## BEFORE THE ADMINISTRATOR UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

IN THE MATTER OF:	)
	)
ALLIANT ENERGY – WPL	)
EDGEWATER GENERATING	)
STATION	)
	)
Permit No. 460033090-P20	)
Issued by the Wisconsin	)
Department of Natural Resources	_)

ORDER RESPONDING TO PETITIONER'S REQUEST THAT THE ADMINISTRATOR OBJECT TO ISSUANCE OF STATE OPERATING PERMIT

Petition Number V-2009-02

## ORDER GRANTING IN PART AND DENYING IN PART PETITION FOR OBJECTION TO PERMIT

#### INTRODUCTION

On August 18, 2009, pursuant to its authority under the state of Wisconsin's implementing statute, Wis. Stat. Ann. 285.62-285.64, and regulations, Wis. Admin. Code NR 407, title V of the Clean Air Act (Act), 42 U.S.C. §§ 7661-7661f, and the U.S. Environmental Protection Agency's (EPA) implementing regulations at 40 C.F.R. Part 70, the Wisconsin Department of Natural Resources (WDNR) issued a proposed title V renewal operating permit to the Alliant Energy – Wisconsin Power and Light Edgewater Generating Station power plant (Edgewater). The Edgewater plant is an electric generation facility that consists of two boilers that burn coal and tire-derived fuel, one coal-fired boiler and other emission units.

On October 3, 2009, David C. Bender of McGillivray Westerberg & Bender LLC submitted to EPA on behalf of the Sierra Club (Petitioner) a petition requesting that EPA object to issuance of the Edgewater title V permit pursuant to section 505(b)(2) of the Act and 40 C.F.R. § 70.8(d). Petitioner alleges that (1) the permit omits maximum gross generation, heat input and fuel usage limits that were contained in preconstruction permit applications; (2) the permit lacks sufficient particulate matter (PM) monitoring and WDNR has not provided sufficient explanation for the permit's monitoring; and (3) certain plans referenced in the permit were relied upon by WDNR in issuing the permit and must be available for public notice and comment. WDNR issued a final permit to the source on October 23, 2009.<sup>1</sup>

EPA has reviewed Petitioner's allegations pursuant to the standard set forth in section 505(b)(2) of the Act, which requires the Administrator to issue an objection if the petitioner demonstrates to the Administrator that the permit is not in compliance with the applicable requirements of the Act. See also 40 C.F.R. § 70.8(d); New York Public Interest Research Group v. Whitman, 321 F.3d 316, 333 n.11 (2d Cir. 2003).

<sup>&</sup>lt;sup>1</sup> References to specific provisions of the permit contained herein are to the final permit.

Based on a review of the available information, including the petition, the permit record, and relevant statutory and regulatory authorities and guidance, I grant Petitioner's request in part and deny it in part, for the reasons set forth in this Order.

### STATUTORY AND REGULATORY FRAMEWORK

Section 502(d)(1) of the Act requires each state to develop and submit to EPA an operating permit program to meet the requirements of title V. EPA granted final full approval of the Wisconsin title V operating permit program effective November 30, 2001. 66 Fed. Reg. 62951 (December 4, 2001).

All major stationary sources of air pollution and certain other sources are required to apply for title V operating permits that include emission limitations and other conditions as necessary to assure compliance with applicable requirements of the Act, including the requirements of the applicable State Implementation Plan (SIP). *See* sections 502(a) and 504(a) of the Act, 42 U.S.C. §§ 7661a(a) and 7661c(a). The title V operating permit program generally does not impose new substantive air quality control requirements (referred to as "applicable requirements"), but does require that permits contain monitoring, recordkeeping, reporting, and other requirements to assure compliance with applicable requirements. 57 Fed. Reg. 32250, 32251 (July 21, 1992) (EPA final action promulgating Part 70). One purpose of the title V program is to "enable the source, States, EPA, and the public to understand better the requirements." *Id.* Thus, the title V operating permit program is a vehicle for ensuring that air quality control requirements are appropriately applied to facility emission units and for assuring compliance with such requirements.

Under section 505(a) of the Act, 42 U.S.C. § 7661d(a), and the relevant implementing regulations at 40 C.F.R. § 70.8(a), states are required to submit each proposed title V operating permit to EPA for review. Upon receipt of a proposed permit, EPA has 45 days to object to final issuance of the permit if EPA determines the permit is not in compliance with applicable requirements or the requirements of part 70. 40 C.F.R. § 70.8(c). If EPA does not object to a permit on its own initiative, section 505(b)(2) of the Act provides that any person may petition the Administrator, within 60 days of expiration of EPA's 45-day review period, to object to the permit. 42 U.S.C. § 7661d(b)(2); see also 40 C.F.R. § 70.8(d). The petition must "be based only on objections to the permit that were raised with reasonable specificity during the public comment period provided by the permitting agency (unless the petitioner demonstrates in the petition to the Administrator that it was impracticable to raise such objections within such period or unless the grounds for such objection arose after such period)." 42 U.S.C. § 7661d(b)(2). In response to such a petition, the Administrator must issue an objection if a petitioner demonstrates that a permit is not in compliance with the requirements of the Act. Id.; see also 40 C.F.R. § 70.8(c)(1); New York Public Interest Research Group, Inc. v. Whitman, 321 F.3d at 333 n.11. Under section 505(b)(2) of the Act, the burden is on the petitioner to make the required demonstration to EPA. Sierra Club v. Johnson, 541 F.3d 1257, 1266-1267 (11th Cir. 2008); Citizens Against Ruining the Environment v. EPA, 535 F.3d 670, 677-678 (7th Cir. 2008); Sierra Club v. EPA, 557 F.3d 401, 406 (6th Cir. 2009); McClarence v. EPA, 596 F.3d 1123, 130-31 (9th Cir. 2010) (discussing the burden of proof in title V petitions). If, in responding to a petition,

EPA objects to a permit that has already been issued, EPA or the permitting authority will modify, terminate, or revoke and reissue the permit consistent with the procedures set forth in 40 C.F.R. §§ 70.7(g)(4), (5)(i) - (ii) and 70.8(d).

## BACKGROUND

Alliant Energy submitted to WDNR on July 22, 2008, an application to renew the title V permit for the Edgewater plant. WDNR published the public notice of the draft title V renewal permit on May 21, 2009, and issued the proposed title V renewal permit on August 18, 2009. During the public comment period, WDNR received comments on the draft permit, including comments from Petitioner. EPA did not object to the permit. WDNR issued the final permit on October 23, 2009.

Under the statutory timeframe in section 505(b)(2) of the Act, December 1, 2009, was the deadline to file the petition request that EPA object to the issuance of the final Edgewater permit. Petitioner submitted its petition to object to the issuance of the Edgewater permit to EPA on October 3, 2009. Accordingly, EPA finds that Petitioner timely filed its petition.

## **ISSUES RAISED BY THE PETITIONER**

## I. Heat Input, Fuel Usage, and Maximum Gross Generation Limits

Petitioner alleges that heat input, fuel usage, maximum gross generation rates, and hourly emission rates are "applicable requirements" that were required to be included in the Edgewater title V permit issued by WDNR. Petitioner cites a Prevention of Significant Deterioration (PSD) construction permit issued by EPA to the Edgewater facility in 1977 (later revised in 1984) and a WDNR construction permit issued in 1979. The 1977 PSD permit (EPA-5-77-A-3) approved the construction of a 400 megawatt (MW) coal-fired boiler identified as Unit 5. Petitioner cites language in Paragraph 8 of the PSD permit which states:

Approval to construct a 400 MW electrical generating unit is hereby granted to the Wisconsin Power and Light Company subject to the conditions expressed herein and consistent with the materials and data included in the application filed by the Company. Any departure from the conditions of this approval or the terms expressed in WP&L's application must receive the prior written authorization of U.S. EPA.

### Petition at 2-3.

Petitioner also cites the PSD permit application submitted by the facility in 1976. The PSD permit application contains data and information about the facility, including the units proposed for construction and other existing units, the respective size of the units, the amount of power output, and the estimated fuel usage. Further, Petitioner points to an air quality impact modeling analysis, which was submitted by the facility along with the PSD permit application, that contains certain parameters used as the basis for the air quality analysis. The air quality analysis identifies the maximum gross generation rates, heat inputs, stack parameters, gas exit

temperature, and certain pollutant emission rates from the emission units at the proposed Edgewater plant. Petition at 4-8.

Petitioner argues that the permittee is required to construct and operate the plant consistent with and according to the plans and specifications submitted with the Edgewater PSD permit application and air quality modeling analysis. Petitioner maintains that a unit that is operated above the size, production rate, and/or emission rate assumed during the permitting review will have no enforceable measure to ensure that air quality is protected and that the pollution control determinations were correct. Petition at 7-9.

Petitioner further argues that the public and affected states had no opportunity to review and comment on a plant with different capacity, production rate, and emission rates from what was identified in PSD permit application materials. Petitioner maintains that, therefore, the heat input, maximum output capacity, coal usage, and maximum hourly emission rates<sup>2</sup> represented by Wisconsin Power and Light in its application and relied upon by EPA in issuing the PSD permit became applicable requirements for the plant. Petition at 11. Petitioner argues that the applicable requirements in the table below must be included in the Edgewater title V permit. Petition at 13.

Unit	Maximum Hourly Gross Generation	Maximum Hourly Coal Usage	Average Hourly Coal Usage	Maximum Hourly Heat Input	Total PM	NOx	SO2
Unit 3	73.1 MW	40.2 tons/hr	21.1 tons/hr	815.1 MMBtu/hr	0.00121 tons/hr	1.04076 tons/hr	2.73252 tons/hr
Unit 4	324.1 MW	145.4 tons/hr	101.5 tons/hr	2952.9 MMBtu/hr	0.02933 tons/hr	3.76845 tons/hr	9.89402 tons/hr
Unit 5	400 MW	261.8 tons/hr	109.1 tons/hr	4200.0 MMBtu/hr	0.07122 tons/hr	1.47000 tons/hr	2.38803 tons/hr

Petitioner states that it raised this issue in its comments to the draft title V permit and that WDNR agreed with Petitioner but failed to amend the proposed permit accordingly. Petition at 12. WDNR responded as follows:

The conditions identified by the commenter are part of a construction permit. Conditions in a construction permit do not expire (i.e. these conditions are permanent conditions; see s. 285.66(1), WI Stats.) and continue to be enforceable unless revised or eliminated through a construction permitting review process. Since these conditions have not been eliminated or revised through a construction permit review process, they remain in effect and enforceable today.

<sup>&</sup>lt;sup>2</sup> Petitioner failed to raise the specific issue that hourly emission rates must be included in the permit during the public comment period on the draft permit. Nor was this issue raised by any other commenter. Petitioner does not now argue that it was impracticable to raise such claim during the public comment period or that the grounds for the claim arose after the close of the comment period. Thus, Petitioner failed to meet threshold requirements described in section 505(b)(2) of the Act for raising this issue for the first time in a petition to the Administrator.

WDNR Response to Comments # A.3.

Petitioner asserts that despite agreeing with its comments, WDNR failed to revise the draft permit to include these applicable requirements. Thus, Petitioner asserts that the title V permit is deficient. Petition at 13.

#### EPA Response

Petitioner raised this issue in its public comments on the draft permit. In its response, WDNR agreed that the conditions identified by Petitioner are conditions in a construction permit that do not expire and "remain in effect and enforceable today." WDNR failed, however, to revise the permit in any way to reflect Petitioner's comment and did not explain why it did not do so. I therefore grant the petition on this issue.

The 1977 PSD permit imposes enforceable lb/MMBtu emission limitations and states that approval to construct "is hereby granted to the Wisconsin Power and Light Company subject to the conditions expressed herein and consistent with the materials and data included in the application filed by the Company." PSD Permit EPA-5-77-A-3 § 8. The permit states further that "[t]he air quality analysis relies heavily on the combination of stack parameters, control devices, and emission limitations and any change in those factors could change the results of the air quality analysis. Therefore, design changes in Unit 5 must receive the prior written authorization of U.S. EPA." *Id.* § 7(c).<sup>3</sup> The permit was issued based on the information presented by the applicant at the time of permit issuance. The heat input rate along with other factors appear to have been relied upon when performing the air quality analysis and assessing the project's impacts to air quality. Therefore, it appears that the integrity of the permit's lb/MMBtu emission limitations may depend upon the heat input and other factors used to assess air quality at the time of permit issuance.

Based upon its response to comments, WDNR apparently agrees that the conditions cited by Petitioner are part of a construction permit and that "conditions in a construction permit do not expire and continue to be enforceable unless revised or eliminated through a construction permitting review process." However, WDNR's reference to permit "conditions" is ambiguous as to whether it includes information such as heat input and coal usage rates contained in the permit application rather than the permit. In any event, WDNR failed to make any corresponding changes to the title V permit or to explain why it did not do so.

Furthermore, the record is unclear as to the heat input status of the three boilers. For example, in 1976 the applicant presented information regarding the Units 3, 4, and 5 boilers as 816, 2953 and 4200 MMBtu/hr boilers, respectively. While EPA issued a PSD permit in 1977 and an amended permit in 1984, and WDNR issued a construction permit in 1979, EPA is not aware of any permits that addressed any change to the heat input values originally presented in the 1976 application. However, the current title V permits describe Units 3, 4, and 5 boilers as 844, 3529, and 4366 MMBtu/hr boilers, respectively.

<sup>&</sup>lt;sup>3</sup> The 1984 PSD permit contains the same wording in §§ 7(c) and 8, except for a comma after "herein" in § 8.

WDNR must provide an adequate response to Petitioner's comments. Specifically, I direct WDNR to address the following:

- Explain why the heat input rates in the permit descriptions of Units 3, 4, and 5 are greater than those in the PSD permit application materials;
- Explain whether the heat input rates, maximum gross generation, and fuel usage limits identified by Petitioner from the construction permit application materials are applicable requirements that must be included or otherwise referenced in the title V permit or are necessary to assure compliance with applicable requirements or, if not, why not;
- Explain whether the construction permits issued for Edgewater relied on the heat input rates, maximum gross generation, and fuel usage limits identified by Petitioner and, if so, whether they must be included or otherwise referenced in the title V permit to assure compliance with those permits;
- If WDNR believes that the heat input rates and other parameters need not be included in the title V permit, explain how the lb/MMBtu limits in the title V permit in the absence of these parameters are sufficient to assure compliance with all conditions of the PSD permit (including Sections §§7(c) and 8).

EPA has given WDNR full regulatory responsibility for EPA-issued PSD permits in non-Indian country areas (72 Fed. Reg. 18391, April 12, 2007), thus, WDNR has the authority to revise the EPA-issued PSD permit as necessary.

## II. Sufficiency of PM Monitoring

Petitioner alleges that the Edgewater title V permit lacks sufficient PM monitoring for the boilers and other emissions sources and that WDNR has not provided sufficient explanation for the permit's monitoring requirements. We describe below in more detail these allegations and our responses.

A. Monitoring of PM Emissions from the Boilers

The Edgewater permit sets out the compliance demonstration methods for the PM limits on the three boilers: (1) a stack test to be conducted every 24 months; (2) operation of an electrostatic precipitator (ESP) control device; (3) monitoring of ESP parameters once every eight hours; (4) preparation of and compliance with a plan for periodic inspections of the ESPs; (5) preparation of and compliance with a plan for periodic internal inspections of the boilers and boiler efficiency optimization; and (6) [for units 3 and 4, but not unit 5] operation of the flue gas conditioning systems. Permit §§ I.A.1.b, I.I.1.b. Petitioner maintains that these requirements are insufficient for several reasons.

First, Petitioner argues that WDNR does not explain how monitoring the ESP parameters every eight hours is sufficient to assure the ESP is achieving the minimum control efficiency required to achieve the PM emission limit. Thus, Petitioner argues that this permit has the same deficiency that EPA recently found in another title V permit. Petition at 16-17, quoting *In re WE Energies Oak Creek Power Plant* (June 12, 2009), at 15-16.

Second, Petitioner argues that WDNR failed to explain how monitoring once every eight hours ensures continuous compliance with a PM limit expressed as instantaneous (i.e., no averaging time). Petition at 16.

Third, Petitioner argues that when a parametric monitoring scheme is used, there must be a determination by WDNR that the specific parameter ranges ensure compliance. Where compliance depends on continuous effectiveness of the ESP device, and parameters are reliable indicators of when the ESP is working correctly and achieving adequate emission reductions, the permit must identify the parameter operating ranges in which WDNR is sure that the plant is complying with the applicable limits. Petitioner argues that EPA has rejected the notion that merely watching and recording control device parameters ensures compliance with an emission limit. Petition at 17-18, citing *In re Tampa Electric Co., F.J. Gannon Station* (Sept. 8, 2000) and *In re Huntley Generating Station* (July 31, 2003).

Petitioner raised this issue in its comments on the draft Edgewater title V permit, and WDNR responded as follows:

The Department has placed the standard monitoring for particulate matter sources controlled by an ESP in the permit. The Department has been using these monitoring methods in both operation and construction permits since the mid-1990's. Recently USEPA has objected to another Title V permit (i.e., WE Energies Oak Creek facility) with similar monitoring requirements. The Department is presently evaluating USEPA's objection to that permit and is planning to address this issue over the next few months with USEPA and stakeholders. Since this issue is much larger than a single permit, the Department will retain the same monitoring requirements in the final proposed permit as were in the draft permit. Depending on the results of the Department's review of these requirements, changes may be made in the future to these permit conditions.

WDNR Response to Comments # A.6.

Petitioner maintains this response is inadequate and WDNR must establish monitoring in the permit now, not at some later date, and provide a sufficient explanation for that monitoring in the Statement of Basis. Petition at 24-25.

## EPA's Response

EPA's Part 70 monitoring rules (40 C.F.R. §§ 70.6(a)(3)(i)(A) and (B) and 70.6(c)(1)) are designed to satisfy the statutory requirement in section 504(c) of the Act that "[e]ach permit issued under [title V] shall set forth . . . monitoring . . . requirements to assure compliance with the permit terms and conditions." 42 U.S.C. § 7661c(c). As a general matter, authorities must take three steps to satisfy the monitoring requirements in part 70 regulations. First, under 40 C.F.R. § 70.6(a)(3)(i)(A), permitting authorities must ensure that monitoring requirements contained in applicable requirements are properly incorporated into the title V permit. Second, if

the applicable requirement contains no periodic monitoring, permitting authorities must add "periodic monitoring sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the permit." 40 C.F.R. § 70.6(a)(3)(i)(B). Third, if there is some periodic monitoring in the applicable requirement, but that monitoring is not sufficient to assure compliance with permit terms and conditions, permitting authorities must supplement monitoring to assure such compliance. 40 C.F.R. § 70.6(c)(1). In all cases, the rationale for the selected monitoring requirements must be clear and documented in the permit record. 40 C.F.R. § 70.7(a)(5).

Further, WDNR has an obligation to respond adequately to significant comments on the draft title V permit. Section 502(b)(6) of the Act, 42 U.S.C. §7661a(b)(6), requires that all title V permit programs include adequate procedures for public notice regarding the issuance of title V operating permits, "including offering an opportunity for public comment." *See also* 40 C.F.R. § 70.7(h). It is a general principle of administrative law that an inherent component of any meaningful notice and opportunity for comment is a response by the regulatory authority to significant comments. *Home Box Office v. FCC*, 567 F.2d 9, 35 (D.C. Cir. 1977) ("the opportunity to comment is meaningless unless the agency responds to significant points raised by the public.") *See, e.g., In re Louisiana Pacific Corporation,* at 4-5 (Nov. 5, 2007).

The Edgewater title V permit includes testing every 24 months and parametric monitoring once every 8 hours of the ESP to demonstrate and monitor compliance with the PM limits for the boilers. *See* Permit §§ I.A.1.b., I.I.1.b. However, it is not clear from the permit or permit record how this monitoring scheme will assure compliance with the PM limits. For example, it is not clear whether WDNR is relying on the ESPs achieving a certain control efficiency to assure compliance with the PM limits. If that is the case, WDNR must establish the correlation between the operating parameters being measured and the ESP performance, and must identify the parameter indicator ranges in the title V permit if they are to be used to demonstrate compliance. It is not clear from the permit and the permit record whether the required correlation and the necessary indicator ranges have been established.

During the public comment period for the draft title V Edgewater permit, Petitioner commented on this issue. As discussed above, WDNR has an obligation to respond to significant comments on the draft title V permit. Petitioner's comment was a significant comment because it raised an issue of whether the permit meets the title V monitoring requirements at 40 C.F.R. § 70.6(a)(3)(i)(B) and (c)(1). In response to the comment, WDNR stated it is currently evaluating its monitoring requirements in light of EPA's objection in *WE Energies Oak Creek* and changes "may be made in the future to these permit conditions." WDNR Response to Comments # A.6. WDNR's response acknowledged Petitioner's comment but deferred until after permit issuance any substantive response. EPA therefore concludes that WDNR failed to respond to this significant comment and that such failure may have resulted in one or more deficiencies in the permit. I therefore grant the petition on this issue. WDNR must explain how the Edgewater title V permit provides adequate monitoring or modify the permit accordingly to ensure that it contains monitoring sufficient to assure compliance with the PM limits for the boilers.

#### B. Monitoring of PM Emissions from Other Emission Sources

Petitioner argues that other emission sources at Edgewater also have deficient PM and visible emissions (VE) monitoring, specifically the coal unit rail car dumping system, the flyash handling system, and the coal pile storage and conveying system.<sup>4</sup>

To ensure compliance with the PM limits for the coal unit rail car dumping system, the Edgewater title V permit requires that the baghouse and dry fogger system that are part of this process "shall be operated and maintained in conformance with good engineering practices to minimize the possibility for the exceedance of any emission limitations." Permit § I.J.1.b. In addition, the pressure across the liquid inlet to the fogger system is to be monitored to ensure the nozzles are not plugged. Permit § I.J.1.b. The permittee is required to visually inspect the baghouse and record the status of its operations and record the pressure across the inlet to the dry fogger system once per day, per train. Permit § I.J.1.c. Petitioner maintains that it is unclear "whether [WDNR] concludes that the mere use of these controls always (under any conditions) results in compliance, or, more likely, whether these controls must achieve a minimum control efficiency is required, Petitioner argues that WDNR must require the source to implement "all necessary steps" to meet the minimum control and to also monitor those steps. Specific parameters must be established in the permit, according to Petitioner, and these parameters must be enforceable and monitored. Petition at 19-20.

With regard to the flyash handling system, the compliance demonstration method in the permit consists of a requirement that the baghouses "be operated and maintained in conformance with good engineering practices to minimize the possibility for the exceedance of any emission limitations." Permit § I.K.1.b.(1). The permittee is required to visually inspect the operation of the baghouses once every 24 hours and record the status of their operation. Permit § I.K.1.c.(1).

For the coal pile storage and conveying system, the PM limitation in the permit is to take "precautions" as set forth in the Wisconsin SIP to prevent PM from becoming airborne. Permit § I.M.1.a.(1). The compliance demonstration method in the permit is to "keep the records required by condition M.1.c.(1)." Permit condition I.M.1.c.(1) requires the permittee to "maintain records which demonstrate compliance with condition I.M.1.a.(1)."

Petitioner argues that the "same deficient monitoring" exists for these two material handling processes. Petitioner states that the permit requires the facility to keep and maintain records "which demonstrate compliance with condition I.M.1.a.(1)," but "there is no indication what records are sufficient to show compliance and, more importantly, how the mere keeping of records ensures compliance with the PM limits...." Petition at 20.

Petitioner raised these issues with respect to these three emissions sources during the public comment period and WDNR responded as described above in our discussion of Issue II.A.

<sup>&</sup>lt;sup>4</sup> The same compliance demonstration and monitoring requirements apply to both PM and VE limits for the three emissions sources.

## EPA's Response

As discussed above, the title V permit must contain sufficient monitoring to assure compliance with the terms and conditions of the permit. 40 C.F.R. § 70.6(c)(1); see also 40 C.F.R. § 70.6(a)(3)(i). The rationale for the selected monitoring requirements must be clear and documented in the permit record. 40 C.F.R. § 70.7(a)(5).

With respect to the coal unit railcar dumping system, the permit imposes operation and maintenance requirements for the baghouse and fogger system, and monitoring of differential pressure across the liquid inlet to the fogger system. Permit § I.J.1.b.c. WDNR does not describe, however, how this monitoring will ensure compliance with the PM and opacity limits for the coal unit railcar dumping system. Moreover, WDNR has an obligation to respond to significant comments on the draft title V permit. Petitioner's comment was a significant comment because it raised an issue of whether the permit meets the title V monitoring requirements at 40 C.F.R. § 70.6(a)(3)(i)(B) and (c)(1). The response by WDNR in the permit record to Petitioner's comments on PM emissions monitoring state that WDNR has placed the standard monitoring "for particulate matter sources controlled by an ESP in the permit" and is "presently evaluating EPA's objection in WE Energies Oak Creek" and that changes "may be made in the future to these permit conditions." WDNR Response to Comments # A.6. The coal unit railcar dumping system, however, is not a source controlled by an ESP. In addition, as with Petitioner's comments on monitoring of PM emissions from the boilers discussed above, WDNR's response acknowledged Petitioner's comment but deferred until after permit issuance any substantive response. EPA therefore concludes that WDNR failed to respond to this significant comment and that such failure may have resulted in one or more deficiencies in the permit. I therefore grant the petition on this issue. WDNR must explain how the Edgewater title V permit provides adequate monitoring or modify the permit accordingly to ensure that it contains monitoring sufficient to assure compliance with the PM and VE limits for the coal unit railcar dumping system.

With respect to the flyash handling system and coal pile storage and conveying system, Petitioner's statement that the "same deficient monitoring also exists" provides minimal explanation, but EPA is able to discern the inadequacy of the permit record based on the similarity between the claim regarding PM and VE monitoring for the flyash handling and coal pile storage and conveying systems and the claims discussed above for the boilers and the coal unit railcar dumping system. *See* Petition at 15-20. For the same reasons that EPA found WDNR failed to respond to Petitioner's comments on PM monitoring for the boilers and coal unit railcar dumping system, I conclude that WDNR failed to respond to Petitioner's significant comments on the PM and VE monitoring issues with respect to the flyash handling system and coal pile storage and conveying system and that such failure may have resulted in deficiencies in the permit. I therefore grant the petition on these issues. WDNR must explain how the Edgewater title V permit provides adequate monitoring for these two sources or modify the permit accordingly to ensure that it contains monitoring sufficient to assure compliance with the PM and VE limits for the flyash handling and coal pile storage and conveying systems.

#### C. Requiring Use of PM CEMS

In conjunction with its arguments that PM monitoring in the Edgewater permit is deficient, Petitioner maintains that EPA should order WDNR to require the use of continuous emission monitoring systems (CEMS) to monitor PM emissions. Petitioner states that PM CEMS provide a better indication of PM emissions than the measures currently required in the Edgewater permit and that CEMS "are the preferred method for determining compliance with PM limits" citing to 40 C.F.R. § 60.42. Petition at 21 n.7. Petitioner cites Plaintiffs' Proposed Findings of Fact (Remedy Phase) in *United States v. Cinergy Corp.*, No. 1:99-cv-01693-LJM-JMS (S.D. Ind.), as additional support for its argument. Petitioner raised this issue during the public comment period and WDNR responded as noted above in our discussion of Issue II.A.

## EPA Response

The title V permit must contain sufficient monitoring to assure compliance with the terms and conditions of the permit. 40 C.F.R. § 70.6(c)(1); see also 40 C.F.R. § 70.6(a)(3)(i). While CEMS may be a preferred type of monitoring in some instances, it is not always required. As section 504(b) of the Act provides, "continuous emissions monitoring need not be required if alternative methods are available that provide sufficiently reliable and timely information for determining compliance." 42 U.S.C. § 7661c(b).

WDNR did not directly address Petitioner's comment that PM CEMS should be required to measure compliance with the PM limits of the permit. WDNR has been ordered, however, to explain how the Edgewater permit provides adequate monitoring or modify the permit accordingly to ensure that it contains monitoring sufficient to assure compliance with the PM limits for the boilers. *See* II.A. above. Petitioner has not identified an applicable requirement that compels the use of PM CEMS. Nor has Petitioner demonstrated that PM CEMS is the only monitoring that can assure compliance with the PM limit. I therefore deny the claim in the petition seeking an order to WDNR to require the use of PM CEMS.<sup>5</sup>

# III: Whether Plans Referenced in the Permit Must Be Incorporated in the Permit and Made Available for Public Comment

Petitioner alleges that in the Edgewater title V permit WDNR made the same error regarding references to plans not contained in the permit that it committed in *WE Energies Oak Creek*. Petitioner cites four "plans" that it states WDNR references in the permit and "appears to rely on" to conclude that the Edgewater plant will comply with applicable requirements. These plans are:

- Startup and Shutdown Plan (SSP)
- Quality Control and Quality Assurance Plan (QCQAP)

<sup>&</sup>lt;sup>5</sup> Petitioner raises one additional issue regarding PM monitoring. The petition states that WDNR has "inexplicably exempted the plant from operating the ESP devices during periods of startup and shutdown, despite the fact that the underlying, instantaneous, SIP limits on PM emissions apply at all times, including startup and shutdown." Petition at 22. Petitioner cites provisions of the proposed permit that exempted startup and shutdown periods from the requirement to operate the ESPs. See proposed permit §§ 1.A.1.b(2), I.I.1.b(2). The final permit issued after the petition was submitted no longer contains those exemptions. See final permit §§ 1.A.1.b.(2), I.I.1.b.(2) Thus, this issue is moot.

- Plan for periodic inspections of the ESP (ESP inspection plan)
- Fugitive Dust Control Plan (FDCP)

Citing EPA's regulations at 40 C.F.R. 70.5(a)(2), (c), and 70.6(a)(1), Petitioner states that these plans were required to be, but were not, contained in the facility's title V permit application and permit. Further citing 40 C.F.R. 70.7(h)(2), Petitioner argues, these plans were never provided to the public for comment. Petition at 25.

Petitioner raised this issue in its comments on the proposed permit. WDNR responded:

The Department has not, historically, placed CAM plans or other similar plans in permits. However, the Department is presently evaluating USEPA's objections to that permit (WE Energy Oak Creek Title V) and is planning to address this issue over the next few months with USEPA and stakeholders.

Since this issue is much larger than a single permit, the Department will not be including the CAM Plan in the permit. Depending on the results of the Department's review of these requirements, changes may be made in the future to these permit conditions. Additionally, the Plan is available for review by the public or the commenter upon request by the Department.

WDNR Response to Comments # A.7. Petitioner argues that WDNR has refused to address the issue and cannot rely on complying with the law "in the future." Petition at 26.

#### EPA Response

EPA regulations implementing the title V program address what information must be contained in a permit application, what information must be contained in a permit, and what information must be made available to the public for notice and comment. With regard to a permit application, the regulations provide, "[a]n application may not omit information needed to determine the applicability of, or to impose, any applicable requirement. . . ." 40 C.F.R. § 70.5(c); *see also* 40 C.F.R. § 70.5(a)(2). The regulations require each title V permit to include "[e]mission limits and standards, including those operational requirements and limitations that assure compliance with all applicable requirements at the time of permit issuance" and "compliance certification, testing, monitoring, reporting and recordkeeping requirements sufficient to assure compliance with the terms and conditions of the permit." 40 C.F.R. § 70.6(a)(1) and (c)(1). And finally, the regulations require that public notice shall include information to enable the public to obtain copies of "the permit draft, the application, all relevant supporting materials. . . and all other materials available to the permitting authority that are relevant to the permit decision." 40 C.F.R. § 70.7(h)(2).

On the basis of these regulations, and the specific facts relevant to each of the plans required in the Edgewater permit as discussed below, I conclude that the SSP, QCQAP and ESP inspection plans must be included in the permit application as well as in the permit for the Edgewater plant. As part of the permit and the permit application, these plans must be made available for review during the title V public comment process. With respect to the FDCP, I am granting the petition, but on different grounds as explained below. Finally, EPA agrees that WDNR's response, which was essentially that it would review the issue and, depending on the results of its review, possibly change these permit conditions in the future, failed to provide a substantive response to Petitioner's comments. Thus, I grant the petition on this issue with respect to all four plans because the response to comments was inadequate.

**SSP:** The Edgewater permit provides that the permittee shall prepare a SSP for each of the boilers that "shall define normal start-up and shut-down procedures, including the normal duration of start-up and shut-down periods." Permit §§ I.A.2.b(4), I.I.2.b.(4). The permit appears to provide that specific permit limits for visible emissions do not apply when the combustion equipment is being started. Permit §§ I.A.2.a.(1), I.I.2.a.(1). In addition, the permit's limit for carbon monoxide is calculated over a 12-month average excluding startup and shutdown periods. Permit § I.I.8.a.(1).<sup>6</sup> Thus, the information in the SSP is necessary to determine the applicability of, or exemption from, specific permit limits. Because the SSP contains information needed to determine and impose these limits, it must be included in the permit application and the permit application and permit, the plan must be available for review during the title V public comment process. 40 C.F.R. § 70.7(h)(2). For these reasons, I grant the petition on this issue as it pertains to the SSP.

**QCQAP:** The Edgewater permit requires the maintenance and operation of a continuous opacity monitoring system to demonstrate compliance with the VE limits in the permit applicable to the boilers. Permit §§ I.A.2.b.(1), I.I.2.b.(1). The facility is further required by the permit to "follow a quality control and quality assurance plan, as approved by [WDNR]." Permit §§ I.A.2.b.(3), I.I.2.b.(3). The permit cites the Wisconsin SIP NR 439.09(8) and NR 439.095(6) as authority for these requirements. NR 439.09(8) requires that "[t]he owner or operator of a continuous emissions monitoring system shall comply with the quality control and quality assurance plan submitted by the owner or operator of the source and approved by the department." NR 439.095(6) requires, in part, that "[t]he owner or operator of the source shall submit a quality control and quality assurance plan for approval by the department. The monitor shall follow the plan, as approved by the department."

The content of the QCQAP is information necessary to impose these applicable requirements of the Wisconsin SIP, i.e., the facility must submit and comply with an approved QCQAP. Therefore, the QCQAP must be in the Edgewater title V permit application pursuant to 40 C.F.R. 70.5(c). Furthermore, because the Wisconsin SIP requires compliance with a WDNR-approved QCQAP, the QCQAP must be included in the permit pursuant to 40 C.F.R. 70.6(a)(1). Moreover, because the WDNR-approved QCQAP must be included in the permit application as well as the permit, it must be available for review during the title V public comment process. 40 CFR § 70.7(h)(2). For these reasons, I grant the petition on this issue as it pertains to the QCQAP.

**ESP inspection plan:** The Edgewater permit requires the facility to "prepare and follow a plan for periodic internal inspections of each [ESP] to ensure that the control equipment is

<sup>&</sup>lt;sup>6</sup> The permit also contains an hourly CO limit that applies at all times (including periods of startup and shutdown) and a requirement to operate a continuous emission monitor for CO. Permit § I.I.8.a.(2-3).

operating properly. The plan shall include the frequency of these inspections and the items to be inspected." Permit § I.A.1.b.(4); *see also* Permit § I.I.1.b.(4). The ESP inspection plan requirement is listed in the Edgewater permit as a "Compliance Demonstration Method" for the permit's PM limits applicable to the boilers. The permit cites Wisconsin regulation NR 407.09(4)(a)3.b. as authority for this requirement. NR 407.09(4)(a)3.b. states that operating permits shall include requirements for certifying compliance with terms and conditions contained in the permit, including "[m]eans for assessing or monitoring the compliance of the source with its emissions limitations, standards and work practices."

Because the Edgewater permit requires the facility to prepare and follow an ESP inspection plan as a compliance demonstration method for the permit's PM limits, the plan contains "specific information that may be necessary to implement and enforce" an applicable requirement, i.e., the PM limit, and must be included in the permit application. 40 C.F.R. 70.5(c)(5). In addition, the ESP inspection plan is a compliance assurance requirement under 40 C.F.R. 70.6(c)(1) and, thus, must be included in the title V permit. *See also* 40 C.F.R. 70.6(a)(1). Finally, because the plan is required to be in the permit application and the permit, the plan must be available for review during the title V public comment process. 40 C.F.R. 70.7(h)(2). For these reasons, I grant the petition on this issue as it pertains to the ESP inspection plan.

**FDCP:** Section I.O.5.a.(1) of the Edgewater permit "Conditions Applicable to the Entire Facility: Fugitive Dust Control Plan" states:

The permittee shall maintain and follow a fugitive dust control plan for all potential sources of fugitive dust emissions. This plan shall be submitted to the Department upon request. A copy of the plan shall be kept at the facility. [s. NR 415.04(2), Wis. Adm. Code]

The permit record is unclear as to the relationship between the FDCP permit condition and any applicable requirement. Petitioner cites the permit section requiring the FDCP, which in turn cites SIP provision NR 415.04(2) as authority for the FDCP requirement. However, based on our review, it is not clear whether and on what basis NR 415.04(2) applies to this source in this geographic location and if it is appropriately cited as authority for the FDCP requirement. Moreover, if NR 415.04(2) does apply to this source, it is not clear that its provisions have been incorporated into the permit. For these reasons, EPA is unable to determine whether the FDCP is required to be included in the permit application and the permit, and whether the plan must be made available to the public for comment.

Accordingly, I direct WDNR to review the cited authority for the FDCP requirement at § I.O.5. of the Edgewater permit and either revise § I.O.5. to accurately cite the authority for this requirement or revise the permit conditions to accurately reflect the applicable requirement. After WDNR determines whether an applicable requirement is the authority for the FDCP requirement in the Edgewater permit, then it must determine whether the FDCP must be included in the permit application pursuant to 40 C.F.R. § 70.5, and the permit pursuant to 40 C.F.R. § 70.6, and whether it must be made available to the public during the public comment process pursuant to 40 C.F.R. § 70.7(h)(2).

## CONCLUSION

For the reasons set forth above, and pursuant to section 505(b)(2) of the Clean Air Act and 40 C.F.R. § 70.8(d), I hereby grant in part and deny in part the petition filed by David C. Bender on behalf of the Sierra Club. WDNR shall have 90 days from the receipt of this Order to resolve the objections identified above and to terminate, modify, or revoke and reissue the Edgewater title V renewal permit accordingly.

AUG 1 7 2010 Dated:

Lisa P. Jackson

Administrator