Document Accession #: 20051019-5047 Filed Date: 10/19/2005

ORGANIZATION OF PJM STATES, INC.

Members:
Delaware Public Service Commission
District of Columbia Public Service Commission
Illinois Commerce Commission
Indiana Utility Regulatory Commission
Kentucky Public Service Commission
Maryland Public Service Commission
Michigan Public Service Commission
New Jersey Board of Public Utilities
North Carolina Utilities Commission
Public Utilities Commission of Ohio
Pennsylvania Public Utility Commission
Tennessee Regulatory Authority
Virginia State Corporation Commission
Public Service Commission of West Virginia

Executive Committee Members:
Wendell F. Holland, President
Laura Chappelle, Vice President
Mark David Goss, Secretary
Allen M Freifeld, Treasurer
Agnes A. Yates

October 19, 2005

Magalie R. Salas, Secretary
Federal Energy Regulatory Commission
888 First Street, N.E.
Washington, D.C. 20426
(by Electronic Filing)

Re: ***PJM Interconnection, L.L.C.,*** **Docket Nos. ER05-1410-000 and EL05-148-000;** Comments on Filing on behalf of the Organization of PJM States, Inc. **(NOT CONSOLIDATED)**

Dear Ms. Salas:

Please accept for filing in the above-referenced matter electronically filed Comments on Filing on behalf of the Organization of PJM States, Inc. Service has been made upon the service list as evidenced by the attached certificate of service.

Thank you for your attention to this matter. If you have any questions in reference to this filing, please contact me at 717-787-5978.

Sincerely,

s/ John A. Levin
John A. Levin, Assistant Counsel
Pennsylvania Public Utility Commission

Cc: Per Certificate of Service
Enclosures

Document Accession #: 20051019-5047 Filed Date: 10/19/2005

UNITED STATES OF AMERICA
BEFORE THE
FEDERAL ENERGY REGULATORY COMMISSION

PJM Interconnection, L.L.C.	**ER05-1410-000** **EL05-148-000**
(CASES NOT CONSOLIDATED)	

COMMENTS OF THE ORGANIZATION OF PJM STATES, INC.

Dated: October 19, 2005

TABLE OF CONTENTS

The Organization of PJM States, Inc. ("OPSI"), hereby tenders its comments on the filing in this matter.

I. Procedural Background

On August 31, 2005, PJM Interconnection, L.L.C. filed its "Reliability Pricing Model" ("RPM") as a proposed replacement for its existing unforced capacity obligation, as contained in its Open Access Transmission Tariff and Amended and Restated Operating Agreement, both filed with FERC and subject to FERC's jurisdiction under the Federal Power Act. Because the Operating Agreement is administered by the PJM Members Committee, which has declined to support the current proposal, PJM styles its filing as a joint Federal Power Act Section 205 and 206 filing. A notice of the filing was issued on September 7, 2005, setting the comment due date on or before September 21, 2005.

On September 16, 2005, OPSI filed a motion for an extension of time to file interventions, comments and protests in response to FERC's September 7, 2005 Notice of Filing. On September 23, 2005, FERC granted an extension of time to October 19, 2005, as requested by OPSI.

II. Introduction

OPSI is an organization of state utility regulatory commissions[1] charged with the regulation of electric utilities and of electric suppliers where retail electric generation competition has been authorized. OPSI members reserve the right to file individual comments. Each of our member Commissions has a vital interest in the effect on wholesale and retail markets and grid reliability which this filing may cause. While OPSI agrees that locational reliability problems exist in certain areas of PJM, we are not convinced that the RPM model will have the intended effects on investment that will solve these local reliability problems, or that RPM is the most cost effective means of solving future reliability problems. Specifically, the OPSI comments address the following issues:

- Joint and Common Markets - Section notes that prior to adopting changes to resource adequacy constructs, the impact upon development of joint and common markets be fully vetted to ensure compatibility.

[1] State and District commissions that are current members of OPSI are:

Delaware Public Service Commission
District of Columbia Public Service Commission
Illinois Commerce Commission
Indiana Utility Regulatory Commission
Kentucky Public Service Commission
Maryland Public Service Commission
Michigan Public Service Commission
New Jersey Board of Public Utilities
North Carolina Utilities Commission
Public Utilities Commission of Ohio
Pennsylvania Public Utility Commission
Tennessee Regulatory Authority
Virginia State Corporation Commission
Public Service Commission of West Virginia

- Underlying Rationale for RPM - Section raises the issue that a universal solution, which is designed to fix a short-term problem, may not consider the long-term needs on the development of competitive markets.

- RPM - Section addresses several reliability, economic, and policy issues that RPM may not fully address related to Locational Incentives/Generation Issues; Transmission Integration; Demand Response and Price Volatility for Capacity.

- RPM Technical Issues - Section identifies a preliminary list of items that FERC should review such as the net revenue offset and working assumptions contained in the simulations offered in support of RPM.

- State Expectation in Future Market Structure - Section notes the perceived need for an administrative construct like RPM highlights inefficiencies in the PJM wholesale market and notes that an efficient, robust energy market must be the case for the long-term vision.

Because of these concerns, OPSI requests that FERC reject PJM's request for an accelerated approval of its filing and set the entire case for hearing.

III. Joint and Common Markets

In examining the RPM model as a group of commissions from 13 states and the District of Columbia, OPSI emphasizes that its membership is comprised of retail competition states and non-retail competition states. The recent expansion of the PJM footprint necessitates FERC and all stakeholders to recognize the significant differences among the various states in PJM. These differences include not only retail access and vertically integrated states, but also differing load characteristics and increased number of control centers.

Also, six members of OPSI participate in two regional transmission organizations ("RTO"), namely PJM and the Midwest ISO ("MISO")[2]. For OPSI, this fact raises a particular concern as to how neighboring RTOs may operate a joint and common market with differing capacity constructs. OPSI firmly supports the expeditious development and implementation of the Joint and Common Market throughout the combined PJM/MISO footprint. In accepting the current geographic RTO configuration comprising PJM and MISO, FERC hailed the establishment of a Joint and Common Market in the PJM/MISO regions as the thread that would knit into a single market structure what many described as a "crazy quilt" RTO configuration within the interspersed geographical territories of the PJM and MISO RTOs. The commitment by FERC to foster a vibrant Joint and Common Market throughout the PJM/MISO footprint must remain a bedrock principle as critical RTO market policy and structural changes, such as resource adequacy are considered.

The current state of affairs relating to the divergent resource adequacy proposals within the combined PJM/MISO footprint is of grave concern. In advancing its RPM proposal, PJM is convinced a complex capacity market construct is needed. MISO, on the other hand, has not embraced an organized capacity market, claiming modification of existing energy markets to free them up to allow for increased price flexibility along with measures to support long-term

[2] OPSI members that also participate in MISO are the Illinois Commerce Commission, Indiana Utility Regulatory Commission, Kentucky Public Service Commission, Michigan Public Service Commission, Public Utilities Commission of Ohio and the Pennsylvania Public Utility Commission.

contracts is the answer. Whatever resource adequacy constructs are ultimately adopted by the two RTOs, OPSI must be convinced that PJM's construct is fully compatible with successful implementation of a Joint and Common Market between the two RTOs. The Joint and Common Market commitment should be a reminder that this is not a contest among rivals to see who can get its construct in place first. Rather, resource adequacy is a very important objective with a significant impact not only within the individual RTOs, but also jointly as it relates to implementation of the Joint and Common Market.

OPSI is not satisfied that compatibility between the two RTO approaches has been adequately considered. Many questions must be answered before we are comfortable with the current diverse constructs. This is not intended to imply that the two RTOs should necessarily have identical approaches. Rather, it is imperative that the approaches are compatible and that this compatibility be demonstrated. Significant unanswered questions remain, such as how will a less constrained MISO energy market interact with the more constrained PJM energy market? Will capacity be attracted to one RTO rather than the other in a disruptive manner as a result of PJM operating a capacity market and MISO not adopting one? How will market monitoring within the RTOs be affected and, if necessary, coordinated between the two RTOs to ensure proper behavior as market participants may have an incentive to game differences between PJM and MISO markets? These and other similar questions must be answered before major structural market changes such as RPM are adopted. Therefore, a comprehensive

hearing is warranted, as the consequences of getting it wrong are significant and could seriously jeopardize establishment of the Joint and Common Market. OPSI strongly recommends that, prior to adoption of any major changes to resource adequacy constructs within PJM or MISO, the impact upon development and implementation of the Joint and Common Market be fully vetted to ensure compatibility with the commitment to achieve a robust energy market throughout the consolidated PJM/MISO region.

For the purposes of this filing, OPSI has focused in this subsection on the potential impact of RPM on the establishment of a Joint and Common Market between PJM and MISO. However, ascertaining the compatibility of capacity constructs between RTOs is not so limited, thus requiring state commissions and FERC to have a broader perspective when undertaking the review of these matters.

IV. PJM's Rationale for RPM

One of the fundamental underpinnings of PJM's proposal for implementation of RPM is that reliability may be compromised in PJM in the absence of a viable capacity model. However, with PJM overall system reserve projections showing adequate system-wide capacity reserve through 2009–10, it is apparent that isolated locational reliability problems serve as the main driver for RPM rather than a system-wide need.

Specifically, the November 2004 PJM Whitepaper on RPM concluded that reliability may be compromised in the Eastern section of the PJM Region as early as 2008 in New Jersey as a result of both local load growth and announced

generation retirements. While no longer citing the need to correct the reliability issues in New Jersey as the primary need for the immediate implementation of the RPM in its recent filing, PJM has now identified other isolated areas in its footprint that may face violations of reliability criteria over the next four years. PJM now states that if generation retirements occur in the Baltimore-Washington area and the Delmarva Peninsula, such retirements "could throw these areas into reliability violations as well." (*RPM Filing Letter* at 5).

As noted previously, the provision of safe and reliable service is a critical issue that is of vital concern to OPSI, its members and the FERC. OPSI and its members are dedicated to working with the FERC, PJM and its members to find appropriate solutions to address reliability needs in both the near and long-term. While overall reserve projections do not address local generation resource inadequacies, PJM has not established that the identified local inadequacies cannot be more effectively addressed except through the immediate implementation of RPM as presently drafted.

Further, it is of concern that this universal PJM solution, which is designed to fix a short-term problem, may not consider the long-term needs and effects on market participants and on the development of competitive markets. We support the continued development of competitive wholesale electricity markets with fully-functioning demand response and limited, but effective price mitigation. Consequently, OPSI is not convinced that PJM's proposal is needed at this time and, if implemented, that it will solve the problem. Therefore, while we appreciate

PJM's efforts in taking on such an important and complex issue, the lack of stakeholder consensus, the requested fast track review process and substantive state commission concerns with RPM enumerated below lead to a conclusion that the FERC must reject the accelerated approval that PJM has requested and set this case for hearing.

V. RPM

A. Locational Incentives/Generation Issues

The RPM filing would put PJM at the center of long term reliability planning and regional generation resource procurement. A major question to be raised and answered in this proceeding is whether RPM, as a tariff mechanism that is primarily designed to increase revenues to infrequently run peaking units, is the best solution to the issues identified by PJM as justification for this filing. It should also be noted that owners of existing intermediate and base load capacity may also experience significant revenue increases. Further, it is also fair to ask as a policy matter whether PJM should be the central generation procurement and reliability authority in the region.

There are several reliability, economic and policy issues that RPM may not fully address, if it addresses them at all.

1. Although RPM gives a nod towards integrating transmission planning and load response into its design, the principal focus of RPM design, and capacity markets generally, is to provide more revenue to peaking units without regard to the economic efficiency of such units. *PJM as a whole is not capacity deficient.* While it is obviously impractical to build a backbone transmission grid to every point in the PJM system, it is clear that the inadequacy of transmission ties in some regions makes them vulnerable to

the impact of generation retirements as well as generation market power. It is also clear that lack of a robust demand response to LMP price signals is a contributing factor as well.

2. While PJM mentions its parallel efforts to improve long term transmission planning, it is unclear how that effort will interact with RPM. To some extent the improvement of transmission is antagonistic to those generators counting on a stream of RPM revenue over the long term. How RPM will interact with the "Project Mountaineer" or any similar medium or long term interregional grid improvement program is something of puzzlement. As a mechanism that seems to prefer generation solutions to transmission solutions, it may be at odds with the Commission's expressed preference that regional transmission organizations concentrate on fostering short and long term *transmission* reliability.

3. Fuel and generation diversity is a concern of PJM and OPSI states, but RPM seems to do little to encourage the construction of new, more efficient base load and cycling generation, instead propping up and extending the service life of existing old peaking generation. Some of the existing peaking capacity exceeds 50 years of service life and is subject to increasingly stringent environmental restrictions. With regard to new capacity that may be encouraged, even if RPM works exactly as described, it may primarily result in an increase in the construction and operation of gas fired peaking units and will do little or nothing to create incentives to build other kinds of generation resources or to decrease the reliance of this region on natural gas-fired generation.

4. OPSI is concerned that RPM may be expected to have a long term impact on energy market prices. Specifically, as PJM multi-settlement energy markets clear for each hour based upon the bid of the highest cost marginal unit, RPM's intended consequence, the continued service life extension of old vintage peak generation, will tend to inflate energy prices, skewing and overriding LMP price signals. Given that natural gas markets may be headed for long-term shortages and/or price increases, OPSI questions whether that is a desirable result.

5. While RPM seeks to address local reliability criteria violations associated with the retirement of older generating units, it is unclear whether RPM offers any improvement in this regard. Many of the older units are located in heavily developed areas where it may be very difficult, if not impossible, to construct new generating facilities due to environmental permitting restrictions, lack of available fuel supplies, and local opposition. The

Potomac River Generating Station is an example of such an older unit located in a heavily developed area.[3] The RPM model may seek to introduce a competitive mechanism for compensating such generators and may discourage retirement of older less efficient units. Unfortunately, the RPM model cannot introduce a competitive solution in local areas if new generation cannot be located in those areas. As such, RPM may simply introduce a new set of market power concerns and mitigation measures that effectively negate the introduction of competitive solutions for local reliability criteria violations.

6. RPM, as an RTO administered resource procurement solution, may be at odds with the Commission's expressed preference for utilizing other market- and transmission- based solutions first. Therefore, FERC should consider RPM in light of its decision in *PJM Interconnection, LLC,* 107 FERC ¶ 61,112 p. 72 (2005), regarding its ruling on local market power mitigation and must run proposals. In this case, FERC stated:

> The Commission believes RTO resource procurement, whether long-term contracts or direct procurement of generation, could, in limited situation*s*, be necessary to provide adequate incentive to generators and the financial community to build new infrastructure in load pockets. *If such actions are taken at all, then they should be only implemented as a backstop mechanism that results when no reasonable market design improvements can address and lead to resolution of the issue. The Commission does not wish to dismiss the use of an auction to address a reliability problem within a load pocket, and supports the reliance on transmission infrastructure as the default solution to resolve local reliability problems.*

Id. at p. 72. [Emphasis supplied.]

The stated goal of this filing is to create incentives for existing units to remain in operation and to create incentives for new units to be located where most needed. (Affidavit of Steven R. Herling, page 10). PJM asserts "there is a growing need to introduce locational factors into the reliability adequacy program

[3]The Potomac River Generating Station is located in a heavily developed area and is critical to maintaining reliability in the District of Columbia and is the subject of an ongoing proceeding in Docket No. EL05-145 in which the District of Columbia Public Service Commission filed an Emergency Petition and Complaint seeking to avert the shutdown of that plant.

for the PJM region". (*RPM Filing Letter,* at 58). PJM accordingly proposes to have its Office of the Interconnection carve up the PJM footprint into Locational Deliverability Areas ("LDA"s). LDAs are defined as "a geographic area within the PJM Region that has limited transmission capability to import capacity to satisfy such area's reliability requirement". (Draft PJM FERC Electric Tariff, Attachment Y, Section 2.36a). It is the nature of capacity market obligations, however designed, to act primarily by creating economic investment incentives for the operation and investment of peaking generation units. [4] While PJM's existing fleet of peaking units consists of a variety of old and new generators burning a variety of fuels, the overwhelming apparent bias towards gas-fired peaking units in the design of RPM and the resulting impact on fuel diversity concerns OPSI's members.

PJM points to a recent increase in retirements of generation units from January 1, 2003 through June 22, 2005. (Affidavit of Steven R. Herling, page 9). As Mr. Herling notes, "[FERC has] recently determined that PJM cannot compel the owners of units proposed for retirement to remain in service; and that such retirements may take effect upon 90 days prior notice."[5] (*Id*., page 9). PJM notes

[4]Examples of RPM's bias towards gas-fired peaking units can be found throughout the filing. When discussing the absence of sufficient revenues for new investment, PJM classifies gas turbines as the most efficient marginal capacity unit. ((*RPM Filing Letter,* at 7). The cost of new entry (the main component of the demand curve design) and the four-year-forward commitment were both chosen based on gas-fired turbines. Although all generators clearing in the auction will receive payments, PJM has stated that keeping older units near the end of their useful lives is an inadequate solution (Affidavit of Steven Herling at 10), leaving newer uneconomic gas-fired turbines the primary target of unit retention.

[5] Apparently referring to *PJM Interconnection, LLC,* 110 FERC ¶ 61,053 (2005) (January 25 Order), *affirmed on rehearing*, *PJM Interconnection, LLC,* 112 FERC ¶ 61,031 (2005) (July 5 Order).

that the other obvious solution to locational generation inadequacy, construction of additional transmission capacity, is a slow and uncertain process. As an aside, OPSI urges the Commission to reassess the appropriateness of the 90 day notice provision. Such a short notice period seems inexplicable in light of the dependency of reliability on existing units and in light of PJM's very complex interconnection process for new generators which goes to extensive lengths to assure that there are no adverse impacts on the integrity of the grid. In many instances, the retirement of a unit can create immediate reliability violations where there are no solutions that can be undertaken within 90 days.

PJM identifies specific reliability problems (defined in terms of projected violations of transmission contingency requirements) in New Jersey, the Delmarva Peninsula and the Baltimore – Washington area. (Affidavit of Steven R. Herling, page 8-9). But while PJM proposes RPM as the solution, and suggests that the alternate approach of fostering improved transmission ties may be expensive, it never really quantifies the cost of RPM in the form of increased capacity payments, increased LMP costs and increased administrative costs. Thus, PJM has not provided the Commission with a fundamental comparison of the cost and benefits of alternatives that would serve as the basis for determining whether this proposal is "just and reasonable" within the meaning of Section 205 of the Federal Power Act, 16 U.S.C. §824d, or whether the existing capacity market and transmission planning process are "unjust, unreasonable, unduly discriminatory or preferential" under Section 206 of the Federal Power Act, 16 U.S.C. § 824e.

The RPM auction process establishes the price of capacity for all generation that is within the limits of the highest accepted offer. To provide what PJM believes to be adequate compensation for peaking units, PJM load serving entities will be forced to pay that compensation to any generation that designates itself a capacity resource. The result is that peaking units that run only a few hundred hours a year will see increased revenues from RPM auction payments, which is the intent, but so too may large base load generators that are not incented at all by RPM, but rely almost wholly upon LMP energy prices both for revenue and for long term price signals. Here too, PJM has not established that RPM is necessary, just or reasonable to address only the limited class of generation retirements and peaking investment that the filing identifies as the source of the problem to be remedied.[6]

B. Transmission Integration

RPM attempts to integrate transmission into a Base Residual Auction in competition with generation and demand response. RPM would be integrated with the existing regional transmission expansion planning process (RTEPP). PJM proposes to use the results of RTEPP to determine local constraints on its electric system, which would then enable PJM to differentiate the value of generating

[6] The Public Utilities Commission of Ohio, Michigan Public Service Commission, Kentucky Public Service Commission, Tennessee Regulatory Authority, Public Service Commission of West Virginia, Virginia State Corporation Commission, Indiana Utility Regulatory Commission, and North Carolina Utilities Commission raise the additional issue that the "opt out" provision of the RPM filing is not just and reasonable because the extra requirements placed upon those that can meet the demonstrable capacity requirement will be assessed additional costs for opting out.

capacity based on location. By timing the forward commitment of capacity resources with RTEPP, could result in a more cost-effective solution to ensure system reliability. Any required capacity additions would reflect transmission upgrades that are either planned or under construction, and transmission and generation would more directly compete with one another.

While an auction concept has merit, OPSI questions whether the RPM model will result in needed transmission improvement and expansion or whether it will instead produce only generation solutions. In many OPSI members' experience in regions where transmission facilities are being planned for construction, the four-year lead time feature of the RPM auction is not a sufficient planning horizon for high voltage transmission facilities and related substations capable of providing greater deliverability throughout the region. A truly competitive generation market requires a comprehensive transmission planning approach. To ensure a fair, cost effective and competitive supply of generation to serve PJM load, transmission expansion plans that focus only on the near-term and ignore the potential for high voltage transmission additions cannot succeed.

OPSI recommends that PJM focus on the development of equitable, region-wide transmission plans that improve deliverability, benefit customers and market participants wherever their location, and fulfill FERC's goal of non-discriminatory access to the market. To that end, it is further recommended that prior to adoption of any major changes to resource adequacy constructs the issue of comprehensive region-wide transmission planning to improve deliverability be addressed.

C. Demand Response

Within RPM (and for any operational electric system) demand response serves two purposes: (1) to free up capacity and energy in the wholesale market and (2) to mitigate market power by increasing the elasticity of demand. OPSI is concerned that as presently structured RPM may fall short in allowing demand response to fulfill its potential.

In some ways RPM does represent an advance over the present capacity construct in that demand response can compete in the Base Residual Auction. However, the four-year ahead commitment for a single year of capacity could serve as a high entry barrier for participation by load. As a result, demand response, via direct participation in the Base Residual Auction, will not have a meaningful impact on delivery-year prices.

PJM has made efforts to ensure that demand response resources can participate by permitting interruptible load to be considered in the forecasts for determining the amount of resources that need to be procured. However, this most likely will allow demand to have only a minimal impact over price on the front-end. Further, PJM has amended RPM to include an Interruptible Load for Reliability ("ILR") program that allows demand resources to avoid RPM costs up to three months in advance of the delivery year. The ILR program will be akin to the current Active Load Management ("ALM") program in terms of qualification and curtailment performance. While this program allows participating load to

avoid RPM costs, it does not provide demand resources a meaningful opportunity to impact delivery year prices.

Having auctions a few months in advance of the delivery year as opposed to a four year ahead forward commitment, would provide demand resources an opportunity to be on an equal basis with supply resources. Doing so would be more consistent with the express goals of FERC to integrate demand dynamically into PJM markets.

As presently structured, Demand Response within the RPM construct will have only a minimal effect on the elasticity of demand and as a result, only a minimal effect in mitigating market power. This lack of impact is especially worrisome as RPM moves to segment the market into smaller areas, LDAs, which may be more prone to the exercise of market power. PJM is developing products such as the Forward-Energy Reserve that may help, but these are not yet fully developed and their potential effectiveness remains speculative. PJM thinks that new load management changes and RPM are complementary and should be worked on simultaneously. However, changes in PJM's load management policies and products should be completed and reviewed by this Commission before undertaking consideration of RPM so that FERC can adequately analyze the effect of the changes on RPM and market power mitigation.

D. Price Volatility for Capacity

PJM states that, "Under PJM's current capacity mechanism, daily and monthly capacity prices have been very volatile."[7] PJM's Figure 1 plots the daily and monthly capacity credit market clearing prices for calendar years 2000-2004 to graphically show the price volatility.[8] PJM states that its current capacity construct contributes to this volatility with prices "very high if there is a shortage of only a few megawatts below the IRM, but drop to zero if there is a surplus of only a few megawatts of excess capacity above the IRM level."[9] PJM argues in its filing that this kind of price volatility makes market participants' estimates of future capacity prices less reliable and hinders the ability of investors to make reasonable predictions of revenue streams.[10] PJM argues that daily and monthly capacity price volatility in conjunction with a policy that provides the option but not the obligation to enter into forward contracts for capacity could result in the significant risk that critical generation would not be contracted by load on a forward basis.[11] PJM argues that modifying the current capacity construct by adding a VRR curve will reduce capacity price volatility and, consequently, the return required by investors resulting in savings in consumer costs.[12]

Price volatility is a function of normal markets. Volatility is one of the factors that induces market participants to engage in long term contracting to

[7] PJM Transmittal Letter at 6.
[8] PJM Transmittal Letter at 7.
[9] PJM Transmittal Letter at 8.
[10] PJM Transmittal Letter at 24.
[11] PJM Transmittal Letter at 22.
[12] PJM Transmittal Letter at 24.

reduce their exposure to such volatility. Although PJM claims there has been historic price volatility in existing capacity markets, this does not of itself establish that there is a problem or that existing capacity markets are dysfunctional.

However, PJM's claims about the effect of volatility should be thoroughly investigated. Consequently, OPSI urges FERC to investigate this issue further in a comprehensive proceeding.

VI. RPM Technical Issues

The concerns raised above have led OPSI to conclude that RPM and all of its components necessitate a comprehensive hearing before the Commission. However, OPSI and its members also have specific reservations related to the technical aspects of RPM as proposed. The following is a preliminary list of items that FERC should review in a comprehensive hearing on RPM:

> **Net Revenue Offset** – The net revenue offset, as described on pages 3-4 of the testimony of Mr. Joseph Bowring, is a complex formula in which PJM determines the cost of new entry of new generation ("CONE") and measures that against actual generator revenues. The difference between the reference resource revenues and the actual recovery of energy, capacity and ancillary service revenues is offset under Attachment Y of the proposed tariff. PJM proposes to calculate the net revenue offset for a delivery year based exclusively on the revenues that would have been earned by the Reference Resource in the PJM energy and ancillary services markets in the six years preceding the time of the determination[13]. Therefore RPM will determine the net revenue offset independent of the actual energy and ancillary services revenues the Reference Resource earns in the delivery year. Moreover, PJM's determination will depend on revenues earned as early as 10 years before the actual

[13] Attachment Y, Section 5.10.a).iv).A)

delivery date because of the four-year ahead nature of the procurement.

This net revenue offset requires closer scrutiny because it may inaccurately substitute PJM's judgment for market forces in determining maximum allowable revenues for affected generators. Consequently, OPSI urges FERC to investigate this issue further in a comprehensive proceeding.

RPM/Hobbs Simulations – To develop the RPM's VRR curve and to support its contention that the VRR curve is likely to produce more reliability and lower overall cost than the current construct, PJM relied on the simulations performed and explained in the Affidavit of Professor Benjamin Hobbs.[14] OPSI has several concerns about the working assumptions used in these simulations including:

– The models rely on the amount of new entry as a deterministic function of recent history of generator profits, which implies that generation asset investors are very naïve and they base their future market condition expectations solely on realized market conditions of the previous years.

– Professor Hobbs assumes in his simulations that, under the current PJM capacity construct (vertical demand curve), the full set of generators are subject to all of the price fluctuations in the capacity market. However, it is reasonable to expect risk averse capacity sellers and risk averse capacity buyers to bilaterally contract to mitigate the price risk, since neither party would be willing to be subject itself to that volatility. Therefore, if there is bilateral contracting in the capacity market, generator capacity revenues will not be zero in surplus years, and revenue volatility will not be as high as Professor Hobbs assumes in his simulations.

In addition, PJM discusses its proposal to incorporate system operational reliability requirements into the capacity procurement mechanism. (Affidavit of Andrew L. Ott pages 30-32). PJM's proposal to incorporate certain operational

[14] PJM Transmittal Letter pp. 62-70.

characteristics into the RPM procurement mechanism is not well supported and merits further investigation.

VII. State Expectation of Future Market Structure

A. Moving Towards an Efficient Electricity Market

To the extent the current capacity market needs revision, any such modifications should be short-term. The perceived need for an administrative construct like the RPM proposal highlights inefficiencies in the PJM wholesale market. Correcting these inefficiencies, which require a long-term vision of what the PJM wholesale power market, should be a prime objective of PJM and its members.

Any long-term vision of the wholesale power market must have at its core an efficient, robust energy market. Universal deliverability is likely to be impractical. Consequently, for the immediate future, there needs to be some form of a capacity construct and an ancillary generating services market. Nevertheless, a long-term objective to consider should be reducing the need for these administrative market constructs to the extent possible. While the alternative proposals are focused on the capacity market, they are also products of a desire for a market construct that is not administrative, but buyer and seller based. Such a market can be efficient in voluntarily matching up buyers and sellers fair (that is without bias), liquid (particularly if the wholesale energy market is large) and can adjust to new developments in the marketplace on a real time basis.

B. Bulk Transmission Needs and Planning

A future robust, large, liquid wholesale power market requires increasing the ability to deliver energy anywhere within the PJM system which is presently not the case. There is significant and growing congestion on the PJM system. Specifically, congestion on the west to east ties, always significant, continues to grow: (1) In 1999 congestion charges were $53 million; (2) By 2002 congestion charges had increased to $430 million; (3) In 2004 congestion charges reached $808 million and were 9% of total PJM billings.[15] Congestion represents a decision to run more expensive generation in lieu of less expensive generation, because transmission is inadequate. OPSI believes that an important goal for PJM and FERC is to eliminate or materially reduce this inefficient operation by upgrading the transmission system.

Congestion charges will likely increase significantly in 2005 as a result of a combination of factors including: (1) Economic and electric load are growing; (2) The differential in fuel prices continues to grow between natural gas and oil, and solid fuels, increasing the incentives to move as much coal generated electricity from Midwest markets east; (3) Old and economically obsolete gas and oil units are retiring; and (4) The PJM footprint has expanded, increasing significantly the coal and nuclear resources available from Midwest sources that might potentially serve eastern markets.

[15] *PJM 2004 State of the Market Report*, Table 6-1, p. 205.

This increased congestion is a forerunner of growing reliability problems. According to recent PJM analyses, PJM generator deliverability tests show many large circuits becoming overloaded in the foreseeable future: (1) Bedington-Black Oak 500 KV, 2009; (2) Mt. Storm-Doubs 500 KV, 2009; (3) Hatfield-Black Oak 500 KV, 2011; (4) Pruntytown-Mt. Storm 500 KV, 2014; (5) Alburtis-Branchburg 500 KV, 2014; (6) Ox - Brister 500 KV, 2015; (7) Elroy-Branchburg 500 KV, 2016.[16] This is only a partial listing of circuits that PJM indicates are failing generator deliverability tests.

To summarize, PJM East to West and South to North interties are in need of major upgrade if robust and reliable wholesale markets throughout the entire PJM footprint are to be attained. Upgrading these interties should be at an equal if not higher priority than reforming the existing capacity markets.

OPSI supports the formation of transmission working groups and the transparency of these proceedings. At this time OPSI reserves final judgment on the ultimate success of these working groups and related PJM initiatives with regard to long-term transmission planning. The end result must be a process including the use of metrics that comprehensively analyzes the full potential benefits of large transmission projects that will significantly contribute to the integration of PJM wholesale power markets.

[16] PJM, "PJM Regional Planning Process, Past and Future," presented at the August 19, 2005 stakeholder meeting, slide 12.

VIII. Conclusion

While locational reliability problems exist in certain areas of PJM, it has not been demonstrated in the filing that the RPM model will have the intended effects on investment that will solve these local reliability problems. At a minimum the FERC should reject the accelerated approval that PJM has requested and set the entire proposal for hearing. With significant concerns having been raised regarding in PJM's RPM proposal and its potential impact on the development of a joint and common market, FERC should conduct a comprehensive proceeding to include, in addition to a thorough review of RPM, consideration of alternative resource adequacy constructs. The stakes involved are considerable, making a rush to judgment on such an important matter ill-advised.

OPSI, representing the collective interests of the state and District commissions within the PJM footprint, is firmly committed to working with FERC, PJM, and other stakeholders over the coming months to develop a workable resource adequacy construct for the region.

WHEREFORE, OPSI respectfully asks that the Commission reject the accelerated approval that PJM has requested and set the entire proposal for hearing.

Respectfully Submitted,

s/ John A. Levin
John A. Levin
Assistant Counsel
Pennsylvania Public Utility Commission
P.O. Box 3265
Harrisburg, PA 17105-3265
(for the Organization of PJM States, Inc.)

Dated: October 19, 2005

Members participating in these comments include:

Delaware Public Service Commission
District of Columbia Public Service Commission
Illinois Commerce Commission
Indiana Utility Regulatory Commission
Kentucky Public Service Commission
Michigan Public Service Commission
New Jersey Board of Public Utilities
North Carolina Utilities Commission[17]
Public Utilities Commission of Ohio
Pennsylvania Public Utility Commission
Tennessee Regulatory Authority
Public Service Commission of West Virginia

Members not participating in these comments include:

Maryland Public Service Commission
Virginia State Corporation Commission

[17] The North Carolina Utilities Commission joins in these Comments, particularly the Conclusions and the relief requested in this filing, except for (1) certain statements in Section V that may be read to suggest that PJM has ultimate responsibility for resource adequacy and that the best way to assure adequate generation and transmission service to the North Carolina retail customers indirectly served by PJM is through an auction process, and (2) certain statements in Section VII which contain various implications about the appropriate long term market structure for PJM that the NCUC is not ready to join at this point. The NCUC further takes the position that resource adequacy is a matter of State, rather than Federal, jurisdiction. Furthermore, in its April 19, 2005, Order in Docket No. E-22, Sub 418, approving Dominion North Carolina Power's application to transfer functional control of its transmission system to PJM, the NCUC imposed certain conditions which, in part, (1) insulate Dominion North Carolina Power's customers from costs arising from the Company's participation in any capacity market administered by PJM, and (2) preserve the NCUC's jurisdiction over Dominion North Carolina Power's transmission and generation, "including integrated resource planning, resource adequacy, and certification."

CERTIFICATE OF SERVICE

I hereby certify that I have this day served the foregoing document upon each party designated on the official service list compiled by the Secretary in Docket Nos. ER05-1410 and EL05-148 in accordance with the requirements of Rule 2010 of the Commission's Rules of Practice and Procedure.

Dated this 19th day of October, 2005.

s/ John A. Levin
John A. Levin, Assistant Counsel
Pennsylvania Public Utility Commission
P. O. Box 3265
Harrisburg, PA 17105-3265
(717) 787-5978
johlevin@state.pa.us

For the Organization of PJM States

Document Content(s)