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EPA Docket Center (EPA/DC)  
U.S. Environmental Protection Agency  
Mail Code: 28221T  
1200 Pennsylvania Avenue, NW  
Washington, DC 20460  
**Attn: DOCKET ID No. EPA-HQ-OAR-2013-0603**  
**Date: October 15, 2014**

**Re: Proposed Carbon Pollution Emission Guidelines for Modified and Reconstructed Stationary Sources: Electric Utility Generating Units, 79 Fed. Reg. 34960 (June 18, 2014)**

Dear Administrator McCarthy and Staff:

In response to the above-referenced docket, American Municipal Power, Inc. (AMP) and the Ohio Municipal Electric Association (OMEA) hereby offer the following comments for the record.

It should be noted that while the public comment period for the Proposed Carbon Emission Guidelines for Existing Stationary Sources: Electric Utility Generating Units, 79 FR 34830 (June 18, 2014) was extended to December 1, 2014, U.S. EPA chose to maintain the deadline for comments on the proposed rule for modified and reconstructed electric generating units (EGU). Because the rules are so inextricably linked, this puts the regulated community and other interested parties at a distinct disadvantage in the preparation and submission of substantive comments. U.S. EPA's action has all but eliminated the ability to cross reference concerns with the rule for modified and reconstructed units with comments related to the existing EGU rule. Nevertheless, we hereby incorporate by

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reference our forthcoming comments on U.S. EPA's proposed regulations for existing sources and will submit those comments to this docket when they are complete.

### Background on AMP/OMEA

Ohio-based AMP is the non-profit wholesale power supplier and services provider for 129 locally owned and controlled municipal electric entities located in Delaware, Kentucky, Michigan, Ohio, Pennsylvania, Virginia, and West Virginia. AMP's members collectively serve more than 625,000 residential, commercial, and industrial customers and have a system peak of more than 3,400 megawatts (MW). AMP's core mission is to develop, manage and supply diverse, competitively priced, reliable wholesale energy to public power members through strategic partnerships, member-focused relationships and a diversified power resource mix.

AMP's diverse energy portfolio makes the organization a leader in the deployment of renewable and advanced power assets that include a variety of base load, intermediate and distributed peaking generation using hydropower, wind, landfill gas, solar and fossil fuels, as well as a robust energy efficiency program. Our fossil fuel assets today consist of a 368 MW ownership share of the 1,600 MW coal-fired Prairie State Generating Co. (PSGC) located in Lively Grove, Illinois, as well as the 707 MW (fired) natural gas combined cycle (NGCC) AMP Fremont Energy Center in Fremont, Ohio. The majority of AMP's members are located in the PJM Interconnection LLC (PJM) regional transmission organization footprint, while some members are located within the Midcontinent Independent System Operator, Inc. (MISO). The OMEA represents the state and federal legislative interests of AMP and 80 Ohio municipal electric communities.

Because of AMP's structure as a non-profit power provider, AMP/OMEA closely follows regulatory initiatives with the potential to impact our members' costs and reliability. To that end, our comments on the design elements of limits on greenhouse gas (GHG) emissions from existing power plants, including those that may undergo modification or reconstruction, reflect expected impacts of the upcoming standards on AMP and member units, as well as to other units in the region, from which AMP/OMEA members expect to acquire varying proportions of their power supply through wholesale market purchases. The multi-state nature of our membership and power supply portfolio, plus the various types of electricity markets within which we operate, all point to the need for careful consideration of all options, particularly those that acknowledge that "one size does not fit all" when it comes to carbon standards.

AMP is a progressive leader in developing alternative and renewable energy among both its public and private peers. AMP has actively worked over the past decade to diversify our power supply portfolio, to the point that we are on track for our members' portfolio to be approximately 21% renewable by 2016.

AMP/OMEA supports and incorporates by reference the comments submitted to this rulemaking docket by the American Public Power Association (APPA) and PSGC. In addition, we offer the following comments:

## Lack of Technical Support

U.S. EPA has stated that this Clean Air Act (CAA) Section 111(b) rulemaking is subject to CAA Section 307(d).<sup>1</sup> This provision requires U.S. EPA to establish a rulemaking docket and, on the date of proposal, to include in the docket all data, information and documents upon which the proposed rule is based.<sup>2</sup> Specifically, Section 307(d)(3)(A)-(C) requires that the docket include the factual data on which the proposed rule is based; the methodology used in obtaining the data and in analyzing the data; and the major legal interpretations and policy considerations underlying the proposed rule.

Despite the clear mandate of CAA Section 307(d) and well-established practice in past rulemakings, U.S. EPA has not provided the requisite technical support documents, memorandum, or data for its proposed rule.<sup>3</sup> As such, in this instance the agency has violated clear statutory requirements related to its authority to initiate rulemaking under the CAA. Without access to the data and methodology on which the proposed rule is based, it is impossible for AMP/OMEA and other interested stakeholders to provide substantive comments on U.S. EPA's proposed standards of performance. In light of these defects in the rulemaking records, the proposed rules should be withdrawn and re-proposed. In the alternative, the relevant supporting documentation should be included in the docket and the time period for public comment extended.

## Concurrent Applicability of Two Different Standards

According to the proposal, U.S. EPA envisions that EGUs could be subject to both CAA Section 111(b) New Source Performance Standards (NSPS) for modified and reconstructed units and the CAA Section 111(d) existing source NSPS standards concurrently. Despite U.S. EPA's stated rationale for this approach, AMP/OMEA questions the wisdom and legal basis of subjecting the same source to both existing source and modified source standards.

Under the CAA, a stationary source can be existing or new, not both simultaneously. Under Section 111(a)(6), an existing source is defined as "any stationary source other than a new source." U.S. EPA should regulate EGUs consistent with the CAA and past practice. In this instance, an EGU should be regulated under Section 111(b) either because it is a new, modified, or reconstructed EGU, or subject to Section 111(d) if it does not qualify as a new source.

Under U.S. EPA's approach, an existing EGU will be required to achieve a 6% heat rate improvement. As U.S. EPA acknowledges, some of those projects implemented to

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<sup>1</sup> 79 Fed. Reg. 34950

<sup>2</sup> CAA § 307(d)(3)

<sup>3</sup> By way of example, the preamble to the modified source rule references a Technical Support Document (TSD) "Standards of Performance for Natural-Gas Fired Turbines," which it says is part of the docket. (See; 79 Fed. Reg. 34990, note 94). However, that document is not in fact currently available on the docket.

improve heat rate could in turn have the result of increasing the source's maximum achievable hourly emission rate (lb. CO<sub>2</sub>/hr.) even while decreasing its actual output based emission rate (lb. CO<sub>2</sub>/MWh), thus subjecting the unit to the modification provisions.<sup>4</sup> Under the proposal, the EGU could then be required to reduce emissions 2% lower than the unit's best demonstrated annual performance during the period 2002 to the year the modification occurred. As the rules are currently structured, it is likely that the EGU would also be subject to New Source Review (NSR).

AMP suggests that U.S. EPA amend its NSR regulations to redefine "major modification" to exclude changes implemented for purposes of compliance with Section 111(b) (as well as for Section 111(d)). This would allow for the physical changes necessary to compliance without forcing the EGU into the additional, burdensome NSR regulatory regime.

Specifically, because U.S. EPA is using the rulemaking to promote the generation of electricity with NGCC instead of coal-based steam plants, AMP believes it is only logical to provide NSR reform to promote the debottlenecking and increased efficiency of NGCC EGU's. Specifically, AMP feels an expedited and abbreviated NSR process is essential for projects designed to increase capacity through debottlenecking existing processes and heat rate improvement as long as ambient air quality is not significantly impacted. For the goals envisioned in U.S. EPA's Section 111(b) and 111(d) proposal to be successful, there must be an exemption from Best Available Control technology (BACT) review and accommodation for changes to existing permits limited to authorization of the proposed debottlenecking and heat improvement changes.

AMP requests that U.S. EPA provide the required support and technical demonstration that the approach of requiring an additional 2% reduction in annual CO<sub>2</sub> emissions is even remotely feasible, particularly when there is already a robust debate on whether the 6% heat rate improvement is achievable. Specifically, since U.S. EPA intends units be subject to both Sections 111(d) and 111(b), we are interested in the technical review of how these requirements were evaluated together. U.S. EPA has not provided the historical calendar year CO<sub>2</sub> emissions data from 2002 to 2013 that would be the basis for this proposal, nor has it calculated the specific emissions limit that would have to be achieved for the EGUs subject to this proposal using its 2% methodology. Without adequate record support, such requirements are arbitrary and capricious and contrary to the Clean Air Act.

### Energy Efficiency Audits

If a state has an approved Section 111(d) plan in place and an EGU is subsequently modified, U.S. EPA proposes allowing source specific emissions limits be set based on an energy efficiency audit. However, any attempt to impose source specific emission limits is contrary the CAA Section 111(a)(1) and (b)(2). We are not aware of any precedent under the NSPS program for source specific emission limits.

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<sup>4</sup> 79 Fed. Reg. 34970

Beyond the fact that U.S. EPA has no authority under the NSPS provisions to establish source specific limits, the impractical nature of this approach invites protracted individual legal challenges to any effort to set such source specific standards. U.S. EPA's proposal provides no guidance or other indication on how such an approach would be structured, other than to state the audit would be based on a visual inspection, review of available engineering plans and operation and maintenance logs, and a comprehensive report detailing the ways to improve efficiency, the cost and benefits of improvements, and the time frames for recouping investments. Absent specific criteria, what constitutes cost effective efficiency improvements is really left to a state regulator's whim. Where the NSPS promotes consistency, this approach will have the opposite result. While U.S. EPA's authority under the Clean Air Act to delegate its Section 111(b) authority to the States is questionable, it must, at a minimum, supply sufficient guidance to ensure that affected EGUs are regulated in a consistent manner.

In addition, U.S. EPA proposes that the energy assessments be conducted by "energy professionals or engineers that have expertise in evaluating energy systems" and asks for comment on whether there should be a certification system and whether there are organizations that provide certifications of specialists in evaluating energy systems. Given the scope of this proposal, we find it surprising that U.S. EPA would not have performed a cursory investigation as to whether such certification organizations exist, and as a result question whether adequate support for the energy assessment approach has been established.

### The Proposed Rule Should Include Additional Categories

In the past, U.S. EPA has recognized the limitations associated with certain equipment and the need to establish categories of EGUs under the NSPS, and even states in the rule preamble that utility boilers are numerous and diverse in size and configuration.<sup>5</sup> It is our position that categories for various plant design, size, and age are appropriate for this proposed standard as well. U.S. EPA further stated "developing a single standard for all modified utility boilers or IGCC units is challenging."<sup>6</sup> For these very reasons, we believe it is essential that U.S. EPA subcategorize under Section 111(b)(2) and account for the many differences in boilers.

U.S. EPA has indicated a willingness to consider creating categories for NGCCs. As an example, the agency has requested comment on establishing separate standards for load following NGCC (*i.e.* intermediate capacity factor) EGUs with a more stringent standard applying only during periods of high annual capacity factors and a less stringent standard applying during periods of intermediate load.<sup>7</sup> U.S. EPA's basis for this approach focuses on the potential issues associated with the fact that NGCC units are designed to be highly efficient when operating as load-following units and are less efficient in a base load

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<sup>5</sup> 79 Fed. Reg. 34982, 34986, 34987

<sup>6</sup> *Id.* at 34987

<sup>7</sup> 79 Fed. Reg. 34980

capacity (as well as the opposite scenario). The same issue applies to coal-fired EGUs, and U.S. EPA should not restrict the rule to creating categories only for NGCC units.

### References to Both Net and Gross Output Raises Issues With Recordkeeping, Reporting, and Uniformly Demonstrating Heat Rate

AMP believes a gross standard rather than a net standard is preferable. U.S. EPA has requested comment on using either gross output standards or adjusted gross output based standards in the final rule.<sup>8</sup> While U.S. EPA states it is proposing net output CO<sub>2</sub> emission rates, throughout the rule gross output is discussed.

For example, U.S. EPA explains that the rule requires monitoring of “gross output,” expressed in MWH.<sup>9</sup> U.S. EPA also states that Part 75 monitoring systems used together with the “gross output” over a period of 12 months (a rolling average updated after each new operating month) will be used to calculate the average CO<sub>2</sub> mass emissions rate.<sup>10</sup> Further, initial compliance is calculated by dividing the sum of the hourly CO<sub>2</sub> mass emissions values by the total “gross output.”<sup>11</sup> In addition, recordkeeping requirements require owners or operators to keep records of the calculations performed to determine the total CO<sub>2</sub> mass emissions and gross output for each operating month.<sup>12</sup>

EPA proposes a gross-output approach in the NSPS rulemaking, proposes a net-output approach in the ESPS rulemaking, and sets net-output compliance requirements but discusses collection of gross output in the Modified Source Rule. U.S. EPA’s intermixing of gross and net throughout the rulemakings will make it very difficult for sources to uniformly demonstrate heat rate among the rules. Furthermore, EPA’s intermixing of gross and net throughout this proposed rule brings into question whether the BSER determinations reviewed are based on gross or net data and whether the emission rates reviewed are actually gross emission rates for the best plants since the rates proposed are only achievable if these were based on gross emission rates.

This net-output based reporting compliance alternative should be rejected. As U.S. EPA had already noted in the Section 111(b) rulemaking, the only data available on CO<sub>2</sub> emissions from EGUs currently is in the form of gross output from continuous emission monitoring systems, and thus requiring reporting on a net-output basis would be inconsistent with the current requirements, would add unwarranted costs and burden to utility reporting, and also “would have little impact...in terms of environmental performance.”<sup>13</sup> Thus, we question why U.S. EPA is even requesting comment in this regard.

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<sup>8</sup> *Id.* at 34,795

<sup>9</sup> 79 Fed. Reg. 34977

<sup>10</sup> 79 Fed. Reg. 34978

<sup>11</sup> *Id.*

<sup>12</sup> *Id.*

<sup>13</sup> 79 Fed. Reg. 1448

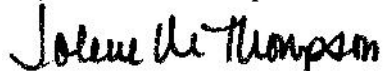
Finally, the requirements in the Modified Source Rule that require collection of both gross and net based data further confuse compliance obligations. AMP/OMEA requests that U.S. EPA propose a uniform approach using a gross standard throughout all three rules. As the rules currently sit, AMP could envision an EGU that undergoes a modification being subject to a gross standard under Section 111(b) for a modified unit as well as a net standard under Section 111(d) for an existing unit. For an already unwieldy, precedent setting and complex rulemaking, such a scenario is untenable for those responsible for actually operating and ensuring compliance with applicable standards.

### Conclusion

In addition to the comments above, we support and incorporate by reference the comments filed by APPA and PSGC on this rulemaking in Docket NO. EPA-HQ-OAR-2013-0603.

While by no means exhaustive, the comments provided represent issues of particular concern to AMP/OMEA relative to the proposed modified/reconstructed unit rule. We thank U.S. EPA for this opportunity to provide input to the agency on these important matters; please let us know if you need additional information.

Respectfully Submitted  
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