



# Energy Outlook

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## Inside this Issue

- 1 Review of DOER Grant Application
- 2 ECHO<sup>SM</sup> by US Department of Energy
- 2 Building for Success

## Regulatory Arena Markets

- 3 Forward Capacity Auction (FCA) 8
- 3 Regulatory Roundup
- 4 Forward Capacity Market Pay for Performance
- 4 Capacity Zone Definitions
- 4 Sloped Demand Curve
- 5 Winter Reliability
- 5 Winter (2013-2014) by the Numbers
- 6 ENE/ECHO<sup>SM</sup> Contact Information

## ECHO<sup>SM</sup> Hosts Public Power Forum in March

Representatives from twenty municipal systems attended a forum on the Massachusetts' Department of Energy Resources (DOER) recent Grant Application (PON-ENE-2014-027). The meeting was hosted by ECHO<sup>SM</sup> staff and was held on March 18 at Energy New England's offices in Foxborough. The DOER recently announced it is seeking proposals to administer energy efficiency programs for customers of municipal light plants (MLP's). Total funding is \$1.5 million -- all derived from RGGI auction proceeds.

"The purpose of the forum was to share information on this grant program with our valued public power customers, to answer key questions, and to provide support in the areas of project development, submission of proposals and oversight of projects, if requested" said Donna Fitch, Manager of Conservation Services who helped to coordinate the forum in conjunction with Gary Cunningham, Director of Brokering Services & Special Projects for ECHO<sup>SM</sup>. Jane Parenteau, Energy Services Manager, Reading Municipal Light Department (RMLD), also participated in the forum and shared her system's prior grant experience. In 2012, RMLD launched a peak demand reduction program, focused on electric water heaters. The utility deployed internet-based

load controls and successfully targeted some 200 residential accounts. RMLD established a budget of \$270,000 and received \$50,000 in grant funding, Parenteau noted.

In the 2014 DOER grant program, funds will be awarded on a competitive basis, noting key evaluation criteria include program innovation, collaboration with the community, and program impact thru quantifiable energy and/or demand savings. In fact, a minimum of \$25,000 – but not more than 50% of total grant funds – must be allocated to municipal (e.g., schools, public buildings) energy efficiency projects. "The application deadline," noted Cunningham, "is April 30 so there is only a limited window of opportunity for the municipal light plants to prepare. Winning proposals will be selected on May 28, but that date is subject to change."

"The forum was well-received," added Fitch, "and numerous attendees expressed their appreciation to ECHO<sup>SM</sup> staff for hosting the information session."

## Commercial Building Energy Asset Score Program

The U.S. Department of Energy (DOE) Building Technologies Office is developing a Commercial Building Energy Asset Score Program to allow building owners and managers to more accurately assess building energy performance. The Program is designed to identify cost-effective energy efficiency improvements which, if implemented, can reduce energy bills and potentially improve a building's asset value. As part of this process energy costs will be analyzed and detailed evaluations will be performed on lighting, mechanical and refrigeration systems, as well as the building envelope (for insulation and air sealing).

The Asset Score Program will allow comparison of different buildings' as-built energy systems while controlling for differences in building operations. The goal is to help commercial building owners and operators gain insight into the efficiency of their building systems and identify potential areas in need of upgrade. DOE is taking an iterative, phased approach in the development of the scoring system and ECHO<sup>SM</sup> is at the forefront of this nationwide initiative.

As one of the DOE's commercial building sector partners, ECHO<sup>SM</sup> was recognized recently by the Department of Energy. Josh Zaentz, ECHO<sup>SM</sup>'s commercial and industrial auditor and LEED Green Associate, received a certificate in recognition of the enterprises' contributions to the Asset Score initiative.

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## Brendan Sharkey Appointed Manager, New Business Development of ECHO<sup>SM</sup>

Continuing to expand its presence and a growing book of business in Connecticut, ECHO<sup>SM</sup>, the sustainability enterprise of Energy New England, has appointed Brendan Sharkey to the position of New Business Development Manager. Sharkey has been assigned to the Central Region of Connecticut, one of three regions identified within the Constitution State. His territory will include Hartford, Middlesex and Tolland counties, as well as northern portions of New Haven County. Connecticut, along with Massachusetts and Rhode Island, is one of ECHO's primary markets and the enterprise has worked with numerous businesses, municipalities and institutions in the provision of energy procurement, energy efficiency and consulting services over the past decade. In fact, ECHO<sup>SM</sup> remains a leading broker of both energy procurement and energy efficiency services in Connecticut.

A graduate of Georgetown University, Sharkey is also a graduate of the University of Connecticut School of Law. A seven-term legislator, Sharkey currently serves as the Speaker of the House of Representatives for the Connecticut General Assembly. Prior to joining ECHO<sup>SM</sup>, Sharkey served as the principal of an independent firm offering site acquisition, zoning and permitting assistance to corporations nationwide. He also served as Director of Government Operations for the Town of Hamden, CT, where he managed all day-to-day operations for one of Connecticut's larger cities over a five-year period.

Sharkey is also a member of the Connecticut Bar Association, Council of State Governments and the National Council of State Legislatures.

## Regulatory Arena and Markets

### *Forward Capacity Auction (FCA) 8*

On February 4, 2014 Forward Capacity Auction (FCA) 8 opened for capacity supply obligation that would begin delivery on June 1, 2017. The auction opened with a starting price of \$15.82/kW-month and closed in the first round \$15.00/kW-month when a new resource submitted a bid to withdraw from the action. Accordingly new capacity will be paid \$15.00/kW-month and an administratively set price of \$7.02/kW-month will be paid to all existing capacity except for the NEMA zone. In NEMA, due to ISO rule construct, new and existing capacity cleared at \$15.00/kW-month. High lights of the auction are:

- FCA #8 cleared at \$15.00/kW-month system wide for New Resource (approximately 1,370 MW)
- Existing Resources (approximately 24, 885 MW) will be paid \$7.025/kW-month under the Insufficient Competition Rule.
- New and Existing (3, 085 MW) Resources in NEMA will be paid \$15.00/kW-month as ISO's tariff prohibits the clearing price in an import constrained zone from clearing at a price less than rest of pool.
- About 1,030 MW of existing Resource that had elected multi-year supply obligations will be settled at the prices they locked in under previous FCA.
- About 3,330 MW of Self Supply will not be paid under FCA clearing per the rule.
- The auction concluded at the Net Installed Capability Requirement (NICR) of 33,855 MW. However subsequent to the auction a de-list bid that totaled 142 MWs administratively cleared the auction. The 142 MWs shortage will be made up in the reconfiguration auctions.
- 2017-2018 Capacity Commitment Period cost are expected to be in the aggregate \$3.05 Billion, roughly "100%" higher when compared to historical average capacity cost of \$1.06 - \$1.77 Billion per commitment period.

### *Regulatory Roundup*

Currently there are numerous initiatives pending at FERC relative to market design or cost allocation (Order 1000) initiatives. Three filings stand out as most important relative to costs that could impact customers in consumer owned systems. Those three filed changes are related to the capacity market as follows:

- Forward Capacity Market (FCM) Pay-for-Performance (PFP): filed 1.17.14 – response requested by 5.14.14
- Capacity Zone Definitions: filed 3.31.14 - response requested by 4.2.14
- Slope Demand Curve: filed 4.1.14 - response requested by 5.31.14



## *Forward Capacity Market (FCM) Pay-for-Performance (PFP)*

FCM PFP (formerly known as Performance Incentives) was discussed in the December installment of ENE's Energy Outlook. On January 17, 2014 ISO filed both its and NEPOOL's proposed (the NEPOOL Alternative) tariff language, the "Jump Ball Filing", with FERC. There have been many interventions, protests, comments and testimony made on the two filings. ISO has requested FERC issue a ruling no later than May 14, 2014 such that any decision can be factored into market participant Forward Capacity Auction (FCA) 9 Existing and New Qualification packages due to ISO in early June 2014. FCM PFP would lead to potential higher Forward Capacity Market (FCM) prices—exacerbated by retirement of existing capacity resources.

## *Capacity Zone Definitions*

Also highlighted in the December 2013 addition of Energy Outlook, ISO has asked FERC for an April 2, 2014 answer to its filing on zonal definitions. Currently, in the monthly Planning Advisory Committee meetings, ISO is evaluating capacity zone requirements using the criteria and process contained on its March 31, 2014 filing. Thus far the current energy zones are being evaluated as capacity zones with New Hampshire (NH), Vermont (VT) and Western and Central Massachusetts (WCMA) zones being defined as Rest-Of-System Capacity zone for at minimum FCA9. The Southeastern Massachusetts (SEMA) and Rhode Island (RI) are in the process of being evaluated and early indication are leaning toward a SEMA/RI capacity zone, for FCA9, that would be defined in the FCA as import constrained. If in the auction enough existing qualified capacity were to delist from the auction, say as a result of FCM PFP being accepted by FERC, the SEMA/RI capacity zone could bind resulting in higher capacity prices than seen in the Rest-Of-System (much like NEMA in FCA7).

## *Sloped Demand Curve*

On January 24, 2014 FERC approved ISO's Exigent filing on administrative pricing paving the way for existing resources to be paid \$7.02 / kW-month if FCA8 had Insufficient Competition. In that order FERC included a compliance filing requirement that ISO file by April 1, 2014 a slope demand curve for the capacity market. With consultant support ISO brought its Initial Candidate Sloped Demand Curve to the Market Committee for consideration. Various market participants offered their own curves for consideration by ISO and stakeholders. In the end ISO adopted a Northeast Utilities offered Sloped Demand Curve and ISO added to the tariff language a Minimum Offer Review Price (MORP) exemption for state renewable technology resource looking to clear in the forward capacity auction. Certain market participants (Brookfield) offered additional amendments to the ISO proposal looking to mitigate the price suppression the state exemption would have on the auction clearing price, raise the minimum paid in the auction (NextEra), and secure self-supply rights for consumer owned systems (MMWEC).

Alliances were made across the voting sectors to support a Self-supply amendment however in the end the amendment in both the Market and Participant Committee votes did not have enough support

to pass and be part of the FERC filed tariff changes. No amendments passed and therefore ISO un-amended Slope Demand Curve is now on file with FERC.

#### Demand Curve Highlight:

- A market participant can elect to have the FCA clearing price applied to its new capacity for up to 7 years.
- FCA long run average clearing price is expected to average Net Cost of New Entry (CONE) \$11.10 / kW-month.
- If capacity market clears at Net Installed Capacity Requirement, price is \$13.20 / kW-month.
- If the capacity market is short of capacity, about 9% reserve margin, the maximum the market can clear at is \$17.70 / kW-month.
- State sponsored renewable technology resource can clear, on average, up to 200MW per auction of zero price capacity.

### *Winter Reliability*

Winter 2013-2014 presented challenges to ISO and the consumers in New England. Out of an abundance of concern for winter reliability ISO and the New England market participants approved tariff changes allowing ISO to procure oil reserves and new demand response to address winter reliability. FERC approved the ISO filing with a projected cost to New England load of \$75 million for December 2013 – February 2014. The actual cost was approximately \$9 million less due to unit unavailability and units failing to procure fuel.

### *Winter 2013-2014 by the Numbers*

- January ranks among coldest months in recent history
  - 9 days in January were in the coldest 5% of days over past 20 years
- December through February
  - Approximately 43 days where daily average temperatures were well below 20-year historical average
- Winter gas price nearly double when compared to winter 2012-2013
- Oil was the cheaper fuel approximately 57% of winter days
- 64% of average daily real-time prices were above \$100/ MWh, compared to 28% in winter 2012-2013
- 9 Days where the average daily real-time prices exceeded \$250/ MWh
- Energy market costs were \$5.05 billion for winter 2013-2014 compared to \$5.2 billion for all of 2012
- Uplift increased from \$20.4 million in December 2013 to \$73.3 million in January 2014

#### Data Sources

##### **FCA8**

ISO FCA8 Press Release

[http://iso-ne.com/nwsiss/pr/2014/fca8\\_initial\\_results\\_02052014.pdf](http://iso-ne.com/nwsiss/pr/2014/fca8_initial_results_02052014.pdf)

ISO Forward Capacity Auction Filing

[http://iso-ne.com/regulatory/ferc/filings/2014/feb/er14\\_1409-000\\_fca8\\_results\\_filing\\_2-28-2014.pdf](http://iso-ne.com/regulatory/ferc/filings/2014/feb/er14_1409-000_fca8_results_filing_2-28-2014.pdf)

##### **Winter Reliability**

April 1, 2014 FERC Winter Operations Technical Conference- Peter Brandien Presentation



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