

# NYSRC Installed Capacity Subcommittee

Meeting #134

April 4th, 2012

9:30 a.m. – 3:00 p.m.

Meeting Minutes

## Attendees

	Present	Tel
Members / Alternates:		
Mr. Curt Dahl (LIPA), <b>Chairman</b> .....	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Mr. Yuri Fishman (LIPA) .....	<input type="checkbox"/>	<input type="checkbox"/>
Ms. Kathune Zannat (LIPA) .....	<input type="checkbox"/>	<input type="checkbox"/>
Ms. Erin Plasse (CHG&E).....	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Mr. Rich Wright (CHG&E).....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Kelvin Chu (Con Edison) .....	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Mr. Gregory Chu (Con Edison), <b>Secretary</b> .....	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Mr. Syed Ahmed (National Grid).....	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Mr. Bart Franey (National Grid).....	<input type="checkbox"/>	<input type="checkbox"/>
Mrs. Patricia Caletka (NYSEG-RGE) .....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Edward Gilroy (NYSEG-RGE) .....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Steve Jeremko (NYSEG-RGE) .....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Robert Boyle (NYPA).....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Andrea Fossa (NYPA) .....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Rajee Mustafa (NYPA) .....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Bradley Kranz (NRG Energy, Inc.).....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Chris LaRoe (IPPNY).....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Mark Younger (Slater Consulting - Generation Owners) .....	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Mr. Mark Cordeiro (Municipal Power Agency).....	<input type="checkbox"/>	<input type="checkbox"/>
Mr. Michael Mager (Couch White, LLP), <b>EC Chairman</b> .....	<input type="checkbox"/>	<input type="checkbox"/>
Advisers/Non-member Participants:		
Mr. John Adams (NYISO) .....	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Mr. Peter Carney (NYISO).....	<input type="checkbox"/>	<input type="checkbox"/>

- Mr. Frank Ciani (NYISO).....  .....
- Mr. Dave Lawrence (NYISO) .....  .....
- Mr. Greg Drake (NYISO).....  .....
- Mr. Bill Lamanna (NYISO) .....  .....
- Mrs. Kathy Whitaker (NYISO) .....  .....
- Ms. Mariann Wilczek (NYISO) .....  .....
- Ms. Erin Hogan (NYSERDA) .....  .....
- Mr. Ed Schrom (NYPSC) .....  .....
- Mr. Glenn Haringa (GE Energy).....  .....
- Mr. Al Adamson (Consultant).....  .....
- Mr. Frank Vitale (Consultant) .....  .....
- Mr. Arthur Maniaci (NYISO) .....  .....
- Mr. Yannick Vennes (HQ).....  .....
- Mr. Scott Leuthauser (Consultant for H.Q. Services) .....  .....
- Mr. Henry Chao (NYISO) .....  .....
- Mr. Howard Tarler (NYISO) .....  .....
- Mr. Wes Yeomans (NYISO).....  .....
- Mr. Paul Gioia (NYSRC) .....  .....
- Mr. Dana Walters (NYISO) .....  .....
- Ms. Donna Pratt (NYISO) .....  .....
- Mr. David Allen (NYISO).....  .....

Guests Present:

- Mr. Charlie Shafer (AES) .....  .....
- Mr. Dean Ellis (Dynergy).....  .....
- Mr. Jim D'andrea (Transcanada) .....  .....
- Mr. Alan Ackerman (Customized Energy Solutions).....  .....
- Dr. Roy Shanker .....  .....
- Mr. Phil Fedora (NPCC).....  .....
- Mr. Arvind Jaggi (NYISO) .....  .....
- Mr. Frank Francis (Brookfield).....  .....
- Mr. Tom Patrit (EPS) .....  .....
- Mr. Ruben Brown (The E Cubed Co.) .....  .....
- Mr. John Dalwin.....  .....

Mr. Richard Quimby..... .....

Mr. Randy Wyett (NYISO)..... .....

Mr. John Dowling (Luthin Associates)..... .....

Mr. Glenn Haake (Haake Energy Consulting LLC)..... .....

Mr. Matt Renninger (Energy Curtailment Specialist) ..... .....

**1. Honorable Mention**

Al Adamson (NYSRC) mentioned that Len Garber, the father of MAPS/MARS, has received an award for his contribution in the field of multi-area simulation.

**2. Assumption Matrix Review**

Gregory Drake (NYISO) went through the highlighted red sections of the assumption matrix at the meeting and had the following comments:

Load shape will need an alternate shape for this year’s study. Syed Ahmed (National Grid) stated that the language should be “may” since the shape has not been determined at this time. Mr. Ahmed also suggested using “more representative” than “typical”. Mr. Adamson stated that the shape is a base case change.

Mark Younger (Slater Consulting) suggested that if 2002 load shape is not used by the study results, we should not be using 2002 wind shape. John Adams (NYISO) mentioned that composite wind shape from last year was done on simulated 100m tower data. Mr. Drake said that the NYISO will need to check to see if they can get 2006 simulated data and adjust to actual site specific data. Mr. Drake also responded that probabilistic feature will be performed as a sensitivity case.

Mr. Drake stated that the list of retirements (attachment B) is being compiled.

Frank Ciani (NYISO) mentioned that CP-8 is modeling Cross Sound Controllable (CSC) cable more precisely for this year's study. He mentioned that CSC UDRs, if not needed, may go back to New England (Western Massachusetts zone) when the topology is being reviewed and revised. Mr. Younger wondered if New England honored their exports as capacity, since we don't model the exports as New York capacity.

Special Case Resources will be deferred till the later presentation by Mr. Adams.

Chairman Curt Dahl (LIPA) asked that the NYISO provide values for Emergency Operating Procedure (EOP) to be used in the model as soon as possible, since the info is needed by July 1 and the EOP numbers have a long lead time. (AI 134-1)

### **3. 2013 IRM Study Model Development**

A document outlining the various model change initiatives was presented at the meeting. The transmission topology is needed by July 1 for ICS review.

Mr. Ciani reported that for external areas, CP-8 has updated their model with the new summer assessment database. If the winter assessment is not available by the model lockdown date, summer assessment will be used instead.

Pete Carney (NYISO) will provide an environmental impact assessment at the next meeting (AI 134-2)

Chairman Dahl would like the NYISO to provide a guidance of the EDRP value to be included in the model. (AI 133-3)

Mr. Younger wondered if some of the previously mentioned retirements that were dependent on transmission upgrades are on track. Chairman Dahl mentioned that all but one upgrade project were completed.

Mr. Adamson asked if the dates listed on the document can be met. Mr. Drake states that the NYISO will review these dates and provide confirmation if these dates are achievable.

#### **4. IRM Report Template**

Chairman Dahl asked if there were additional comments from the ICS members other than Mr. Adamson's previous comments, which Mr. Ciani mentioned were already incorporated. There were no additional comments at the time.

#### **5. Policy 5 update - PRR 109 (SCR Data Reporting)**

The NYISO had replaced "statistically valid" with "representative". Mr. Younger did not agree with the change since this give the NYISO option to provide unacceptable data. David Allen (NYISO) asked about the basis of statistically valid. Mr. Allen was concerned that if insufficient amount of voluntary data is available, the NYISO may be held accountable due to this rule. Mr. Allen also mentioned that DRIS software allowed the Responsible Interface Party (RIP) to enter the demand response data and the NYISO has no control over when the data is available.

Mr. Allen asked how the Policy 5 relates to the reliability rule. Mr. Adamson said that Policy 5 is a guideline and is not a rule. Policy 5 language will determine the details of the required data. Mr. Allen then commented that the implementation of the data collection already exist, except there may not be enough CBL data due to its voluntary nature. Mr. Younger reiterated that the language is too nebulous. The suggestion originally proposed was to have Arthur Maniaci (or equivalent statistic expert) to provide the statistically significant level of required data, and recommend the action if the data was insufficient.

Chairman Dahl asked what percent of the current RIP reported CBL data. Mr. Allen stated that about 70%/80% reported, although the percentage may change

from call to call. Mr. Younger then asked the NYISO to provide statistics on the CBL sample size. Mr. Allen will bring back the comments to Donna Pratt (NYISO) and others in the NYISO.

Matt Renninger (Energy Curtailment Specialist) represents one of the RIP with some additional comments. ECS would like some protection against non-compliance due to uncontrollable circumstances. This can be accomplished by changing the language to include this sentence: “to the extent that data can be reasonably obtained in a timely manner”. This statement was moved to the section stating RIP responsibility.

## **6. Policy 5 Updates – Outside World Model Data Screening**

Mr. Ciani stated that the wording has been revised for Policy 5 inclusion. The wording referenced using CP-8 assessment model databases.

## **7. APA Method – Fluegge Code**

Mr. Adams mentioned that good progress has been made, but not yet complete. Dr. Channan Singh will need to provide validation for unit 2 and 3. Mr. Adams claimed that Fluegge code results for unit 1 matched with the Dr. Singh’s unit 1 calculation.

Mr. Drake performed a MARS run using the transition rate table from the Fluegge code and the MARS run results showed a 0.5% drop in the IRM. (16.1 to 15.5%) The related LCR values are 83.9 -> 83.5 for NYC and 99.2-> 98.7 for LI.

## **8. Policy 5 Updates – Final IRM Reliability Adequacy Affirmation**

Mr. Adamson pointed out the minor changes in section 5 of Policy 5. The changes that included more than one sensitivity study and “complies with the NYSRC resource adequacy criterion” were accepted.

## 9. Policy 5 Updates – Retirement Assumptions Proposal

Mr. Drake presented the wording for the treatment of mothball/lay-up units to be included in the Policy 5.

The proposal is essentially 2 parts:

The unit will be excluded from the model if owner didn't indicate that the unit will return to service by lock down date or **all** of the following: notice to mothball/layup submitted, not needed for reliability by a study, retirement notice not rescinded, and retirement date is prior or within the study period.

The unit will remain in the model if reliability study was not completed in time or is needed according to the study, or an arrangement is made for the unit not to exit the system, or a return to service date has been accepted by the PSC/TO/NYISO.

Scott Leuthauser asked for specific examples and Mr. Drake pointed out that Ravenswood 3 and 4 plus two others showed that there is no reliability need. Mr. Leuthauser asked how would the NYISO know if the study was complete. Mr. Younger stated that there's no public info released when the study was complete. The NYISO does release the analysis findings to the PSC but they are not released to the general public.

Mr. Leuthauser also asked if the PSC send the NYISO a letter stating their decision on the unit retirement. Chairman Dahl said that the generator owner would receive a letter of their decision. Mr. Yeomans chimed in that PSC would ask the TO and the NYISO to perform reliability studies. The results are sent back to the PSC. The NYISO does not receive any additional response from the PSC.

Mr. Younger cautioned that the PSC may do something different than the NYISO's suggestion from the analysis. He argued that the analysis may show no reliability need but the PSC may ask the unit to stay on. Therefore, we should not exclude the unit from the model.

Henry Chao (NYISO) stated that the NYISO and TO would have know if there is a reliability problem. We should be able to assume that the PSC would use the results of the analysis. Mr. Younger did not agree with the assumption.

Chairman Dahl was concerned that under the current language, Far Rockaway would have been a case where this methodology would not work since Far Rockaway may be needed for reliability based on the study but the need can be addressed by system reinforcement. The workaround agreed upon at the meeting was the inclusion of the phrase "the reliability need could not be addressed by the shutdown date".

Mr. Adamson wondered what the lockdown date meant. The date referred to the model lockdown date. He also suggested that the PSC technical bulletin 185 should be defined or referenced.

Mr. Leuthauser stated that if the system is at IRM 0.1 LOLE criteria, the mothball units will definitely return to service. Since the study is always done at the criteria, the units should all show up in the model.

The NYISO remained in support of excluding the mothball units from the model based on the proposed methodology.

Mr. Younger mentioned, as a separate item, that the 138KV of the Con Edison system may need to be modeled separately as a number of units are coming off the 138KV grid and new units are going on the 345KV system. These new units can't help out the 138KV system on reliability.

Mr. Chao mentioned about deliverability test for new units. Mr. Younger does not believe that passing the deliverability test means that the units will be able to support 138KV system. Mr. Chao said that for example, Astoria units even



though are bottled, can be modeled as a separate bubble. Mr. Adams mentioned that the NYISO topology group does look at this particular type of problem.

Chairman Dahl said in the end that the NYISO should look at the zones when the topology is being reviewed for the study year to address this 138KV system concern.

## **10. Policy 5 Updates – Locational Capacity Requirement Calculation Methodology**

Mr. Adamson stated that the language in Policy 5 should just mention that the NYISO needs to meet 0.1 LOLE for the final IRM value, and should not dictate how the NYISO need to calculate the actual LCR.

Mr. Chao said that when the final IRM is determined, the NYISO need to know the corresponding LCR from the final IRM. Mr. Drake stated that the NYISO need a model that is at 0.1 LOLE.

Dana Walters (NYISO) stated that the wording is not about how to calculate the LCRs, but more of an allocation of responsibility.

Chairman Dahl mentioned that in the past the final IRM has been above the base case so this was never a problem.

Mr. Younger suggested that perhaps the NYISO can issue a technical bulletin that states how the LCR is determined. NYSRC should not dictate how the NYISO perform the LCR determination. Mr. Walters disagreed since the tech bulletin is going to impact NYSRC even though it is a NYISO bulletin.

Upon reviewing the proposed write-up, Mr. Adamson would like the words “safety margin” be removed. Mr. Younger suggested that the entire sentences in 6.1 should be revised so that safety margin and its discussion are removed.

Mr. Adamson wondered how the ICS would be able to determine out of the various sensitivity, which one is used for the final IRM determination.

The NYISO stated that if the Executive Committee decided on a lower IRM that lead to a higher than 0.1 LOLE, we are no longer on the same curve and it is hard to justify that at the LCR working group.

## **11. Load Shape Model Study Scope**

Mr. Maniaci reported that New England zones need to be separated into the MARS subzones. He has also obtained 2006 shape from Glenn Haringa (GE). Also, he needs to add back the SCR data that affected the load. Mr. Maniaci has obtained many of the external area data, including DR information. Scope is not yet complete. He aims to re-run last year's base case with the DR data and the external load aligned. The load shape selection needs to be reviewed. The NYISO may need to run alternative years in the prior year's base case as part of the selection process.

Chairman Dahl asked that the NYISO report the IRM change after the external areas' load are all aligned. Also, the NYISO need to provide guidance on the appropriate shape.

Mr. Maniaci mentioned that there were already some alignments present in the old sensitivity case.

Chairman Dahl asked the deliverables to be MARS runs of those revisited 2006 (reconstituted load shape) and 2008 shape on last year's base case, and recommendation on a "typical" shape, accompanied by a final white paper.(AI 131-1)

## **12. Top-down Estimation of Demand Response Report White Paper Status**

Mr. Maniaci stated that last comments were received on March 23<sup>rd</sup>. He stated that the paper will be available in the near future.

Mr. Younger questioned about the delay. Mr. Allen responded that there were many rounds of review between Ms. Pratt, Mr. Maniaci and himself.

## **13. A Status Report on the Study of the Capacity Value of SCRs**

Mr. Adams presented the preliminary study result of the SCR study at the meeting. The presentation evaluated the capacity value of SCRs, previously referred as Electric Load Carrying Capability (ELCC).

An important finding is that General Electric has identified that the SCRs were modeled as UNRESTRICTED capacity as a percentage of the load, which is influenced by the Load Forecast Uncertainty within the model. This basically translate to 2020MW being modeled instead of the 1800+MW originally intended to be modeled in last year's study.

Chairman Dahl wondered why GE did not pick up this inconsistency during their data scrub. Mr. Adams said that this was not clear until this was identified during this process. Mr. Younger recommended that we should re-run the base case with this corrected and have the results provided to the EC.

Mr. Younger pointed out that 0.111 LOLE included the effects of modulated SCR due to LFU.

On the capacity value curves presented, 4 hour calls assumed that the SCR disappear as soon as the 4 hour period is complete. Based on the 1800 MW penetration, the maximum capacity value on a p.u. basis leveled out just above 0.6. This limitation is due to the "fangs" effect of establishing a new peak past the 4 hour window.

Ms. Pratt will be providing a write-up for the persistence part of the SCR study.  
(AI 134-3)

#### **14. SCR performance in NE & PJM**

Mr. Ahmed presented the various SCR programs currently used in New England. Out of the four programs, two are on-peak programs called On-Peak Demand Resources and Seasonal Peak Demand Resources. The other two are Real Time Demand Response Program and Real Time Emergency Generation Resource.

For the on-peak programs, in June- August, they are expected to respond from 1300 to 1700 hours. They are expected to respond from 1700-1900 from December to January. To answer Mr. Younger's previous concern about number of calls maximum, there are no maximum numbers of interruptions.

#### **15. Action Item follow-up – Wheel Through Capacity issue**

Mr. Yeomans stated that ISO-NE does not allow wheel through in their planning status. The NYISO does not allow wheel through as well. The wheel through will be allowed in the market and the ISOs will be notified. ISO-NE is abiding by the 4-party agreement for planning. Mr. Younger stated that internal modeling of wheel through has not been done. He also suggested a sensitivity study with the wheel through modeled. He stated that sales should not be modeled as capable of bypassing the internal constraints.

Secretary: Gregory Chu

*(Con Edison)*

Next meetings:

- Meeting 135, Wednesday, May 2<sup>nd</sup> at NYISO HQ
  - Meeting 136, Tuesday, May 29<sup>th</sup> at NYISO HQ
  - Meeting 137, Wednesday, June 27<sup>th</sup> at NYISO HQ
  - Meeting 138, Wednesday, August 1<sup>st</sup> at NYISO HQ
  - Meeting 139, Wednesday, September 5<sup>th</sup> at NYISO HQ
  - Meeting 140, Wednesday, October 3<sup>rd</sup> at NYISO HQ
  - Meeting 141, Tuesday, October 30<sup>th</sup> at NYISO HQ
  - Meeting 142, Tuesday, November 27<sup>th</sup> at NYISO HQ
-