

UNITED STATES OF AMERICA

FEDERAL ENERGY REGULATORY COMMISSION

Conference on Competition in Wholesale Power Markets

Docket No. AD07-7-000

**TESTIMONY OF ANDREW L. OTT
ON BEHALF OF
PJM INTERCONNECTION, L.L.C.**

May 8, 2007

I appreciate the Commission's holding this Technical Conference and providing this opportunity to discuss the state of competition in wholesale power markets. My name is Andrew Ott and I am Vice President of Markets for PJM. My responsibilities include oversight of the PJM market operations. The PJM wholesale electricity marketplace has been in operation for ten years and over this period the market has evolved into the largest wholesale electricity market in the world. Through this testimony, I will address the Commission's questions directed to this panel regarding our experience with the PJM markets.

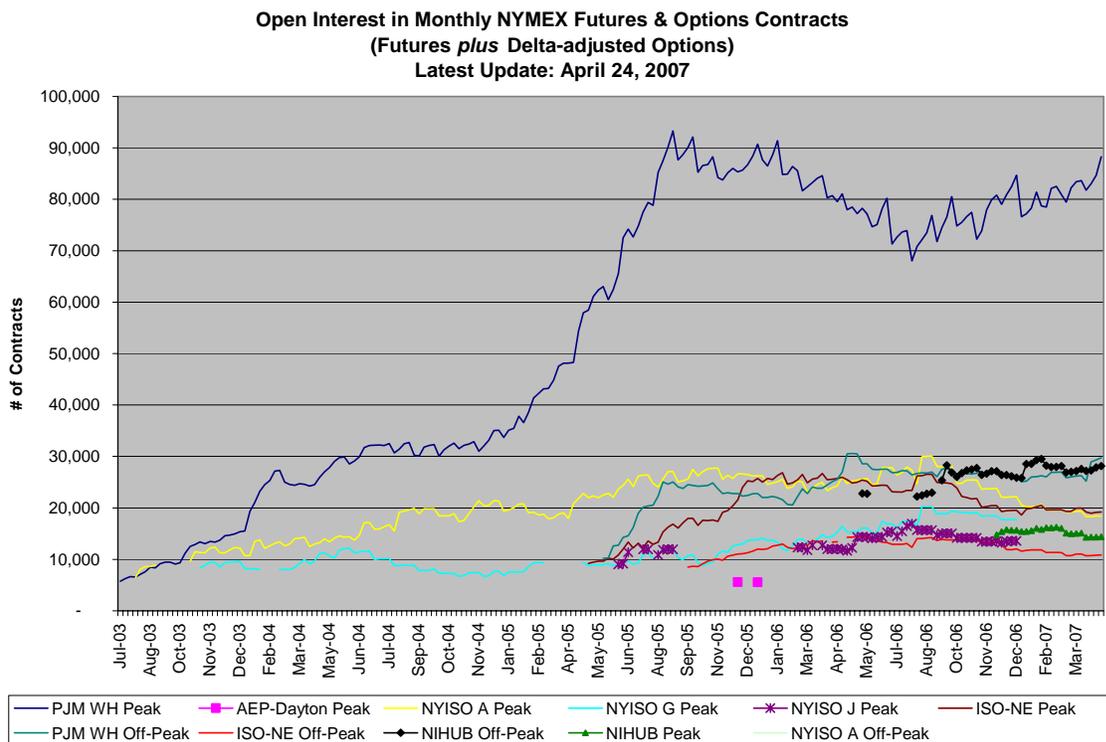
Panel Question: Are forward markets that support bilateral contracting better developed in some organized markets than in others? If so, why?

In regions with LMP-based markets, market participants have access to transparent, accurate price signals that are consistent with and support reliable grid operation. These markets provide both price transparency and information transparency, which in turn provide the capability for market participants to rationalize spot market prices and inspire market confidence. These markets have developed short term liquidity and have significantly lowered participation barriers for all market participants. Figure 1 below shows the trend of total open interest on the following monthly electricity futures contracts that trade on NYMEX: PJM Western Hub Peak, PJM Western Hub Off-Peak, AEP-Dayton Hub Peak, NIHUB Peak, NIHUB Off-Peak, NYISO Zone A Peak, NYISO Zone A Off-Peak, NYISO Zone G Peak, NYISO Zone J Peak, ISO-NE Peak and ISO-NE Off-Peak. These are the only electricity futures contracts that appeared on the COT¹ reports so far. There are other electricity futures contracts (for example, various MISO hub contracts) that trade on NYMEX, but there are not enough traders with reportable positions in these markets; thus these markets are not included in the COT reports so far. Data on these

¹ This data source on futures contracts is the Commitments of Traders ("COT") reports of the Commodity Futures Trading Commission ("CFTC") homepage. In these weekly COT reports, CFTC publishes open interest held by various types of traders on all futures contract markets that have at least 20 traders holding positions above the reporting levels established by the CFTC.

contracts can be accessed from the NYMEX website on a daily basis. Figure 1 illustrates that the most significant forward exchange volume occurs in the organized market areas. I believe the reason for this is that the organized markets provide more price and information transparency, along with independently determined settlement prices that can be used for financially settling any forward contracts, which encourage forward trading activity.

Figure 1 Open Interest in Monthly NYMEX Futures and Options Contracts



For the PJM Western Hub Peak product, the total open interest also includes the delta-adjusted (i.e., futures-equivalent) options contracts. No other futures contracts have corresponding options contracts on NYMEX. The contract size for NYISO monthly peak products is 400 MWh per month, whereas it is 40 MWh per peak day for the other contracts. Thus, PJM (and ISO-NE) monthly peak contracts are slightly larger than twice the size of the NYISO peak contracts, the exact ratio in a given month depending on the number of peak days in the month. For example, one PJM Western Hub January 2008 peak contract entitles (and obligates) the holder of the

contract to 2.5 MW of electricity at the PJM Western Hub at every on-peak hour in the month of January in 2008 at the transacted price.

Figure 2 below shows the open interest on PJM electricity futures for each product and month. These PJM contracts are PJM Western Hub, Northern Illinois Hub and AEP-Dayton Hub; on-peak and off-peak. This illustrates the length of time that the contracts remain open.

Figure 2 – Open Interest on Monthly PJM Futures Contracts in NYMEX

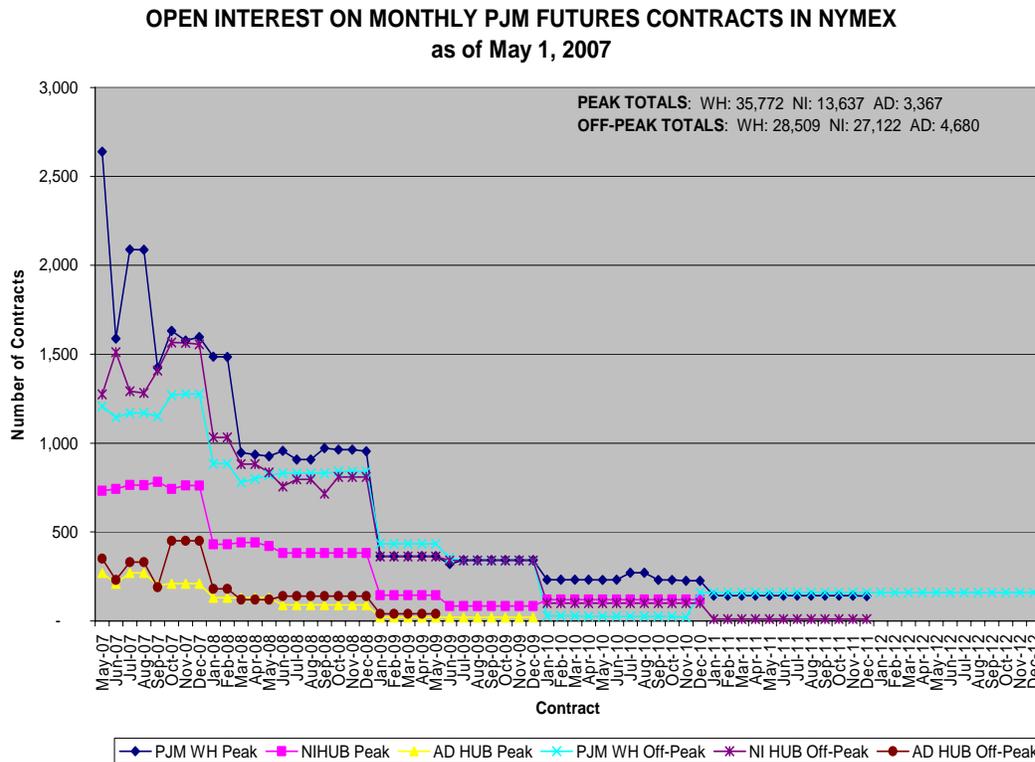


Figure 3 below depicts the monthly trend of average daily trading volume (MWh/day) on ICE² for various peak electricity contracts for next-day delivery. The contracts included in the chart are PJM Western Hub financial and physical and Cinergy Hub financial and physical, as well as

² The IntercontinentalExchange (ICE) is an organized over-the-counter platform where forward electricity contracts are traded. Since the contracts traded on ICE are not formally futures contracts, they are not subject to any reporting requirement and thus open interest information is not available on these. However, ICE publicly reports on its website the traded volume of each electricity contract for next day delivery.

ERCOT, SP-15, Entergy and Southern Companies physical contracts. A financial contract is settled financially against the hourly prices reported by the RTO, whereas a physical contract is settled only by delivery.

Figure 3 – IntercontinentalExchange Day-ahead Peak Contract Average Daily Volume

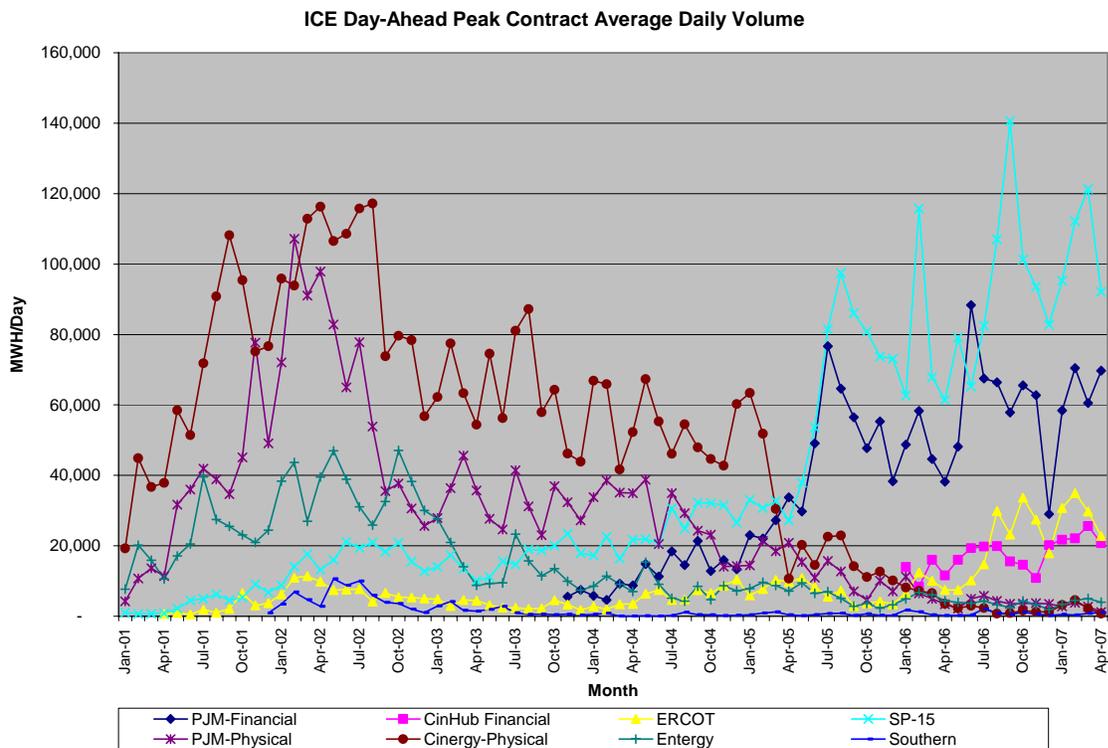


Figure 3 illustrates that the volume for contracts in the organized market areas is higher than the regions where organized markets do not exist. Figure 3 also suggests that the existence of independently determined settlement prices by the RTOs result in a switch from physically settled contracts to financially settled contracts, which is healthy for forward contracting due to the easier and less costly nature of settling financially. For example, volume on the financially settled Cinergy Hub contract took off and the volume on the physically settled Cinergy Hub contract almost disappeared after the introduction of the MISO Day 2 Markets. The same had happened a few years ago with the PJM Western Hub Contract.

Panel Question: What are the significant impediments, if any, to the ability of entities to engage in long-term contracts (e.g., the ability to hedge fuel prices, state restrictions on procurement, Commission policies)?

The potential for upcoming environmental restrictions, including emission cost increases, creates a significant barrier to forward contracting. This barrier exists because buyers and sellers have different perceptions of the forward risk caused by these environmental factors which in turn leads to significant differences in forward price expectations. Additionally, continued debate on the status of wholesale and retail deregulation creates regulatory uncertainty, which is also viewed as a significant forward risk that tends to diminish forward market activity. This type of uncertainty cannot be readily quantified or hedged, which leads to a reduction in forward trading volume. In contrast, the volatility in fuel prices can be generally be managed or hedged through forward contracting.

An additional barrier to long-term contracting is created by short term auction designs for default service in some states. Such short term auctions (i.e. one year) do not provide load serving entities with a load obligation for an extended period, the lack of which tends to encourage them to rely on shorter term markets and the PJM spot market to satisfy their load obligation.

Credit issues and the lack of development of clearing mechanisms in the wholesale market also create potential barriers to long-term contracting especially for smaller market participants.

Some market participants have indicated that the standard forward exchange products that currently exist do not meet their business needs, whereas others believe that current products are sufficient but information is lacking. PJM intends to explore these issues in the coming year to work with stakeholders to better understand the dynamics.

Panel Question: Is the perception of inadequate long-term contracting opportunities a matter of different expectations? That is, do buyers, who are not traditional requirements customers of the seller, expect a traditional “slice of the system” at depreciated embedded-cost-based rates, while sellers expect to sell power from generators – new or old – at market-based rates based on the long run marginal cost of new generation?

Fundamentally buyers have incentive to enter into long term contracts to control their costs and sellers have the incentive to lock in their forward revenue stream through forward contracting.

It does appear that the lack of larger volumes of long term contract activity is due to different expectations by buyers and sellers on a variety of levels. As mentioned above, the sellers perceive the need to demand substantial risk premiums to cover uncertainty related to environmental issues. The buyers do not perceive the same level of uncertainty. As implied by the panel question, certain buyers may have the expectation that forward contract prices should be indexed based on depreciated embedded-cost-based rates verses long run marginal costs and the sellers have the opposite expectation. This issue is not limited to regions with organized markets, it is a universal phenomenon related to the increased uncertainty across the industry, volatility in fuel prices and concerns related to the need for substantial investment in transmission and resource infrastructure to support increasing demand for electricity into the future.

Panel Question: What specific actions, if any, should the Commission take, within its jurisdiction, to remove barriers to long-term contracting? What complementary actions, if any, would others have to undertake?

Recent actions by the Commission and by the PJM stakeholder community to implement long term transmission rights, a longer term transmission planning process and the RPM forward capacity construct have significantly improved the ability for the market to facilitate long term contracting. The implementation of longer-term transmission rights will allow market participants to hedge forward uncertainty related to transmission congestion. The recent enhancements to the PJM planning process will also remove substantial uncertainty on a forward

basis related to transmission bottlenecks. The RPM construct provides incentive for investment in generation, transmission and demand response infrastructure and provides the incentive for load serving entities to take longer term perspective in the management of their load obligation. These actions represent a positive step forward.

PJM has recently announced a series of symposiums designed to encourage the stakeholder community to investigate continued demand response development, the wholesale / retail market interface and issues related to the facilitation of long term contracting. We encourage the Commission to support this effort and engage in the dialogue to explore these issues.

Through the process of developing its strategic report, PJM has also encouraged stakeholder dialogue and has pledged to convene a panel of experts to review credit and clearing mechanisms that could reduce barriers to entry and enhance liquidity. Additionally, the report recommends a review of market information posting and the potential for the development of additional, voluntary forward products to enhance forward market activity. We encourage the Commission to support these efforts.

I would like to thank the Commission for the opportunity to discuss these important issues and I would be happy to answer any questions you may have.