the "potential to emit" concept.<sup>145</sup> Thus, the determination that there was a PSD-NSR "modification" was subsequently set aside.<sup>146</sup>

For review, WEPCO's "life-extension" project: (1) did not fall within EPA's "routine maintenance" exemption of the NSPS and PSD-NSR "modification" rules;<sup>147</sup> (2) satisfied the "physical or operational change" prong of the "modification" rule for NSPS and PSD-NSR;<sup>148</sup> (3) fulfilled the "increase in emissions" prong for the NSPS "modification" rule for three of WEPCO's five units, thus satisfying both prongs needed to constitute an NSPS "modification" for those three units;<sup>149</sup> and (4) avoided the "increase in emissions" prong for the PSD-NSR "modification" rule, thus escaping the PSD-NSR new source review for all five units.<sup>150</sup>

---

concept (to show an increase in emissions). And in order to apply the potential to emit concept to like-kind replacement, the EPA assume[d] that the plant is a "modified" unit. . . . [W]e cannot defer to agency interpretation, that, as applied here, appears to assume what they seek to prove.

*Id.*

142. *Id.* at 918.

143. *Id.* at 917.

144. *Id.* (quoting *United States v. Louisiana Pacific Corp.*, 682 F. Supp. 1141 (D. Colo. 1988), relying on *Alabama Power Co. v. Costle*, 636 F.2d 323 (D.C. Cir. 1979)).

145. *Id.* at 918.

146. *Id.*

147. See discussion *supra* notes 110-13.

148. See discussion *supra* part III.C.1.a.

149. See discussion *supra* part III.C.1.b.i.

150. See discussion *supra* part III.C.1.b.ii.

2. Whether WEPCO's Units Could Escape NSPS If WEPCO's Replacement Program, When Combined With a Fuel Switch, Would Not Result in an Increase in Emission Rates for Those Units?

Finally, EPA refused to permit WEPCO's escape from the technology-based NSPS by combining the "life-extension" project with a switch to lower sulfur coal, as a way of preventing an "increase in emissions."<sup>151</sup> The EPA explained that "the statute reflects a basic political decision that fossil-fuel-fired sources not rely only on naturally occurring less-polluting fuels to comply with NSPS. Instead, Congress declared that compliance must depend in part upon the application of flue gas treatment or other pollution control technologies."<sup>152</sup>

In accord with *Chevron's* holding, the Seventh Circuit first examined Congress' expressed intent. It then examined the legislative history to decide if the EPA's position was properly supported.<sup>153</sup> The court concluded that the legislative history demonstrated that Congress rejected fuel switching as a method of avoiding the impact of NSPS.<sup>154</sup>

---

151. *WEPCO*, 893 F.2d at 918.

152. Lucero, *Revised Determination*, *supra* note 88.

153. *WEPCO*, 893 F.2d at 918.

154. *Id.*

Fuel switching from high sulfur to low sulfur coal would produce emissions reductions but could have a substantial impact on regional coal markets. Most high sulfur coal is located in the eastern region of the country, while most low sulfur coal is found in the West. Most opposition to fuel switching focuses on the loss of mining jobs in eastern coal regions. However, any economic effects could be offset by coal washing to prevent switching, or federal assistance to the high sulfur coal industry. Under section 125 of the Clean Air Act, states or EPA may restrict coal consumption to coal which is produced locally or regionally, if such action would prevent significant economic disruption.

Regan J.R. Smith, *Playing the Acid Rain Game: A State's Remedies*, 16 ENVTL. L. 255, 310 (1986).

Recognizing the economic effects of fuel-switching, Illinois created a law designed both to save approximately 2,500 low sulfur coal mining jobs and to prevent the creation of ghost towns. *Illinois: New Law Requires Utilities to Balance Clean Air Law, Needs of State Coal Industry*, [22 Current Developments] Env't Rep. (BNA) 1278 (Sept. 6, 1991). The Illinois law prevents utilities greater than a certain size from switching to low sulfur coal as a means of reducing SO<sub>2</sub> emissions in order to comply with the Clean Air Act. *Id.* Instead, those utilities will be required to install scrub-

#### IV. The Evolution of the WEPCO Proposal

##### A. The Perceived Possible Impacts of the WEPCO Decision Without A WEPCO Solution

The *WEPCO* court held that WEPCO's "like-kind" replacement project constituted a "modification" triggering the NSPS program. The project was a "modification" since: (1) it was a "non-routine" physical change;<sup>155</sup> and (2) the operation of the units after the renovation increased the hourly potential emission rate, for each pollutant to which a standard applied, over the pre-change emissions rate.<sup>156</sup> Further, the court determined that WEPCO could not utilize lower sulfur coal to prevent SO<sub>2</sub> emission increases in order to evade the NSPS program for SO<sub>2</sub>.<sup>157</sup> Therefore, the decision made it necessary for WEPCO to install pollution control equipment to satisfy the technology-based NSPS program.<sup>158</sup>

##### 1. The Perceived Possible Impacts on Utility Maintenance and Life-Extension Projects

The *WEPCO* decision created fear in the utility industry that similar renovation projects, needed to eliminate safety hazards or improve plant efficiency, would trigger the strin-

---

bers. *Id.*

155. See *supra* notes 110-13 and accompanying text.

156. See *supra* notes 114-26 and accompanying text.

157. See discussion *supra* part III.C.2.

158. To satisfy the NSPS program, WEPCO's renovation project was enlarged to include upgrading of the electrostatic precipitators (ESP's) on four boilers and the installation of sodium bicarbonate injection systems for SO<sub>2</sub> control on two boilers and SO<sub>3</sub> flue gas conditioning on the remaining boilers. *Industry: Wisconsin Utility Selects R-C for ESP Upgrades at Coal Plants*, CLEAN-COAL/SYNFUELS LETTER, June 17, 1991, at 2.

Research-Cottrell was awarded a \$10.5-million contract to upgrade the ESP's. *Id.* Upgrading the old ESP's includes replacing their internal components with Research-Cottrell Duratodes and G-Opzel collecting plates. *Id.* Also, in order to accommodate the new flue gas conditions, the height and length of each ESP must be increased. *Id.*

Consequently, the total capital cost for the project rose by 87.5% and it became necessary for WEPCO to cut the plant's size from 400-MW to 320-MW. *Securing America's Energy Future: A Primer on the National Energy Strategy*, HERITAGE FOUND. BACKGROUNDER (Heritage Found., Wash. D.C.), Aug. 9, 1991, at 17 [hereinafter *NES*].

gent NSPS and/or PSD-NSR or NNSR programs, and thus require the enlargement of renovation projects to include expensive pollution control equipment.<sup>159</sup> This fear was expected to force industry to choose between: (1) either postponing maintenance projects needed to eliminate safety hazards or improve plant reliability, or life-extension projects; and (2) temporary (in the case of time required to permit and to install pollution controls) or permanent (in the case of the burdensome expense of installing pollution controls) facility shutdown.<sup>160</sup>

Consequently, some studies concluded that the impact of the WEPCO decision could seriously frustrate utilities' efforts to meet increased energy demands, since some utilities would be forced to choose either continued plant operation at reduced capacity or plant retirement, rather than refurbishment or life-extension projects.<sup>161</sup> By 1995, a study by Jill Baylor

---

159. See Baylor, *supra* note 6, at 24; *Environment: Utilities Ask New EPA Administrator to Reverse Recent Clean Air Rulings*, ELECTRIC UTIL. WK., Apr. 3, 1989, at 15 [hereinafter *Utilities Ask EPA*]; see also 136 CONG. REC. S3748, S3754 (daily ed. Apr. 3, 1990) (statement of Sen. Johnston regarding plant efficiency).

160. *American Boiler Manufacturers Accuse Environmental Protection Agency of Circumventing Federal Administrative Procedures Act*, PR Newswire, July 11, 1989, available in LEXIS, Nexis Library, Prnews file.

161. Baylor, *supra* note 6, at 27; see *Court Upholds EPA on NSPS Question in WEPCO Case, Rejects PSD/-NSR Finding*, ELECTRIC UTIL. WK., Jan. 29, 1990, at 1; see also 136 CONG. REC. S17,429 (daily ed. Oct. 27, 1990) (letter from various senators to Sen. Baucus, Oct. 12, 1990).

Utilities will conduct economic studies incorporating NSPS and PSD-NSR requirements to determine the selection of one of the "6 R's," run, replace, reserve, refurbish, repower, or retire, for a unit. Baylor, *supra* note 6, at 22. This is termed a life-extension study. *Id.* Some of the "6 R's" and "life extension" are described below:

Cold Standby Reserve—Units are idle, but able to return to service within a period of days or weeks. Units are usually partially manned to provide minimum maintenance.

Life Extension—The retention in service of a generating unit beyond its original design or economic lifetime. Investments may be required to maintain the operating status of the unit at acceptable levels of availability and efficiency.

Mothball (preserved retirement)—Units are idle but maintained such that they can be returned to service within a period of months. Manning levels at the plant are reduced and equipment protection measures are taken.

Refurbishment—The process of modifying, upgrading, replacing, or repairing components to achieve extended life, improved reliability, and or increased efficiency.



estimated that approximately twenty-five percent of the United States installed "electric capacity will be fossil[-fuel]-fired facilities which are at or near their designed life."<sup>162</sup> In particular, the Baylor study suggested that 270 500-MW units would need to be built to replace these facilities.<sup>163</sup> Instead, many of the units at or near their design life will be required to generate electricity beyond 1995 and will require life-extension projects to meet expected electricity demands.<sup>164</sup> The capital costs for life-extension projects were expected to double if the projects were required to contain pollution controls because the projects triggered the NSPS or PSD-NSR programs.<sup>165</sup> It was presumed that these additional costs, in some cases, would require retirement of a unit. In addition, another study determined that WEPCO's impact on retirement plans could hinder the reliability of the electricity supply.<sup>166</sup>

---

Repowering—The process of retrofitting advanced power generation technologies to existing power plants, including combined cycle, fluidized bed, and gasification.

Retirement—A unit taken out of service, not manned or maintained.

*Id.* at 28.

162. Baylor, *supra* note 6, at 28. A separate assessment by the Electric Power Research Institute determined that 54,000 MW out of 1988's 287,620 MW coal-fired generating capacity (about one-fifth) will reach 40 years old (the typical designed life-span of a plant) by the year 2000. By the year 2010 an additional 68,000 MW will attain 40 years. John W. Lillywhite, *Strategic Planning Issues for Future Coal-Fired Power Generation*, 124 No. 12 *FORT.* 17, 18 (1989).

163. Baylor, *supra* note 6, at 24.

164. *Id.*; see also Lillywhite, *supra* note 162, at 18 (discussing future demand of electricity and the effect WEPCO might have on plant life-extension projects). A study conducted by the National Coal Association concluded that between 1988 and the year 2000 there will be a 24% percent growth of coal use by electric utilities. *Id.*

165. Baylor, *supra* note 6, at 28.

166. 136 CONG. REC. S3717, S3724 (daily ed. Apr. 3, 1990). "[A]s many as 138 million people through 1995," could expect the electric supply's reliability to falter according to Applied Economic Research (an expert in electric supply forecasting). *Id.*

2. The Perceived Possible Impacts on Utility Clean Coal Technology<sup>167</sup> Projects and Voluntary Shifts to Lower Polluting Fuels

The WEPCO decision worried Clean Coal Technology (CCT) host utilities that their projects would be subjected to NSPS, PSD-NSR, and NNSR new source requirements.<sup>168</sup> Some CCT host utilities left the Department of Energy's CCT program because they believed NSPS and PSD-NSR would apply if emissions increased after the CCT project was terminated.<sup>169</sup> CCT hosts' fears were heightened when EPA told Ohio Edison that new source requirements were likely to apply if emissions increased after the CCT project was completed.<sup>170</sup>

The WEPCO decision was also expected to discourage voluntary shifts to lower polluting fuels.<sup>171</sup> This fear was realized when EPA determined that Detroit Edison's proposed plan to use natural gas as well as its current fuel would subject the unit to PSD-NSR review for nitrogen oxide emissions.<sup>172</sup>

3. The Perceived Possible Impacts on Utilities' Response to Environmental Control Requirements Under the Proposed Acid Rain Legislation

The WEPCO decision took on added significance in light of the CAA acid rain proposals. Utilities feared compliance

---

167. The Clean Coal Technology (CCT) program funds the demonstration of inventive and cost-effective SO<sub>2</sub> and NO<sub>x</sub> emission reduction technologies. Malley, Jr., *infra* note 195, at III. Congress created the CCT program in order to: develop marketable technologies to be used in implementing the Clean Air Act; and to assure that several cost-effective retrofits are available to utilities in the case that they are required by the new acid rain control scheme to reduce emissions. *Id.* Thus, the CCT was intended to fuel the ever increasing use of coal without frustrating compliance with the Clean Air Act. See NES, *supra* note 158, at 17.

168. EPA's WEPCO Ruling Worries CCT Hosts: Utilities Seek Curbs on the NSPS Imposition, COAL WK., Mar. 13, 1989, at 1 [hereinafter CCT Hosts].

169. 'WEPCO' Court Decision Yields Mixed Bag for Utilities, CCT, CLEAN-COAL/SYNFUELS LETTER, Jan. 29, 1990, at 1.

170. CCT Hosts, *supra* note 168, at 1.

171. Utilities Ask EPA, *supra* note 159, at 15.

172. *Id.*

with the proposed pollution reduction control schemes, through the addition of pollution controls, would subject them to NSPS and PSD-NSR new source requirements. Consequently, the Administration presumed the *WEPCO* decision to be a hindrance in the development of the SO<sub>2</sub> emissions trading system.<sup>173</sup>

#### 4. The Perceived Possible Impacts on the Administration's National Energy Strategy

The Administration assumed that the effects of the *WEPCO* decision would interfere with the National Energy Strategy (NES) due to the following possibilities: (1) impacts on utility maintenance and life-extension projects;<sup>174</sup> (2) impacts on utility CCT projects and voluntary shifts to lower

---

173. "If opportunities for cost effective emissions control or over-control were foregone or delayed because of concerns about the application of new source review, the trading system, the economy, and the environment would all suffer." *Clean Air Act Implementation: Hearing[] Before the Subcomm. on Health and the Env't of the House Comm. on Energy and Commerce, Part I*, 102d Cong., 1st Sess. 283, 304 (1991) [hereinafter *WEPCO Rule Hearing*] (statement of Linda G. Stuntz, Deputy Under Secretary, Office of Policy, Planning, & Analysis, DOE); see also 136 CONG. REC. S17,429, S17,429 (daily ed. Oct. 27, 1990) (statement of Sen. Baucus); 136 CONG. REC. S3717, S3724 (daily ed. Apr. 3, 1990) (Some expected the EPA's "modification" interpretation to undermine Title IV's market-based acid rain control program, and thus create an electric reliability problem.) (statement of Sen. McClure).

The [A]dministration . . . was concerned that the . . . new source review program could impact adversely on the speed in which utilities would, in fact, be able to make their decisions and clean the air from . . . sulfur and nitrogen dioxides. . . . [I]t was because of the environmental concern and the desire to enable the acid rain trading system to work to its maximum potential to reduce the costs of the acid rain [control] . . . , that we felt it was necessary to provide clear guidance.

*WEPCO Rule Hearing*, *supra* at 376 (testimony of William G. Rosenberg, Assistant Administrator of the Office of Air and Radiation, EPA); see also *infra* note 259 (discussing how guidance was needed to harmonize the market-based provisions of Title IV's acid rain control scheme with the NSR program of Title I); Norman W. Fichthorn, *A Review of Major Provisions: Command-And-Control vs. The Market: The Potential Effects of Other Clean Air Act Requirements on Acid Rain Compliance*, 21 ENVTL. L. 2069, 2074 (1991) ("[I]t is essential that neither old nor new command-and-control programs be allowed to get in the way of the allowance trading market. The command-and-control programs should not be permitted to disrupt the rational economic decision making that is necessary to make Congress's new program work.").

174. See generally *supra* part IV.A.1.

polluting fuels;<sup>175</sup> and (3) impacts on utilities' response to environmental control requirements under the proposed acid rain legislation.<sup>176</sup>

One goal of the National Energy Strategy is to promote coal production.<sup>177</sup> Today, energy from coal accounts for nearly a quarter of the United States' energy consumption.<sup>178</sup> The United States coal consumption level of 1990 is expected to double by the year 2010.<sup>179</sup> In order to foster coal usage in the United States, Congress developed the CCT program,<sup>180</sup> and the Administration included this as part of its National Energy Strategy.<sup>181</sup>

Another objective of the Administration's NES is to increase the use of domestic natural gas; a natural gas boost is

175. See generally *supra* part IV.A.2.

176. See generally *supra* part IV.A.3.

177. See *NES*, *supra* note 158, at 16. It also was seen as a hindrance to the United States' competitiveness. See 163 CONG. REC. S3717, S3724 (daily ed. Apr. 3, 1990).

178. *NES*, *supra* note 158, at 16.

179. *Id.* In 1990, the United States used 894.6 million tons of coal. *Id.*

180. See *supra* note 167.

181. See *NES*, *supra* note 158, at 16. "[A]n increased demand for electricity worldwide and the 'westernization' of Eastern Europe would all be factors that would help boost coal and coal technology markets in the coming decade." *DOE Sees Prices, Environment Shaping Coal Use In Decade Ahead*, CLEAN-COAL/SYNFUELS LETTER, Jan. 15, 1990, at 5. Jerry S. Farrington chairman of EEI, chairman and CEO of Texas Utilities Co., and chairman of USCEA, stated that "electricity's share of the energy market will grow from [thirty-six] percent now to [forty-six] percent in [twenty] years." *Trends, Solutions, Environment, Policy are Covered at APC*, ELECTRIC LIGHT & POWER, July, 1991, at 12.

A draft National Coal Council study on the near term role for coal outline[d] eight steps for the US [DOE] to take to continue to ensure coal's active role over the next decade in the total US energy picture. In its advisory role to DOE the Coal Council's study suggest[ed] actions the [DOE] [could] take to support the Bush Administration's National Energy Strategy, which one DOE official said could still largely be implemented administratively even if delays continue in Congress. . . . [The draft, an earlier version of a final study voted on by industry on January 28, 1991, recommended among its eight suggestions that:] DOE Secretary work closely with the [EPA] . . . to seek balanced solutions to energy and environmental issues such as: Environmental regulations that address external environmental and economic costs of burning coal, Clean Air Act amendments including air toxics and EPA's upcoming ruling on the [WEPCO case].

*Draft Council Study Plots 8-Point Plan for Next Decade*, CLEAN-COAL/SYNFUELS LETTER, Nov. 25, 1991, at 4.

expected to promote the nation's economic health and security.<sup>182</sup> To implement this strategic goal, the Administration pushed for a WEPCO-"fix" to "encourage construction of more gas-fired co-generators and facilitate fuel conversions of old existing plants to natural gas."<sup>183</sup> The Administration feared that the expensive and time-consuming NSR would act as a disincentive to utilities that would otherwise make voluntary switches from coal to natural gas or gas/coal firing.<sup>184</sup>

In sum, the WEPCO decision created fear in the utility industry and the Administration. Both feared that voluntary or necessary renovations to aging plants would trigger new source requirements and thus force the inclusion of expensive pollution control technology. The Administration and utilities sought a WEPCO-"fix" to remove the decision's negative impact on: (1) utility maintenance and life-extension projects;<sup>185</sup> (2) voluntary utility modifications to use cleaner coal technol-

---

182. See generally *Commerce and Trade Speeches or Conferences: News Conference, Re: Natural Gas Reforms*, Fed. News Serv., Mar. 6, 1992, available in LEXIS, Nexis Library, Fednew File [hereinafter *DOE Natural Gas News Conference*] ("The NES is expected to substantially increase natural gas demand by at least [one] trillion cubic feet per year by the year 1995 and thereafter."); see *President Bush and Administration Outline Regulatory Reform Initiatives that Focus on Economic Plight of the Natural Gas Industry*, FOSTER NAT. GAS REP., Mar. 5, 1992, at 1 [hereinafter *Regulatory Reform*]. (Michael Baly, III, American Gas Association President, stated that "the President . . . recognized the importance of the natural gas industry to the nation's economic health and security. [The WEPCO-"fix" has] the potential to increase the demand of natural gas, which should stimulate the now-depressed exploration and production segment of the industry."). *Id.*

183. See *Regulatory Reform*, *supra* note 182. The final WEPCO-"fix" "ease[s] the regulatory burden for utilities seeking to switch to natural gas. Utilities seeking to switch will not have to go through EPA's [NSR] process." *Bush, DOE Announce Natural Gas Incentives*, THE ENERGY DAILY, Mar. 6, 1992, at 1. However, some believe that instead of boosting natural gas sales, the "fix" will actually prevent gas sales from reaching their true potential. Matthew L. Wald, *Bush Seeks Rules to Lift Sales of Gas*, N.Y. TIMES, Mar. 7, 1992, § 1, at 39.

Note, the NES goals will not only be carried out through regulatory reforms at the Federal Energy Regulatory Commission (FERC) and EPA, such as the WEPCO-"fix"; the Administration will also attempt to legislate its goals that can not be implemented through regulatory reform. See *DOE Natural Gas News Conference*, *supra* note 182.

184. *DOE Natural Gas News Conference*, *supra* note 182.

185. See generally *supra* part IV.A.1.

ogy or more efficient fuel mixes;<sup>186</sup> (3) utility compliance with the proposed acid rain legislation;<sup>187</sup> and (4) the Administration's National Energy Strategy. Although the pending CAAA's of 1990 addressed some of these concerns, it fell short of appeasing either the Administration or utilities with a comprehensive WEPCO-"fix."<sup>188</sup>

#### B. The CAAA's of 1990 Fell Short of a Comprehensive WEPCO Solution

The Administration's proposed WEPCO solution for applying new source requirements to existing utilities included:

[1] Retaining current distinctions between routine and non-routine physical and operational changes and requiring EPA to issue guidance to clear up definitions within 18 months of passage of a new Clean Air Act;

[2] Requiring that any changes to utilities in non-attainment areas that result in an increase in hourly emissions would be subject to NSPS permitting and reviews;

[3] Exempting temporary clean coal technology projects from review provisions;

[4] Exempting non-routine changes to comply with the acid rain provisions of the Air Act as well as other physical changes made at the same time if they do not exceed 20 percent of a project's total value;

[5] Allowing multi-plant utilities to calculate actual emissions on a state wide basis; and

[6] Defining low nitrogen oxide burners as the best available control technology for NO<sub>x</sub> control.<sup>189</sup>

However, after much debate Congress responded to the

186. See generally *supra* part IV.A.2.

187. See generally *supra* part IV.A.3.

188. See generally *supra* part IV.A.4.

189. Administration Presents WEPCO 'Fix': Cut Utility Emissions, Avoid NSPS Review, [21 Current Developments] Env't Rep. (BNA) No. 2, at 150 (May 11, 1990). Richard Schmalensee, a member of the Council of Economic Advisors, presented the Administration's WEPCO-"fix" at a hearing before the Senate Energy and Natural Resource Subcommittee on Energy Research and Development. *Id.*; see generally 136 CONG. REC. S3717-29 (daily ed. Apr. 3, 1990) (outlining a proposed legislative "fix" and providing a debate on its necessity).

WEPCO issue only by clarifying the applicability of new source requirements to changes involving repowering and CCT demonstration projects.<sup>190</sup> Solutions that clarified whether implementation of pollution control projects, necessary to comply with the proposed acid rain provisions, would constitute a "modification" triggering NSPS and NSR were deleted without prejudice.<sup>191</sup> Therefore, the amendments fell short of the utility industry's hopes for a comprehensive

---

190. Air Pollution Control Act, Pub. L. No. 101-549, sec. 401, §§ 409, 415, 104 Stat. 2399, 2619-21, 2625-26 (1990) (codified at 42 U.S.C. §§ 7651h, 7651n (Supp. II 1990)).

Sources that seek to comply with the acid rain reductions by "repowering" a unit with a qualified CCT are granted an extension of the acid rain controls deadline. CAA § 409, 42 U.S.C. § 7651h (Supp. II 1990). "Repowering" is defined as:

[The] replacement of an existing coal-fired boiler with one of the following clean coal technologies: atmospheric or pressurized fluidized bed combustion, integrated gasification combined cycle, magnetohydrodynamics, direct and indirect coal-fired turbines, integrated gasification fuel cells, or as determined by the Administrator, in consultation with the Secretary of Energy, a derivative of one or more of these technologies, and any other technology capable of controlling multiple combustion emissions simultaneously with improved boiler or generation efficiency and with significantly greater waste reduction relative to the performance of technology in widespread commercial use as of [November 15, 1990]. Notwithstanding the provisions of section [409(a) of the Act], for the purposes of this subchapter, the term "repowering" shall also include any oil and/or gas-fired unit which has been awarded clean coal technology demonstration funding as of January 1, 1991, by the Department of Energy.

CAA § 402(12), 42 U.S.C. § 7651a(12) (Supp. II 1990). Further, repowering projects qualifying for such an extension of the acid rain controls deadline are also exempt from NSPS program as long as the repowering "does not increase actual hourly emissions for any pollutant regulated under [the Act]." CAA § 409(d), 42 U.S.C. § 7651h(d) (Supp. II 1990).

Permanent CCT demonstration projects approved by the DOE or EPA are granted exemptions from the NSPS and PSD-NSR new source requirements. These projects are exempt from NSPS and PSD-NSR as long as potential emissions from the unit do not increase as a result of the project. CAA § 415(b)(3), 42 U.S.C. § 7651n(b)(3) (Supp. II 1990). Temporary projects are also exempt from NSPS in addition to NSPS and PSD-NSR, if they are operated for five years or less and the facility complies with the relevant state implementation plans and other air quality regulatory requirements during the project and after its termination. CAA § 415(b)(2), 42 U.S.C. § 7651n(b)(2) (Supp. II 1990).

Finally, under certain conditions, reactivation of "very clean units" receive an exemption from NSPS and PSD-NSR. CAA § 415(c), 42 U.S.C. § 7651n(c) (Supp. II 1990).

191. See CONFERENCE REPORT, *supra* note 8.

WEPCO—"fix."<sup>192</sup>

When the Clean Air Act Amendments (CAAA's) of 1990 successfully added a new title to address the problem of acid deposition,<sup>193</sup> the utility industry's fears were sustained since the amendments did not also provide a comprehensive WEPCO—"fix." The new control scheme for addressing the acid rain problem, Title IV,<sup>194</sup> focuses on utility power plant emissions of SO<sub>2</sub> and NO<sub>x</sub>.<sup>195</sup> The purpose of Title IV is to

192. After the CAAA's fell short of a comprehensive WEPCO—"fix," a "fix" was included in the National Energy Security Act of 1991, S. 1220. S. REP. NO. 72, 102d Cong., 1st Sess. 187-89 (1991); see *infra* part IV.C.

193. See generally DAVID M. GATES, *ENERGY AND ECOLOGY* 178-203 (1985) (discussing acid deposition).

Compounds of sulfur, nitrogen, or carbon react with water vapor to form acids in the form of gases, particulates, liquid droplets, or aerosols. *Id.* at 181. These acidic substances either fall out as dry deposition or are dissolved in water droplets and fall out as wet deposition. *Id.* The concentration of these acidic substances in the atmosphere determines the pH of wet deposition. *Id.* at 183.

"The pH scale runs from 0 to 14, with acidic values less than 7 and base [sic] values greater than 7." *Id.* If the pH value of rain drops from 6 to 5, the acidity has risen ten-fold. *Id.* Although, normal rain or snow has a pH of 6.0 or greater, in 1978 a rain fall in Pennsylvania had a pH of 2.32. *Id.* at 180, 184. Such low levels of pH, as well as levels not as dramatically low, have detrimental ecological impacts on aquatic and terrestrial ecosystems. *Id.* at 189-201.

The sources contributing to acid deposition include natural sources of sulfur and nitrogen compounds as well as anthropogenic sources like electric utilities, industrial and commercial power plants and boilers, residential furnaces, and vehicles. *Id.* at 201-02. In the United States, anthropogenic emissions of SO<sub>2</sub> increased from 14 million tons per year in 1950 to 29 million tons per year in 1965. *Id.* at 202. Anthropogenic emissions of NO<sub>x</sub> increased from about 8 to 10 million tons per year in 1950 to about 26 million tons per year in 1980. *Id.* Electric utilities in the United States account for 65% of the anthropogenic SO<sub>2</sub> emissions and 31% of the anthropogenic NO<sub>x</sub> emissions. *Id.* In addition, coal burning contributes 90% of the industry's sulfur emissions and 71% of its NO<sub>x</sub> emissions. *Id.*

194. CAA §§ 401-416, 42 U.S.C. §§ 7651-7651o (Supp. II 1990).

195. For a history on the court and EPA inaction to use sections of the Clean Air Act prior to the 1990 amendments to combat SO<sub>2</sub> and NO<sub>x</sub> emissions, see Carol Garland, *Acid Rain Over the United States and Canada: The D.C. Circuit Fails to Provide Shelter Under Section 115 of the Clean Air Act While State Action Provides A Temporary Umbrella*, 16 B.C. ENVTL. AFF. L. REV. 1 (1988); J. Wallace Malley, Jr., *Acid Rain: A Decade of Footdragging May be Coming to an End*, 91 W. VA. L. REV. 817 (1989); Smith, *supra* note 154. Various proposals to combat acid rain were not adopted by EPA or mandated by the courts. Such proposals included "a short-term national ambient air quality standard [(NAAQS)] for SO<sub>2</sub>, an air quality standard for fine particulates, a 'regional haze' visibility program, a section 115 program to address alleged effects in Canada, and section 126 findings on interstate pollutant transport."



"reduce the adverse effects<sup>196</sup> of acid deposition through reductions in annual emissions of sulfur dioxide of ten million tons from 1980 emission levels, and, in combination with other provisions of [the] Act, of nitrogen oxide emissions of approximately two million tons from 1980 emission levels."<sup>197</sup> The Act requires the reductions of SO<sub>2</sub> to be carried out in two phases.<sup>198</sup> Phase I requires 111 specific plants to reduce their SO<sub>2</sub> levels to specified emissions levels by 1995.<sup>199</sup> Phase II subjects phase I plants,<sup>200</sup> and almost all others, to even lower SO<sub>2</sub> emission limits by the year 2000.<sup>201</sup> Recognizing the importance of a comprehensive WEPCO solution, both the conferees and President Bush urged EPA to arrive at a quick WEPCO resolution.<sup>202</sup>

In conclusion, Congress failed to fully enact the Administration's proposed WEPCO-"fix," which was created with the significant participation of the utility industry. Instead, Congress only addressed the industry's concern regarding the applicability of new source requirements to changes involving repowering and CCT demonstration projects. Congress explicitly declined to do the same for projects required to comply with the 1990 CAAA's Title IV acid rain control scheme. In fact, Congress declared: "*Except as expressly provided*, compliance with [Title IV] *shall not exempt or exclude*

---

Fichthorn, *supra* note 173, at 2073.

196. For a summary of the actual and potential impacts of acid rain, see Smith, *supra* note 154, at 258-65 (categorizing the actual and potential effects as either aquatic, terrestrial, material, visibility impairment, or human health).

197. CAA § 401(b), 42 U.S.C. § 7651(b) (Supp. II 1990) (citation added). In 1980, anthropogenic sources emitted approximately 26 million tons of SO<sub>2</sub>, and around 21 million tons of nitrogen oxide. Smith, *supra* note 154, at 257.

198. CAA §§ 404, 405, 42 U.S.C. §§ 7651c, 7651d (Supp. II 1990).

199. CAA § 404, 42 U.S.C. § 7651c (Supp. II 1990).

200. WEPCO's Port Washington plant is not listed for Phase I reductions. *Id.*

201. CAA § 405, 42 U.S.C. § 7651d (Supp. II 1990).

202. See PUB. PAPERS, *supra* note 9.

[President Bush in signing S. 1630 directed William Reilly to] implement this bill in the most cost effective manner possible. This means insuring that plants can continue to use emission trading and netting to the maximum extent allowed by the law; that the Administration's proposed policy on WEPCO is implemented to the extent allowed by the law as quickly as possible.

*Id.*

the owner or operator of any source subject to [Title IV] from compliance with *any other applicable requirements of [the CAA]*.<sup>203</sup> Such requirements include among others the NSPS, PSD-NSR and NNSR new source requirements. Consequently, the Administration continued to lobby both Congress and the EPA to adopt its WEPCO-"fix."

### C. A Comprehensive WEPCO-"Fix" was Included in the Senate Energy Bill

After the CAAA's fell short of a comprehensive WEPCO-"fix," a "fix" was included in the Senate Energy Bill, S. 1220.<sup>204</sup> The bill was reported by the Senate Energy and Natural Resources Committee but stalled on the Senate floor.<sup>205</sup> Before the bill stalled, Senator J. Bennett Johnston (D-La) announced that EPA is the best qualified body to determine the WEPCO issue.<sup>206</sup> Further, Johnston expressed confidence that EPA's proposed WEPCO rule clarified both the utilities' and the Administration's concerns.<sup>207</sup>

Senator Johnston introduced a shortened version of S. 1220.<sup>208</sup> The National Energy Security Act, S. 2116,<sup>209</sup> deleted four sections from the old bill: (1) the WEPCO-"fix"; (2) the Arctic National Wildlife Refuge (ANWR) leasing and drilling requirements; (3) the new Corporate Average Fuel Efficiency (CAFE) standards; and (4) a provision dealing with the recycling of lubricating oil.<sup>210</sup> Therefore, EPA was left to ham-

---

203. CAA § 413, 42 U.S.C. § 76511 (Supp. II 1990) (emphasis added).

204. S. REP. NO. 72, 102d Cong., 1st Sess. 187-89 (1991).

205. *Senator Johnston Resurrects Shortened Version of National Energy Strategy Bill Reported by Energy Committee Last Year*, FOSTER NAT. GAS REP., Jan. 30, 1992, at 3. [hereinafter *Shortened Version of NES Bill*].

206. *WEPCO Fix to Go*, INSIDE F.E.R.C., July 29, 1991, at 14 [hereinafter *Fix to Go*].

207. *Id.* For example, the Administration expects that the final WEPCO-"fix" "will encourage construction of more gas-fired co-generators and facilitate fuel conversions of old existing plants to natural gas." *Regulatory Reform*, *supra* note 182, at 1. This boost to the natural gas industry is an extension of the Administration's NES. *Id.*; see generally *supra*, part IV.A.4.

208. *Shortened Version of NES Bill*, *supra* note 205.

209. S. 2166, 102d Cong., 2d Sess. (1992).

210. 138 CONG. REC. S603 (daily ed. Jan. 29, 1992) (statement of Sen. Johnston); 138 CONG. REC. S822 (daily ed. Jan. 30, 1992) (statement of Sen. Johnston).

mer out a WEPCO-"fix."

#### D. The Proposed WEPCO-"Fix" Evolved

Finally, after two years of extensive negotiations with the Department of Energy (DOE), the EPA proposed a WEPCO-"fix."<sup>211</sup> United States Representative Henry Waxman (D-CA), chair of the House Energy and Commerce Subcommittee on Health and the Environment, criticized the way the proposal developed.<sup>212</sup> Waxman alleged that the DOE and Edison Electric Institute (EEI), an electric utility lobbying group,

211. See discussion *infra* note 212; see generally *DOE Natural Gas News Conference*, *supra* note 182 (construed from statements made by Admiral James D. Watkins, Secretary of Energy). By 1991 the Bush Administration had suffered two defeats in Congress. Both the President's National Energy Bill and the proposed Clean Air Act Amendments, providing for a solution to the WEPCO problem, failed to win passage. See discussion *supra* parts IV.B-C. As a result, the Bush Administration sought to further its National Energy Strategy (NES) through the regulatory process. In its negotiations, the DOE exerted substantial pressure upon the EPA to reach a WEPCO-"fix" consistent with the President's NES. See *infra* note 210.

212. *WEPCO Rule Hearing*, *supra* note 212, at 284.

The Subcommittee's staff report, according to Waxman:

[C]learly demonstrates a rule-making process that went sadly awry. Critical components of this rule were drafted not by EPA, . . . but by the U.S. [DOE]. Never before has EPA rule-making process been hijacked in this fashion.

The fingerprints of the electric utility lobbying group, the Edison Electric Institute, are all over the DOE's intervention. Only two days after EEI wrote to the [DOE] seeking weakening changes, DOE wrote to EPA seeking the exact same alterations.

The [EEI] told the [DOE] they needed a "good WEPCO fix." Two days later, DOE insisted that EPA issue "a good and comprehensive WEPCO fix" and went on to charge that the proposal was not "responsive to the needs of the electric utility industry." DOE fails to mention air quality protection as a consideration.

Soon after the DOE letter arrived at EPA, a letter appeared from Richard Schmalensee of the White House Council of Economic Advisors. The letter demands immediate resolution of all disputed issues as called for by the [DOE].

And that is the way it happened. The changes sought by the [EEI] were included in the proposal and the objections of the [EPA] were ignored.

It is well documented that the normal steps in the EPA rulemaking process - work group approval, steering committee review, red border review - were thrown over. What's left, in essence, is a rule written by polluters to benefit polluters.

*Id.*

"hijacked" the EPA rulemaking process.<sup>213</sup>

Extensive communications between the EEI, DOE, and EPA, formed the basis for Waxman's accusations.<sup>214</sup> For years the EEI actively discussed its position on WEPCO with the White House,<sup>215</sup> and on April 25, 1991, the EEI sent a letter to both the EPA and DOE.<sup>216</sup> The letter requested a "good WEPCO fix."<sup>217</sup> Just two days later, the DOE sought from the EPA a "good and comprehensive WEPCO fix."<sup>218</sup> The DOE also requested changes in the EPA's second draft proposal since it was "not responsive to the needs of the electric utility industry."<sup>219</sup>

Subsequently, EPA published a revamped proposal.<sup>220</sup> The proposal represented a pro-utility WEPCO-"fix;" many of the changes requested by the EEI and DOE were proposed by the EPA. Waxman claimed, "[t]he fingerprints of [EEI] [were] all over the DOE's intervention [in EPA's rulemaking]."<sup>221</sup>

213. *Id.*

214. *Id.*

215. *Waxman: 'Unprecedented Interference' By DOE, EEI Weaken EPA's WEPCO Rule*, ELECTRIC UTIL. WK., July 29, 1991, at 16. The EEI tried to make EPA "fix" its WEPCO determination since February of 1989 when Don Clay, Acting Assistant Administrator for Air and Radiation, signed WEPCO's final determination. *Edison Electric Institute, Press Briefing: Impact of Acid Rain Legislation on Electric Utility Industry*, Fed. News Serv., Apr. 11, 1990, available in LEXIS, Nexis Library, Fednew File (statement by Robert A. Beck, Director of Clean Air, Fossil Fuels and Natural Resources, EEI).

216. *WEPCO Rule Hearing*, *supra* note 173, at 284.

217. *Id.*

218. *Id.*

219. *WEPCO Proposal Creates Illegal Loopholes for Utilities to Escape Air Rules*, *Waxman Says*, [22 Current Developments] Env't Rep. (BNA) No. 13, at 779 (July 26, 1991); see "WEPCO Fix" is Fixed, INT'L GAS REP., June 13, 1991, at 13. The DOE believed "that it [was] critical for the [A]dministration to issue only a good and comprehensive WEPCO fix." *WEPCO Rule Hearing*, *supra* note 173, at 311 (summarizing a memorandum from the DOE to the EPA).

220. Requirements for Preparation, Adoption, and Submittal of Implementation Plans; Approval and Promulgation of Implementation Plans; Standards of Performance for Stationary Sources, 56 Fed. Reg. 27,629 (1991) (to be codified at 40 C.F.R. pts. 51, 52, 60) (proposed June 14, 1991) [hereinafter WEPCO Proposal].

221. *WEPCO Rule Hearing*, *supra* note 173, at 284.

During the hearing, Waxman also criticized intervention by the White House: [W]e have examined EPA proposals which were dramatically weakened

An attorney in the EPA's Office of General Counsel, E. Donald Elliott, responded that instead of DOE sending in comments in the usual manner, DOE "drafted up a model of what [DOE] thought [EPA] could do. [EPA] disagreed with them and the [WEPCO proposal] does not reflect many of the positions that DOE advocated [the EPA] should take."<sup>222</sup> Further, he stated that the DOE draft regulation had gone "beyond the law," but the EPA proposal did not.<sup>223</sup>

In considering the way in which the "fix" evolved, it is important to note that under the Clean Air Act only the EPA must keep a record of all *ex-parte* communications received during notice and comment of a proposed rule; the Council on Competitiveness, the White House, and the DOE are not required to submit into the docket communications they have

---

through interference by the White House, especially the Vice President's Council on Competitiveness.

This time, industry was able to use a different but equally insidious process: actually displacing the EPA proposal with one of their own before it left the agency. . . . Industry succeeded in illegally watering down the mandates of the Clean Air Act.

As members of this subcommittee are all too aware, passage of the Clean Air Act of 1990 was not an easy task. It was the culmination of many years of effort. . . . [T]he amendments that were enacted provided far more than just lip service to the problem.

They provide a tough but reasonable program that can actually work to bring cleaner air and better health to many millions of Americans.

President Bush was delighted to sign the 1991 law with great fanfare. But now that the cameras have left, his [A]dministration is helping polluters undermine the normal regulatory process.

Whether this is achieved through weakening changes to EPA proposals forced on the agency by White House Council on Competitiveness, or empowering DOE to write Clean Air Act regulations, the result is the same: dirtier air.

*Id.* at 284-85.

In support of such concerns, leaked interagency memos raised the issue of whether the White House improperly injected pro-utility positions into the proposed WEPCO-"fix." Barbara Rosewicz, *Interagency Memos Reveal White House Influencing EPA Clean-Air Proposals*, WALL ST. J., July 22, 1991, at A10. The memos revealed that White House economists and the DOE "played a heavy hand in pressuring the EPA" to weaken the "fix" to save utilities as much as five-billion dollars in pollution controls. *Id.*; see *infra* note 226 (discussing White House review legislation).

222. *WEPCO Rule Hearing*, *supra* note 173, at 382.

223. *Id.*

with the EEI, or any other entity.<sup>224</sup> This system of closed communications and the growing dissatisfaction with the motives and methods of the President's Council of Competitiveness<sup>225</sup> warrants the recent legislative push to shed light on the Administration's oversight (deregulation) process.<sup>226</sup>

224. See *Clean Air Act Hearing*, *supra* note 1, at 42-43; *WEPCO Rule Hearing*, *supra* note 173, at 379.

225. Waxman and others discussed the controversy surrounding the Council of Competitiveness:

(1) "America's new clean air programs and, in important ways, the integrity of the legislative process itself, are placed at risk through the wantonly illegal activities of the White House Council on Competitiveness. In many ways the Council, which apparently thinks itself beyond public accountability and beyond the law of the land, is a domestic version of the Iran-Contra operations of the National Security Council during the Reagan era." *Clean Air Act Hearing*, *supra* note 1, at 1 (statement of Rep. Henry Waxman).

(2) "The Council on Competitiveness routinely holds up regulations until weakening changes are agreed to by the [EPA]. In fact, as we meet here today, the Council is in the process of holding up EPA's newly repaired-version of the Clean Air permit program." *Id.* at 2.

(3) "Contemporary jargon has the statement of an obvious positive, a declarative statement of strong, honorific connotations, then followed quickly by a strong negative — 'Not.' And as I was reading some of the staff reports . . . , I think it's — in hearing what's coming out of the Vice President's so-called Council on Competitiveness, I think it's appropriate to state, the Council calls itself a deliberative forum offering guidance on policy issues that arise during the review process, that it's a high level policy group reviewing EPA's implementations of the Clean Air Act fairly and faithfully, and then saying quickly, 'Not.' . . . Battles that had been fought and won or not wholly lost years ago are now reappearing in a different arena, the Vice President's so-called Council on Competitiveness. This special, secret court for special interests has exerted behind the scenes pressure on much of the 1990 Clean Air Act amendments' implementation." *Id.* at 3 (statement of Rep. Gerry Sikorski).

(4) "[I]t borders on corruption." *Id.* at 4 (construing comments made in the reports of Time, Business Week, the National Journal, and the Wall Street Journal).

226. Due to the above concerns and skepticism with the current White House review procedures, Congressmen introduced S. 1942, The Regulatory Review Sunshine Act, which was designed to bring "greater openness and public accountability to the [f]ederal regulatory process." 137 CONG. REC. S16,250, S16,251 (daily ed. Nov. 7, 1991). This was an effort, in addition to the Administrative Procedure Act, the Freedom of Information Act, and the Government Sunshine Act, to provide openness in our executive branch. *Id.* The bill would require the Council on Competitiveness and OMB to keep on record all *ex-parte* communications made while reviewing proposed agency rules. *Congress, Environmentalists Concerned Over Quayle Plan to Continue Rule Review*, Daily Env't Rep. (BNA) No. 66, at A-6, A-7 (Apr. 6, 1992) [hereinafter *Rule Review*]. Senator Glenn, chairman of the Senate Governmental Affairs Committee and the bill's sponsor, stated that the legislative intent is to provide openness to this closed door process. *Id.* at A-7.

Despite the controversy in the WEPCO-"fix," the proposal was announced June 14, 1991.<sup>227</sup> On August 16, 1991, the EPA announced that the comment period would be extended.<sup>228</sup> On November 25, 1991, the comment period was reopened.<sup>229</sup>

The purpose of the supplementary notice and comment period was to receive comments solely on the information contained in Waxman's Congressional subcommittee hearing's transcript.<sup>230</sup> After much delay,<sup>231</sup> on July 21, 1992, EPA Administrator, William Reilly signed and issued the Administration's final WEPCO-"fix."<sup>232</sup> The final "fix" was revised

---

[Glenn stated that] hearings held over the last year have 'confirmed that the council operates in secret with no public accountability for its decisions, overrules scientific and technical findings by the agencies, and displaces the decision making authority vested in agency heads by law.

. . . [T]he council and OMB should not be able to undermine in private, regulations that enforce laws made in public . . . Secrecy in decision-making undermines public faith in government because it shows that government distrusts the public.'

*Id.*

227. See WEPCO Proposal, *supra* note 220.

228. Extension of Public Comment Period for Proposed WEPCO Rulemaking, 56 Fed. Reg. 40,843 (1991).

229. Reopening of Public Comment Period for Proposed WEPCO Rulemaking, 56 Fed. Reg. 59,238 (1991).

230. *Id.*

231. See *Acid Rain Rules Could Be Trapped In EPA-White House 'Turf Battle'*, ELECTRIC UTIL. WK., Feb. 10, 1992, at 7 (EPA officials delayed the "fix" because of disputes with other agencies. "Reportedly, EPA want[ed] to change the rule, tightening it in ways utilities and the [DOE] opposed."); *Energy Department Answers GAO Criticisms of CCT Program*, CLEAN-COAL/SYNFUELS LETTER, Feb. 17, 1992, at 1 (by January 16, 1992, the Office of Management and Budget (OMB) had yet to receive the "fix" for review.); *Senator, Ethanol Producers Delay Gas Rule; Snares, Environmentalists Charge 'Bad Faith'*, [22 Current Developments] Env't Rep. (BNA) No. 48, at 2635 (Mar. 27, 1992) ("[EPA] Administrator William K. Reilly decided not to issue the . . . WEPCO [rule] on March 20[th] as planned because he wanted more time to consider the issues . . ."); *In Final 'WEPCO Rule,' EPA Gives Utilities Exemptions From Review*, ELECTRIC UTIL. WK., June 1, 1992, at 1 (The WEPCO-"fix" was finally signed by Reilly on May 21, 1992, "after weeks of delay while the [EPA] wrangled with the [OMB] and the Council on Competitiveness over other clean air rules, notably the general permit regulations.").

232. Requirements for Preparation, Adoption and Submittal of Implementation Plans; Approval and Promulgation of Implementation Plans; Standards of Performance for New Stationary Sources, 57 Fed. Reg. 32,314 (1992) (to be codified at 40 C.F.R. pts. 51, 52, & 60) (finalized July 21, 1992) [hereinafter WEPCO Rule].

slightly in response to testimony before Congress and public comments.<sup>233</sup>

In conclusion, the EPA finally adopted a WEPCO-"fix" at the behest of the Administration and the utility industry. This "fix" was highly criticized as involving inappropriate collusion between the EPA, the DOE, and the EEI. Consequently, the resulting "fix" is a pro-utility solution.

## V. Analysis of the WEPCO-"Fix"

The WEPCO<sup>234</sup> decision and the emissions requirements of the acid rain control scheme made utilities fear that the installation of pollution control projects would trigger the NSPS, PSD-NSR or NNSR "modification" requirements.<sup>235</sup> EPA's WEPCO proposal was intended to clarify the applicability of NSR and NSPS for electric steam generating units.<sup>236</sup>

The WEPCO proposal set forth guidelines to determine the applicability of NSR to proposed projects.<sup>237</sup> The proposal: (1) provided a broad NSR exclusion for pollution control projects; (2) changed the NSR baseline; (3) employed an "ac-

---

233. 138 CONG. REC. S1725 (daily ed. Feb. 19, 1992).

234. 893 F.2d 901 (7th Cir. 1990).

235. Baylor, *supra* note 6, at 27.

236. WEPCO Proposal, *supra* note 220, at 27,630.

"Electric utility steam generating unit" is defined as: "[A] unit that is constructed for the purpose of supplying more than one-third of its potential electric output capacity and more than 25 MW of electrical output to any utility power distribution system for sale." *Id.* at 27,640, n.1 (to be codified at 40 C.F.R. pts. 51.165(a)(1)(xx)).

The proposal only extends to electric utility steam generating units. *Id.* at 27,630. EPA's experience led it to conclude that pollution control projects in the utility industry are generally "environmentally beneficial." *Id.* at 27,634-35.

Since the "fix" only extends to the utility industry, it has been criticized as a hindrance to non-utility sources. EPA's 'WEPCO Fix' Seen Hindering Non-Utility Generating Projects, IND. POWER REP., June 21, 1991, at 17. Some contend that by not offering the "fix" to non-utilities, the "fix" will allow "utilities to erect anti-competitive barriers." *Id.*

237. EPA also adopted changes to its NSPS and NSR regulations to address the changes Congress made in the 1990-CAAA's "to the applicability of new source requirements to clean coal technology (CCT) and repowering projects, and to 'very clean' units." WEPCO Rule, *supra* note 232, at 32,314; see note 190 and accompanying text. Analysis of these changes is beyond the scope of this article and are therefore omitted.



tual to future actual" methodology in calculating emission increases for units which have "begun normal operations," or a "representative actual annual emissions" methodology in calculating emission increases for new or replaced units; and (4) it provided an NSR exclusion to increases in emissions unrelated to the physical changes.<sup>238</sup> Also, if the project was a "major modification" for PSD-NSR purposes, the proposal made a presumption that low-NO<sub>x</sub> burners are BACT for NO<sub>x</sub>.<sup>239</sup> For NSPS, the proposal allowed a utility to use as its pre-change baseline the highest hourly emissions rate achievable at any time during the five years prior to the physical or operational change.<sup>240</sup>

EPA finalized the WEPCO-"fix" essentially in its original proposed form. Nevertheless, EPA dropped the controversial BACT presumption for NO<sub>x</sub>.<sup>241</sup> The only other significant change incorporated into the finalized WEPCO-"fix" is an added safeguard for the "representative actual annual emissions" methodology in calculating emission increases for new or replaced units for NSR purposes.<sup>242</sup>

#### A. Provision Removed From the Final WEPCO-"Fix": New Source Review - BACT presumption for NO<sub>x</sub>

If a project is a "major modification" triggering the PSD-NSR program, the proposal made a presumption that BACT for NO<sub>x</sub> is low-NO<sub>x</sub> burners.<sup>243</sup> EPA based the BACT presumption on the technology required under Title IV of the CAA.<sup>244</sup>

This section of the proposal received a great deal of criticism.<sup>245</sup> The Industrial Gas Cleaning Institute, Inc. (IGCI), an association of manufacturers, contended the presumption

---

238. WEPCO Proposal, *supra* note 220, at 27,630.

239. *Id.*

240. *Id.*

241. See discussion *infra* part V.A.

242. *Infra* notes 290-92 and accompanying text.

243. *Id.*; see *supra* note 45 (gives CAA definition of BACT).

244. WEPCO Proposal, *supra* note 220, at 27,638-39; see CAA § 407, 42 U.S.C. § 7651f (Supp. II 1990).

245. See generally *WEPCO Rule Hearing*, *supra* note 173.

would seriously compromise  $\text{NO}_x$  controls.<sup>246</sup> Also, EPA's ROMNET study concluded that low- $\text{NO}_x$  burner technology would not achieve CAA standards.<sup>247</sup> The ROMNET study showed that the use of low- $\text{NO}_x$  burners, instead of selective catalytic reduction (SCR), would undermine the ability of the whole Eastern seaboard to achieve ozone standards.<sup>248</sup> This study, dated after the WEPCO proposal, was added to the notice and comment docket.<sup>249</sup>

Moreover, low- $\text{NO}_x$  burners are only half as effective as SCR in removing  $\text{NO}_x$ .<sup>250</sup> Plus, low- $\text{NO}_x$  burners can also in-

---

246. *NO<sub>x</sub> Options Constrained by WEPCO Says Industrial Group*, CLEAN COAL/ SYNFUELS LETTER, Sept. 2, 1991, at 4 [hereinafter *NO<sub>x</sub> Options Constrained*]. In dropping the BACT presumption, EPA noted numerous objections to its inclusion in the "fix," since it was perceived that the presumption would foreclose consideration of other technologies. WEPCO Rule, *supra* note 232, at 32,331-332.

IGCI stated that "the BACT presumption for low  $\text{NO}_x$  burners 'overlooks the demonstrated track-record and cost-effectiveness of other technologies, such as selective catalytic reduction (SCR), and ignores legislative and policy imperatives to reduce  $\text{NO}_x$  emissions.'" *NO<sub>x</sub> Options Constrained*, *supra* at 4.

247. *Clean Air Act Hearing*, *supra* note 1, at 43-44. The low- $\text{NO}_x$  BACT presumption would prevent areas from ever achieving their respective ozone standards. WEPCO Rule Hearing, *supra* note 173, at 388. Ground level ozone (smog), is created when  $\text{NO}_x$  combines with hydrocarbons in the presence of sunlight. Sandra Postel, *Air Pollution, Acid Rain and the Future of Forests*, in GLOBAL ECOLOGY 123, 128 (Charles H. Southwick ed., 1985). The smog affected areas included the cities of New York, Philadelphia, Pittsburgh, Washington D.C., Cleveland, Detroit, Boston and Baltimore. George Lobsenz, *Critics Charge EPA Rules Undercut Anti-Smog Effort*, UPI, July 22, 1991, available in LEXIS, Nexis Library, UPI File. Not only would the low- $\text{NO}_x$  BACT presumption contribute to violations in ozone standards, the ROMNET study indicated that it would prevent parks like Acadia (Maine), Sequoyah (California), and the Shenandoahs from attaining Clean Air Act visibility standards. WEPCO Rule Hearing, *supra* note 173, at 286 (testimony of Rep. Ron Wyden).

248. WEPCO Rule Hearing, *supra* note 173, at 360 (letter from Northeast States for Coordinated Air Use Management, to Rep. Henry Waxman, Chairman, Subcommittee on Health and the Env't of the House Comm. on Energy and Commerce).

249. *Id.* at 390.

250. *NO<sub>x</sub> Options Constrained*, *supra* note 246, at 4.

SCR technology "uses a catalyst to facilitate a chemical reaction between  $\text{NO}_x$  and ammonia to produce harmless nitrogen and water." *Id.* Low- $\text{NO}_x$  burners reduce  $\text{NO}_x$ , an ozone precursor, by only 30 to 40%, whereas, selective catalytic reduction reduces  $\text{NO}_x$  emissions as much as 90%. WEPCO Rule Hearing, *supra* note 173, at 315, 347-50. Note, power plants in "extreme" ozone nonattainment areas are now mandated to either use "advanced control technology" such as SCR or to use "clean" fuel such as natural gas. CAA § 182(e)(3), 42 U.S.C. § 7511a(e)(3)(1988 & Supp. II 1990).

crease carbon monoxide and particulate emissions.<sup>251</sup> These facts were the basis of the criticism directed at the choice of low-NO<sub>x</sub> technology over SCR technology for the BACT presumption.<sup>252</sup> In response to the criticism, EPA stated that low-NO<sub>x</sub> was more cost-effective.<sup>253</sup> However, countries including Japan and Germany currently use SCR technology extensively.<sup>254</sup> Both countries already have reduced costs by at least fifty percent.<sup>255</sup>

This proven technology and the ROMNET study may have convinced the EPA to drop WEPCO's BACT presumption. However, DOE apparently dropped the presumption in order to minimize any legal challenges.<sup>256</sup> Now EPA's ability to require "stronger NO<sub>x</sub> controls when necessary" through its traditional case-by-case review will not be severely limited by the "low-NO<sub>x</sub>" BACT presumption.<sup>257</sup>

---

251. *WEPCO Rule Hearing*, *supra* note 173, at 379, 390.

252. *Id.*

253. *See* discussion *infra* part V.A.

254. *See* NO<sub>x</sub> Options Constrained, *supra* note 246, at 4; *WEPCO Rule Hearing*, *supra* note 173, at 390 (two hundred power plants around the world use SCR technology).

255. NO<sub>x</sub> Options Constrained, *supra* note 246, at 4.

256. *Final WEPCO Rule Ready*, *ELECTRIC UTIL. WK.*, Mar. 16, 1992, at 2.

Dropping the "low-NO<sub>x</sub>" BACT presumption was an important step in preventing the frustration of the acid rain provisions of the CAA, as well as an important step in preventing the frustration of area ozone standards. *See* 137 CONG. REC. S16,666 (daily ed. Nov. 14, 1991) (The "low-NO<sub>x</sub>" BACT presumption could have allowed NO<sub>x</sub> emissions to increase substantially. "We did not carefully negotiate NO<sub>x</sub> reductions for acid rain to have them undermined by another regulation.") (statement of Sen. Mitchell); *see also* Kay M. Crider, Note, *Interstate Air Pollution: Over a Decade of Ineffective Regulation*, 64 CHI.-KENT L. REV. 619, 622 (1988).

Until recently, sulfur dioxide emissions were thought to be the major contributor to acid rain. Studies showed SO<sub>2</sub> was at least seventy percent responsible. As a result of these studies, strategies for reducing SO<sub>2</sub> emissions are relatively well developed. However, increased attention is now being given to the contribution of NO<sub>x</sub> in the formation of acid rain. Current studies show that nitric acid has increased by about fifty percent relative to sulfuric acid in the determination of acid rain composition. Thus, concern is mounting over the need for better implementation of NO<sub>x</sub> emission controls.

*Id.*

257. *WEPCO Rule*, *supra* note 232, at 32,332; *Final WEPCO Rule Ready*, *supra* note 256.

## B. Provisions of the Final WEPCO—"Fix"

### 1. Applicability of NSR to Pollution Control Projects: The Pollution Control Exclusion

The WEPCO—"fix" provides a broad NSR exclusion for utility pollution control projects.<sup>258</sup> The pollution control exclusion is expected to create "harmony" between Titles I and IV of the Clean Air Act; the proposal "provides full flexibility to achieve [Title I] compliance without a bias towards or against any pollution control method."<sup>259</sup> However, this added flexibility is not a substitute for any Title I requirements. Title IV explicitly mandates: "*Except as expressly provided, compliance with [Title IV] shall not exempt or exclude the owner or operator of any source subject to [Title IV] from compliance with any other applicable requirements of [the CAA].*"<sup>260</sup> Such requirements include, among others, the NSPS, PSD-NSR and NNSR new source requirements of Title I.

The old NSPS regulations already provided that the term "modification" did not include "[t]he *addition or use* of any system or device whose primary function is the reduction of air pollutants, except when an emissions control system is removed or is replaced by a system which the Administrator determines to be less environmentally beneficial."<sup>261</sup> Since the term "modification" in the air quality-based NSR program

---

258. WEPCO Proposal, *supra* note 220, at 27,630. According to predictions from the President's Council on Competitiveness, the WEPCO—"fix" is expected to provide the economy with yearly savings of one to three billion dollars. *Rule Review, supra* note 226, at A-6. However, members in Congress, environmental groups, and an EPA official, rejected these estimates as largely a product of figure fudging. *Id.*

259. WEPCO Proposal, *supra* note 220, at 27,631. The WEPCO—"fix" is expected to harmonize the "command-and-control" provisions of Title I with the "market-based" objectives of Title IV. *Id.* The degree of success of the "market-based" program has been associated with the measures that EPA will take in implementing traditional, "command-and control" programs like NSR. *See generally* Fichthorn, *supra* note 173.

260. CAA § 413, 42 U.S.C. § 7651l (Supp. II 1990) (emphasis added).

261. 40 C.F.R. 60.14(e)(5) (emphasis added).

Note, in WEPCO the electric utility contended that its "like-kind" replacement project came within EPA's "routine" exception to the "modification" rule. WEPCO, 893 F.2d at 906. WEPCO's project was not for pollution control.

has the same meaning under the technology-based NSPS program, the EPA concluded that it could use its authority to duplicate the pollution control exclusion into the NSR regulations.<sup>262</sup> However, the NSR pollution exclusion differs in that the "not less environmentally-beneficial test" applies to the "addition" and "use," as well as the "replacement," of a pollution control device.<sup>263</sup>

To come within the NSR pollution control exclusion the project must be intended primarily to reduce pollution.<sup>264</sup> Thus, a change primarily undertaken to improve the utility's efficiency or to restore the utility's original capacity will not be considered part of a pollution control project.<sup>265</sup> Nevertheless, this may allow utilities to "bundle" or sneak in life-extension projects with the installation of pollution control equipment.<sup>266</sup> According to NRDC attorney David Hawkins, "[t]he result [of such bundling practices] could . . . tripl[e] [utility] capacity and rais[e] nitrogen oxides emissions, while [utilities] avoid[] new source review."<sup>267</sup> Although the acid

---

262. WEPCO Proposal, *supra* note 220, at 27,634-35.

The finalized pollution exclusion provides:

A physical change or change in the method of operation shall not include:

The addition, replacement or use of a pollution control project at an existing electric facility steam generating unit, unless the Administrator determines that such addition, replacement, or use renders the unit less environmentally beneficial, or except:

1) When the Administrator has reason to believe that the pollution control project would result in a significant net increase in representative actual annual emissions of any criteria pollutant over levels used for that source in the most recent air quality impact analysis in the area conducted for the purpose of Title I, if any, and

2) The Administrator determines that the increase will cause or contribute to a violation of any national ambient standard, PSD increment, or visibility limitation.

WEPCO Rule, *supra* note 232, at 32,336 (to be codified at 40 C.F.R. pts. 51.165(a)(1)(v)(C)(8), 52.21(b)(2)(iii)(h)) (emphasis added).

263. WEPCO Rule, *supra* note 232, at 32,336; compare *supra* note 262 and accompanying text.

264. WEPCO Rule, *supra* note 232, at 32,319.

265. *Id.*

266. *Utility Pollution Control Projects Exempt From New Source Review Under Air Act, EPA Says*, [23 Current Developments] Env't Rep. (BNA) 422 (May 29, 1992) (construing statements made by NRDC attorney David Hawkins).

267. *Id.*

rain control scheme caps SO<sub>2</sub> emissions, there is no cap on nitrogen oxides. Consequently, it is conceivable that the WEPCO-"fix" will cut into the effectiveness of the acid rain control scheme of Title IV instead of creating "harmony" between Title I and Title IV. Also, "[t]he development of emission[] control systems is not furthered [when] operators [can], without exposure to the standards [of Title I], increase production (and pollution) through the extensive replacement of deteriorated generating systems."<sup>268</sup>

Furthermore, to come within the NSR pollution control exclusion the project must also satisfy the "not less environmentally-beneficial" test.<sup>269</sup> This test, under certain situations, allows the permitting authority to evaluate a pollution

---

268. *WEPCO*, 893 F.2d at 909.

269. *WEPCO* Rule, *supra* note 232, at 32,320. This involves a case-by-case determination of the project's "net emissions and overall impact of the environment." *Id.* Even though, the final *WEPCO*-rule does not define what "environmentally beneficial" means, guidance on what the EPA may consider for its case-by-case analysis is provided in EPA correspondence concerning NSPS. Note, however, when considering the segment from this letter, that the "increase in emissions" prong for NSR (net emissions) is calculated differently than it is for NSPS (hourly emissions). In January of 1990, EPA anticipated that an EPA interpretative ruling would provide that pollution controls for NSPS purposes would be considered "not less environmentally-beneficial" if:

(1) The source will continue to meet all current requirements and standards applicable to existing sources under the Act. This includes meeting applicable NAAQS, PSD increments, permit conditions, and State implementation plan (SIP) limitations.

(2) There is no environmental harm resulting from the proposed activities. This includes conditions that the proposed activities would not cause the source to:

(a) increases the maximum hourly actual emissions rate of any pollutant regulated under the Act;

(b) increase the annual emissions of any pollutant regulated under the Act as a result of an increase in capacity utilization rate;

(c) adversely impact an air quality related value (e.g., visibility) in any Class I area; or

(d) allow an increase in emissions of toxic pollutants not regulated by the Act which would cause an adverse health or welfare impact.

136 Cong. REC. S3717, 3720-23 (daily ed. Apr. 3, 1990) (containing letter dated January 30, 1990, from David Kee, the Director of EPA's Air and Radiation Division, to the Assistant Commissioner of the Indiana Department of Environmental Management's Office of Air Management).

control project's impact on air quality through the use of additional modeling requirements.<sup>270</sup> Moreover, the project must satisfy the "safety valve": it must not "cause or contribute to a violation of the [NAAQS], [PSD] increment or visibility limitation."<sup>271</sup>

In cases where the permitting authority requires an air impact analysis, and the modeling indicates that the project violates the "safety valve," the pollution control exclusion will not apply and the project will trigger the PSD-NSR new source requirements.<sup>272</sup> Regardless, the WEPCO-"fix" does not require the source to notify the permitting authority of its plans to install pollution controls.<sup>273</sup> Accordingly, the WEPCO-"fix" requires vigilant air officials with the proper resources in order to police and protect air quality. Such a system would be even more complicated to control if the "fix" is expanded to cover all sources regulated by the CAA, including sources affected by the CAA's new toxics requirements. Conceivably, the "fix" in its present or possible expanded form will have devastating effects on air quality.

Unfortunately, efforts to control one pollutant can result in major increases in the emissions of another regulated pollutant.<sup>274</sup> A pollution control project to reduce SO<sub>2</sub> may more than double emissions of NO<sub>x</sub> and particulate matter.<sup>275</sup> Even though increases must not violate the "safety valve," net

---

270. WEPCO Rule, *supra* note 232, at 32,322. An air quality impact analysis may be required if the permitting authority:

- (1) . . . has reason to believe that a proposed change will result in a significant net increase in actual emissions of any criteria pollutant over levels used for that source in the most recent air quality impact analysis and
- (2) . . . such an increase would cause or contribute to a violation of a NAAQS, [PSD] increment or visibility limitation.

*Id.*

271. *Id.* at 32,321. The EPA stated: "[N]othing in today's [finalization of the WEPCO-"fix"] authorizes any emissions increase that would cause or contribute to a violation of the NAAQS, PSD increment or visibility limitation." *Id.*

272. *Id.* at 32,322.

273. *Id.*

274. See EPA's *WEPCO Rule Challenged, Supported in Comment Docket*, CLEAN-COAL/SYNFUELS LETTER, Aug. 26, 1991, at 5.

275. *Id.* Sorbent injection, an SO<sub>2</sub> control, can cause particulate emissions to double. *WEPCO Rule Hearing*, *supra* note 173, at 379.

emission increases may occur and the project may still be excluded from NSR. For instance,  $\text{NO}_x$  may be allowed to increase up to the PSD increment for that attainment area. EPA labels this type of net emission increase a "collateral increase."<sup>276</sup> The Administrator must determine if the emission increase in these situations makes the pollution control "less environmentally beneficial." How the Administrator makes this determination is of great interest and importance. Recognize also that even if the "collateral increase" does not make the pollution control "less environmentally beneficial," the "collateral increase" of a pollutant regulated under the PSD program is in effect a bite out of the PSD increment pie for that attainment area. Without notice these "collateral increases" will gobble up the PSD pie. Consequently, potential new sources that emit that pollutant will be cornered into those areas that still have servings of that particular PSD pie.

## 2. New Source Review - "Baseline"

A project excluded from the "physical or operational change" requirement will not trigger NSR.<sup>277</sup> All other projects, including those that satisfied the "physical or operational change" prong, must also satisfy the "increase in emissions" prong.<sup>278</sup> To equal a "major modification," thus triggering NSR, the change must create an "increase in emissions."<sup>279</sup> Plant renovation projects that are "changes" satisfying the "physical or operational changes" prong of the NSR "modification" rule, are nevertheless granted favorable changes for determining the "increase in emissions" prong.<sup>280</sup>

For instance, the WEPCO-"fix" liberalizes the "baseline" for NSR.<sup>281</sup> The previous regulations defined "actual emissions" as "the average rate, in tons per year, at which the unit actually emitted the pollutant during a 2-year period which

---

276. WEPCO Rule, *supra* note 232, at 32,321.

277. *See supra* part II.B.

278. *Id.*

279. *Id.*

280. *See infra* parts V.B.2.-5.

281. *See infra* notes 278-81 and accompanying text.



precedes the particular date and which is representative of normal source operation.”<sup>282</sup> The old regulations further mandated that the Administrator allow the use of a baseline period which was more representative of normal operations.<sup>283</sup> The WEPCO-“fix” makes a presumption that any two consecutive years within the five years prior to the proposed change are representative of normal operations.<sup>284</sup>

### 3. New Source Review - “Actual to Future Actual” or “Representative Actual Annual Emissions”

The WEPCO-“fix” employs an “actual to future actual” methodology in calculating emission increases for units which have “begun normal operations,” or a “representative actual annual emissions” methodology in calculating emission increases for new or replaced units.<sup>285</sup>

The “actual to future actual” methodology requires the utility to compare an existing unit’s pre-change baseline emissions with its “future actual annual emissions.”<sup>286</sup> For “like-kind” projects, the WEPCO holding rejected EPA’s “actual-to-future potential” methodology for calculating net emissions increases.<sup>287</sup> This superseded methodology compared the pre-change baseline emissions with “future-potential” emissions.<sup>288</sup>

---

282. 40 C.F.R. § 52.21(b)(21)(ii).

283. *Id.*

284. WEPCO Rule, *supra* note 232, at 32,323.

285. *Id.* The source may seek approval from the Administrator that an earlier baseline period “is more representative of normal operations.” *Id.*

286. *Id.*

287. *Supra* notes 137-42 and accompanying text.

288. 893 F.2d at 917.

WEPCO’s project proposed “like-kind” replacements of air heaters, boilers, and steam drums. The court defined “like-kind” replacement as one that “does not ‘change or alter’ the design or nature of the facility. Rather it merely allows the facility to operate again as it had before the specific equipment deteriorated.” In deciding whether a “like-kind” replacement had “begun normal operations,” the court considered whether a “realistic assessment of [the] impact [of the change] on ambient air quality levels is possible.” The court concluded that when the renovations were “like-kind” replacements, the EPA could not reasonably interpret its regulation to say that such a unit was so different that it has not “begun normal operations.” Thus, EPA could

For units which have "not begun normal operations," those units which are new or replaced, a "representative actual annual emissions" methodology is used.<sup>289</sup> This is a projected post-change emissions determination.<sup>290</sup> As the EPA summarized, several state air agencies' comments on the "fix" expressed that this "projected post-change emissions [determination] should become an enforceable permit condition in order to commit a source to limit its future emissions to a specific amount and to provide assurance that these projections are reasonable estimates of expected emissions."<sup>291</sup> Further, the EPA summarized that the commentaries stressed: "If a source will not accept such a permit condition, then the source should have to use potential post-change emissions."<sup>292</sup>

In response to this criticism, the EPA created the only significant addition to the finalized WEPCO-"fix"; EPA added a safeguard for the "representative actual annual emissions" methodology in calculating emission increases.<sup>293</sup> This safeguard does not require post-change emissions estimates to be made into enforceable permit conditions.<sup>294</sup> Instead, the "fix" requires that any utility using the "representative actual annual emissions" method in determining NSR applicability must submit annually, for five years following the change, "sufficient records to determine if the change results in an increase in representative actual annual emissions."<sup>295</sup> The source will be subjected to the NSR requirements at the time such records prove that the source's change created a *signifi-*

---

not apply its "actual-to-potential" test to the WEPCO project.

*Id.*; compare WEPCO Proposal, *supra* note 220, at 27,630, 27,636-37.

289. WEPCO Rule, *supra* note 232, at 32,323.

290. *Id.*

291. *Id.* at 32,324.

292. *Id.*

293. *Id.* at 32,325 n.21.

294. *Id.* at 32,325.

295. *Id.* For most cases, "[u]tilities may use continuous emissions monitoring [(CEM)] data, operational levels, fuel usage data, source test results or any other readily available data of sufficient accuracy for the purpose of documenting a unit's post-change actual annual emissions." *Id.* Also, the permitting agency may require a submittal period up to 10 years, when "no period within the first 5 years following the change is representative of source operations." *Id.*

cant net "increase in emissions" over the source's pre-change baseline levels.<sup>296</sup>

#### 4. New Source Review - The Causation Requirement

The WEPCO-"fix" provides an exclusion to increases in emissions unrelated to the physical change. "Under [the "fix,"] any emissions increase attributable to a physical or operational change, such as a physical or operational change that significantly alters the efficiency of the plant, must continue to be included in the post-change emissions calculation."<sup>297</sup> Therefore, increases not attributable to the "change," such as, system-wide demand growth, are excluded from the projection of future actual emissions.<sup>298</sup> However, the plant must also have been physically and legally able to accommodate the increase during its pre-change base-line period.<sup>299</sup>

#### 5. New Source Review - Applicability Determinations

The WEPCO-"fix" provides that sources are not required to obtain formal NSR applicability determinations.<sup>300</sup> Utilities may however request an NSR applicability determination from the EPA.<sup>301</sup>

#### 6. New Source Performance Standards - "Baseline"

"[A]ny physical or operational change to an existing facility which results in an increase in the emission rate to the atmosphere of a pollutant to which a standard applies" is a "modification" for the NSPS program.<sup>302</sup> A "modification" determination for NSPS differs from one for NSR in the way the emission increase is calculated. NSR focuses on net emission increases; this reflects NSR's air quality-based scheme.<sup>303</sup>

---

296. *Id.*

297. *Id.* at 32,326.

298. *Id.*

299. *Id.*

300. *Id.* at 32,332.

301. *Id.*

302. 40 C.F.R. § 60.14(a).

303. *See supra* note 64.

In comparison, NSPS measures an increase in hourly emissions, expressed in kilograms of pollutant discharged per hour; this reflects NSPS's "technology-based" scheme.<sup>304</sup>

To determine an increase in hourly emissions, a pre-change baseline must be established. The previous NSPS regulations used hourly emissions rate, just prior to the change, for its pre-change baseline.<sup>305</sup> Under the WEPCO-"fix," "the highest hourly emissions rate achievable at any time during the [five] years prior to the change" is used for the pre-change baseline.<sup>306</sup>

## VI. Conclusion

By 1991, the Bush Administration had suffered two critical defeats in Congress. The President's National Energy Bill and the proposed Clean Air Act Amendments, which both provided for a solution to the WEPCO problem, failed to win passage. As a result, the Bush Administration sought to further its National Energy Strategy through the regulatory process. In negotiations, the DOE and Vice President Quayle's Council on Competitiveness exerted substantial pressure upon the EPA to reach a WEPCO-"fix" consistent with the President's energy agenda.

The "fix" evolved through a closed process. Although the White House, the Council on Competitiveness, and the DOE exerted tremendous pressure on the EPA, none were required to submit the communications they had with the Edison Electronic Institute (EEI), or any other entity, into the rulemaking docket. EPA finally adopted a WEPCO-"fix" at the behest of the Administration and the utility industry. The "fix" involved inappropriate collusion between the EPA, the DOE, and the EEI. Consequently, the "fix" resulted in a pro-utility solution.

The closed process constituted a serious loss of valuable public information, and the collusive means by which the

---

304. See *supra* note 60, text accompanying note 32.

305. 40 C.F.R. § 60.14(b).

306. WEPCO Proposal, *supra* note 220, at 27,638; see 57 Fed. Reg. 32,339 (to be codified at 40 C.F.R. § 60.14(h)); WEPCO Rule, *supra* note 232, at 32,331.

"fix" evolved raised skepticism with the current White House review procedures. Accordingly, the Clinton-Gore Administration should support efforts to shed light on the entire machinery of the regulatory process.

The WEPCO-"fix" intended to create harmony between Title I and the acid rain control scheme of Title IV. The "harmony" created, however, may conceivably be at the expense of local air quality and the acid rain program. Title IV explicitly mandates: "*Except as expressly provided, compliance with [Title IV] shall not exempt or exclude the owner or operator of any source subject to [Title IV] from compliance with any other applicable requirements of [the CAA].*"<sup>307</sup> Such requirements include, among others, the NSPS, PSD-NSR and NNSR requirements of Title I. The plain language of the CAA evidences a clear congressional intent that compliance with Title IV is not an exemption from other CAA requirements. However, the pollution control exemption and other provisions contained in the WEPCO-"fix" have the potential to violate this unambiguous congressional mandate.

Moreover, Congress followed a balanced approach for both the technology-based NSPS program and the air quality-based NSR program; exempting existing plants from both programs. Pollution control measures would be undertaken by existing plants when they are cost effective, at the time of a *modification*. "The development of emission[] control systems is not furthered [when] operators [can], without exposure to the standards [of Title I], increase production (and pollution) through the extensive replacement of deteriorated generating systems."<sup>308</sup>

Nevertheless, the WEPCO-"fix" may allow utilities to "bundle" or sneak in life-extension projects with the installation of pollution control equipment. According to NRDC attorney David Hawkins, "[t]he result could . . . tripl[e] [utility] capacity and rais[e] nitrogen oxides emissions, while [utilities] avoid[] new source review."<sup>309</sup> Although the acid

---

307. CAA § 413, 42 U.S.C. § 7651i (Supp. II 1990) (emphasis added).

308. *WEPCO*, 893 F.2d at 909.

309. *Id.*

rain control scheme caps SO<sub>2</sub> emissions, there is no cap on nitrogen oxides. Consequently, it is conceivable that the WEPCO-"fix" will cut into the effectiveness of the acid rain control scheme of Title IV instead of creating "harmony" between Title I and Title IV.

Currently, the uncertainties for applying the "fix" to utilities are stacked. Thus, potentially applying the "fix" to sources that are regulated by the CAA's new toxics requirements will conceivably produce more devastating effects. Particularly, air control officials must possess the proper resources, and remain vigilant for opportunities to determine whether or not a pollution control device is "less environmentally beneficial." Opening the "fix" to all other categories is even more burdensome on the air control officials' enforcement abilities, since the number of sources to police will increase tremendously. If the WEPCO-"fix" withstands NRDC's legal attack, proposals for adopting a "fix" for other source categories should be postponed until the possible negative impacts of the WEPCO-"fix" are either resolved or dismissed.