

# Building a bulwark around the Clean Power Plan

October 26, 2015

On August 3, 2015, President Obama unveiled highly anticipated final Clean Air Act rules to address carbon dioxide emissions from new and existing power plants. Taken together, EPA's rules represent the most aggressive action ever taken by the federal government to reduce greenhouse gas (GHG) emissions. These regulations are projected to accelerate transformations that are currently occurring in the US electricity sector by spurring increased renewable energy generation and use of energy efficiency technologies. They will also allow the US to take a leading role at international climate negotiations in Paris in December 2015.

The most consequential and controversial of these rules is EPA's Clean Power Plan, in which the Agency is setting standards under CAA section 111(d) for CO<sub>2</sub> emissions from existing power plants. EPA projects that the CPP would reduce CO<sub>2</sub> emissions 32 percent below 2005 levels by 2030—an actual increase in stringency from its proposed rule. A second rule establishes section 111(b) standards for new, modified and reconstructed electricity generating units (EGUs). Under the new unit rule, EPA is prohibiting the construction of new coal-fired EGUs unless the facility uses carbon capture and storage (CCS) technology to capture at least 20 percent of that facility's CO<sub>2</sub> emissions. Finally, EPA proposed a federal plan for states that do not comply with the planning requirements of the CPP and a model rule for states interested in developing trading programs. That proposal will be open for comment.

As expected, the rules are engendering significant opposition from certain states, industry stakeholders and congressional Republicans, and courts are expected to be reviewing the legality of EPA's rules over the coming months and years. In fact, an emergency stay motion is now pending in the DC Circuit. This article will briefly review the mechanics of the CPP and explore some of the ways EPA is seeking to protect the rule, and hence its overall climate regulatory program, from political and legal attack.

## The basics of the Clean Power Plan

The overall structure of the final rule has not changed dramatically from the proposal. EPA sets state-specific targets based on 2012 emission baselines that the states must meet by 2030. One significant change is that EPA now sets targets as both carbon emission rates and mass-based rates to provide states with additional flexibility. States must develop plans to meet their targets, and mandatory reductions begin in an interim period, now starting in 2022—a two-year extension. States that fail to submit plans within the specified timeframes would be subject to a federal plan, which EPA released in proposed form.

## Significant changes made to the rule to increase its defensibility

EPA undertook a significant stakeholder outreach effort upon release of the proposed rule in 2014, including participating in forums held by the Federal Energy Regulatory Commission and meetings with concerned states and industries well after the period for public comment ended. As a result, EPA heard significant comments from a wide variety of interests, including those that normally support strong environmental regulation. Among the most significant concerns expressed were EPA's authority to regulate beyond the "fence-line" of the regulated sources, the limited

period of time for states to meet interim and final goals, and potential risks to affordable and reliable power. One can certainly see in the final rule EPA's attempt to address many of these concerns, a concept made even clearer in the unprecedented 150-plus page legal memorandum EPA released with the rule, setting forth its legal defenses.

By and large, the major changes occur in several distinct areas: scope of authority, state flexibility, timing and reliability assurance.

## Bolstering the scope of authority

As an initial matter, EPA has tried to insulate the CPP by protecting its regulatory predicates. EPA cannot establish section 111(d) guidelines for existing sources without a valid section 111(b) new source rule. In its final new source rule, EPA has backed down somewhat from its proposed requirement that new coal-fired plants meet a "best system of emissions requirement" (BSER) of 40 percent CCS, loosening the standard to require 20 percent carbon capture. While any CCS requirement risks attack as a commercially unavailable technology, EPA is clearly trying to move the technology forward, though at a lesser rate. This may help EPA defend the 111(b) rule for new sources. In addition, EPA has set source-specific standards for modified and reconstructed units under section 111(b) and has argued that even if the new source rule is struck down, it can support 111(d) guidelines based on the modified and reconstructed unit rule.

Further, EPA has sought to address concerns over how it determines the BSER for existing units. Critics have argued that EPA has gone beyond its statutory authority which ends at the "fence-line" of regulated plants. EPA has modified its methodology to more closely resemble how it has set 111(d) guidelines in other contexts. First, EPA asserts that it has only set emission standards for regulated plants. Indeed, it sets separate rates for both coal- and oil-fired EGUs and for natural gas-fired EGUs, based on the most achievable rates determined on a regional basis to match the regional nature of the grid. These rates then apply uniformly to all such units across the country.

To calculate these rates, EPA also uses three of the four previously proposed "building blocks" in the final rule to establish BSER, but makes significant changes to each to reflect new or more accurate information. EPA also asserts that all calculations are based on existing technologies.

- Building block 1—Heat rate improvements at existing EGUs—Lowered from an expected six percent efficiency improvement across all plants to a range of 2.1–4.3 percent depending on the region, based on new data.
- Building block 2—Increased dispatch of existing natural gas plants: Changed from an assumed availability level of 70 percent name-plate capacity to 75 percent of net summer capacity, a more accurate measurement of performance.
- Building block 3—Shifting generation to zero-emitting technologies: Removes from consideration existing nuclear plants and those under construction as well as existing utility-scale renewable energy projects. This building block does include more use of renewable energy overall based on new information indicating lower costs and greater availability of renewable technologies. This is why the ultimate reductions are expected to be higher in the new rule.
- Building block 4—Demand side efficiency: Removed from consideration in setting BSER, because EPA reasoned that such activities were likely beyond its traditional regulatory approach. However, states are free, and indeed expected, to use energy efficiency as a key component in their state plans.

EPA ultimately calculates state goals by determining the mix of EGUs in each covered state, and using the uniform rates to calculate cumulative rate-based and mass-based reduction goals. But it leaves to the states how these goals may be met—states can apply the source-specific standards to their own EGUs or adopt plans to meet rate- or mass-based goals. EPA even argues that the goals themselves are not federally enforceable. Rather, if a state cannot meet its goals or fails to submit a plan, EPA would apply a federal rule that would establish emission rates for specific

EGUs in the states, and states would be free to seek approval of revised plans to take over regulation.

## Bolstering state flexibilities and reducing cost

EPA's final rule increases the flexibility accorded to states in several important respects. First, states maintain the ability to meet their targets through an "emission standards plan," where a state may require the affected sources within the state to meet the rate-based targets, or a "state measures plan," where a state can use virtually any set of measures it chooses, as long as it produces measurable and verifiable reductions to meet a mass-based target, with federally enforceable rules as a backstop. States are now also provided interim and final goals expressed as both emission rate-based and mass-based targets. In addition, states can choose a mass-based approach complemented by new sources if it chooses to combine the rules and use new sources to meet its targets. These flexibilities address the argument that EPA is co-opting state energy policy.

One of the most significant changes to the final rules is the emphasis on trading, which EPA sees as a way to ensure maximum state flexibility and the most cost-effective reductions within the framework of the integrated grid. EPA explicitly endorses intrastate and interstate trading as a mechanism to allow low-cost compliance and encourages such trading by including mass-based targets, which readily support trading approaches, and by including "trading-ready mechanisms" for states to place in their plans to avoid the need for negotiating formal multi-state agreements at the outset of the plan. States with rate-based targets can also allow trading through emission rate credits (ERCs). EPA will also support multi-state trading programs by helping to track and implement them, and has provided model trading rules for both rate- and mass-based programs in the proposed federal plan. States that develop their own rules can utilize the model rules, which presumptively would be in compliance with EPA guidelines. States could also use only parts of the model rules, for example, those pertaining to monitoring and verification.

## Adjusting timing

Several key timelines have been extended to meet strong stakeholder concerns. States can seek two additional years until 2018 to submit their final plans but need to request the extensions and file initial and interim plans in 2016 and 2017, respectively. The interim compliance period begins in 2022, rather than as originally proposed in 2020, to avoid the "regulatory cliff" many states complained about. Similarly, the final rule provides states with several options to meet their interim targets. EPA has broken the 2022–2029 time period down into three phases, where a state must step up its reductions, or it can use an eight-year average. States can also set their own interim milestones in their plans as long they meet the interim and final targets. These changes are intended to provide states with maximum flexibility to meet their goals based on their own needs and circumstances. They also push the timeline for compliance back to discourage a court granting an immediate stay of the rule.

Another new aspect of the rule, intended to augment flexibility, is the recognition of "early reductions," those made prior to the 2022 start of the interim period. EPA presents a newly crafted voluntary Clean Energy Incentive Program for such early reduction credits. This program covers investments in certain renewable energy projects that generate carbon-free power in 2020–2021, and energy efficiency projects in low-income areas that reduce demand in those same years. EPA will provide matching credits or allowances to the states that participate in this program.

## Bolstering reliability

EPA was under considerable pressure from many stakeholders to ensure the CPP would not adversely impact electric reliability. The final CPP addresses reliability in a number of ways. First, as stated above, the rule pushes the interim period back two years and allows states to adopt their own "glide paths" through the interim period, allowing states flexibility to plan and make necessary infrastructure improvements. Moreover, the 15-year period between rule issuance and final goals should allow states to conduct the necessary planning to avoid reliability issues. States also are required to show in their plans they have considered reliability concerns, including by consulting with state

reliability or planning agencies. Further, states can amend plans if reliability challenges arise. Most significantly, EPA included a reliability safety valve that is to apply only in unforeseen circumstances or emergencies where continued operation is required for reliability but would violate state CPP obligations.

## Will it work?

Nearly all the changes in the final rule were made in response to significant comments by stakeholders, particularly states, regional system operators and multi-state generators. However, EPA is well aware of the legal challenges the rule faces, having successfully defended several judicial challenges to the proposed rule already, winning largely on procedural grounds. Hence, EPA also made many of the changes in the rules discussed above to bolster their defensibility and set forth its legal defense in its accompanying comprehensive legal memorandum. Indeed, in many ways, the final rule appears better designed and more fair and reasonable than the proposed rule, and more grounded in agency authority.

Nevertheless, EPA still faces daunting legal issues. Its BSER calculations still contain measures that arguably go beyond the fence-line. More fundamentally, it is still seeking to establish a comprehensive energy policy based on a very limited provision of the CAA, and one that has never before been used for such purposes. EPA has been forewarned by the Supreme Court on two recent occasions not to build such expansive economy-wide programs on provisions with arguably limited authority. Further, EPA's new source rule may need to survive legal scrutiny at some level to provide the necessary authority for the CPP. Finally, EPA must confront an argument that it lacks authority to even regulate GHGs from EGUs based on readings of 111(d) from conflicting House and Senate reports.

Once the final rules are published, there will no doubt be a flood of new petitions for judicial review filed. Challengers are already lining up, including 15 states and some industry groups that have filed for an emergency stay even before the rule is published. If that motion fails, it can take upwards of two to four years for a judicial challenge to wend its way through the DC Circuit and the Supreme Court, so it may be some time before EPA's suite of rules are finally adjudicated. Until that time, EPA's evident hope is that states will continue to move toward cleaner energy and will comply with the CPP to ensure that movement continues, and at an accelerated pace.

## Your Key Contacts



**Andrew Shaw**

Partner, Washington, DC

D +1 202 496 7116

[andrew.shaw@dentons.com](mailto:andrew.shaw@dentons.com)