

Attachment A

Environmental Justice Section

Working Group VIII Report – October 17, 2008

F. Environmental Justice Communities

Overview

Certain low income neighborhoods in New York, and very often communities of color, host peak generation facilities that are among the higher emitting and most inefficient units in the state. In some cases these units have no emission controls and stacks as short as 30 feet from ground level. These units are posited to have negative health impacts on the local populace. Environmental Justice advocates have asked the Commission to determine whether there are opportunities to render those facilities obsolete through the acquisition of energy efficiency resources. This was one of the charges given to WG VIII, which has interpreted it as a request to identify whether the output from such units could be 1) fully or 2) partially replaced or displaced with clean demand response, load shifting technologies and energy efficiency (collectively demand-side management (DSM)).

In addition, WG VIII was directed to consider the need for a study to assess the health impacts on communities that host peak generation facilities to a disparate extent. Although WG VIII's charge is limited to evaluating impacts to communities from peak generation facilities, there are other sources of air pollution that impact the communities surrounding the facilities evaluated by this working group.

Challenges

It is generally accepted that, in the most general terms, DSM resources can act as substitutes for generation, with certain types of DSM resources being better suited to substitute for certain types of generators. However, whether or not specific generators can be replaced, or their operations significantly reduced, by clean DSM resources is a very technical question and one which WG VIII is not capable of answering in isolation.

This is especially true for peaking generation facilities in New York City with its complex and highly loaded electrical network. For example, in order to meet reliability criteria, 80 percent of the generation needs of New York City must be met by generators physically located within the city. Similarly, certain generators may be required for voltage support, black start, or other system operation needs. Whether one or more peaking units could be replaced by clean DSM resources would depend on the units in question, their location, and the availability of sufficient DSM resources within that area.

It may be possible that the output of some units could be replaced or displaced by appropriate DSM resources located anywhere in Zone J (NYC) while the output of others could be replaced or displaced with DSM resources outside of Zone J. However, the output of other units might be replaced or displaced only by DSM resources in the same local area, raising the question of whether sufficient DSM resource potential exists to serve that function. Finally, other units might not be replaceable by DSM resources at all because they are needed for functions that usually cannot be provided by DSM resources.

Working Group VIII is unanimous in its view that whatever may come out of the investigations and recommendations regarding this charge, no reduction in system reliability from established standards can be tolerated. If it is determined that DSM resources can replace or displace the output of the peaking facilities, such actions must be done in a way that maintains or improves the reliability of the system through compliance with all applicable reliability rules.

Finally, WG VIII recognizes that generators in New York are dispatched in accordance with established market rules that currently do not incorporate environmental considerations except insofar as environmental compliance costs are reflected in generator bids and in constraints on when and for how long certain units can be operated. Absent specific agreements or requirements outside the market to limit the operation of the facilities in question, there is no guarantee that added demand resources will displace output from the intended units.

Further Study

An analysis needs to be conducted in order to determine whether the output from peak generation units²⁴ within a half-mile of an Environmental Justice community could be fully or partially replaced or displaced with clean DSM resources. Working Group VIII suggests that a technical study group be convened with staff from the New York Independent System Operator (NYISO), the Department of Public Service, the Consolidated Edison Company (Con Ed), and the Department of Environmental Conservation. The technical study group will make an initial assessment whether the output from peak generation units within a half-mile of an Environmental Justice community could potentially be fully or partially replaced or displaced with clean DSM

²⁴ The peak generation units under consideration by WG VIII are simple-cycle turbines that, in general, have a capacity factor less than 10 percent during the ozone season and do not have environmental controls.

resources. In addition, a steering committee, consisting of interested parties would be responsible for reviewing and advising the work of the technical study group. The units that would be evaluated would be selected based upon criteria such as:

1. Emissions from the units; (lbs per MWh, NO_x and PM)
2. Actual or modeled impacts of those emissions on ambient air quality on the identified EJ Communities
3. Role of the facilities for providing the reliable operation of the transmission system;
4. Electricity generated (MWh/year and MWh/ozone day);
5. Number of residents within a half-mile of the facilities;
6. Age of the units; and
7. Future plans for the units.

The results of this assessment will be presented in a report to ALJ Stein and ALJ Stegemoeller by December 1, 2008.

Recommendation

As of October 17, 2008, Working Group VIII is not in a position to provide specific recommendations to the Commission regarding the EJ charges. After the technical study group completes its assessment, the steering committee will develop recommendations based on the results of the assessment and will present the recommendations to ALJ Stein and ALJ Stegemoeller on December 1, 2008. Ultimately, recommendations may advise the Commission to maximize DSM resources in Environmental Justice communities, create incentives for targeted DSM resources that would specifically compete with the dispatch of peaking turbines located within one-half mile of an Environmental Justice community, initiate, a pilot program, conduct additional technical analysis, or recommend other mechanisms that will reduce emissions and resulting health impacts to environmental justice communities.