

Revised Draft Minutes
New York State Reliability Council, L.L.C. (NYSRC)
Executive Committee
Meeting No. 168 – April 11, 2013
Albany Country Club, Voorheesville, NY

Members and Alternates
in Attendance:

Mike Mager, Esq.	Couch White, LLP (Large Customers' Sector) – Member - Chair
Ray Kinney	New York State Electric & Gas/RG&E – Member - Phone
George Loehr	Unaffiliated Member
William H. Clagett	Unaffiliated Member
Bruce Ellsworth	Unaffiliated Member
Richard J. Bolbrock, P.E.	Municipal & Electric Cooperative Sector – Member
George Smith	Unaffiliated Member
Mayer Sasson	Consolidated Edison Co. of N.Y. – Member
Joe Hipius	National Grid, USA – Member
Arnie Schuff	New York Power Authority – Member
Frank Pace	Central Hudson Gas & Electric – Alternate
Curt Dahl	LIPA – Alternate - Phone
Chris LaRoe	Independent Power Producers of New York (IPPNY) – Member
Chris Wentlent	Constellation – Alternate - Phone*
Paul DeCotis	LIPA – Alternate
Bob Loughney	Couch White, LLC - Alternate
Scott Leuthauser	HQ US - Alternate

Others:

Al Adamson	Consultant & Treasurer - Phone
Paul Gioia, Esq.	Counsel
Roger Clayton	Electric Power Resources, LLC – RRS/RCMS Chair
John Adams	New York Independent System Operator (NYISO)
Carl Patka, Esq.	New York Independent System Operator (NYISO)
Wes Yeomans	New York Independent System Operator (NYISO)*
Edward Schrom	NYS Department of Public Service
Don Raymond	Executive Secretary
Bob Boyle	New York Power Authority – ICS Chairman - Phone

Visitors – Open Session:

Herb Schrayshuen	Power Advisors, LLC
Phil Fedora	Northeast Power Coordinating Council (NPCC)
Sergei Mahnovski	NYC Mayor's Office
Mark Younger	Hudson Energy Economics, LLC*

“*” Denotes part-time

Agenda Items – (Item # from Meeting Agenda)

I. Executive Session – An Executive Session was not requested.

II. Open Session

1.0 Introduction – Chairman Mager called the NYSRC Executive Committee (Committee) Meeting No.168 to order at 9:30 A.M. on April 11, 2013 at the Albany Country Club, Voorheesville, NY. The Executive Committee agreed to re-schedule its June 14, 2013 to Thursday June 13, 2013.

1.1 Meeting Attendees – All Members and/or Alternate Members (or representatives) of the NYSRC Executive Committee were in attendance.

1.2 Visitors – See Attendee List, page 1.

1.3 Requests for Additional Agenda Items – None

1.4 Declarations of “Conflict of Interest” – None

1.5 Executive Session Topics – See item I above.

2.0 Meeting Minutes/Action Items

2.1 Approval of Minutes for Meeting No. 167 (March 7, 2013) – Mr. Raymond introduced the revised draft minutes which included all comments received to date. Following discussion, Dr. Sasson moved for approval of the draft minutes. The motion was seconded by Mr. Bolbrock and unanimously approved by the Executive Committee Members – (13 to 0). The Executive Secretary will post the minutes on the NYSRC website – **AI #168-1.**

2.2 Action Items List – The Committee reviewed the Outstanding Action Items list and accepted removal of the following items:

<u>Action Item #</u>	<u>Comments</u>
80-11, 132-14	The PRR request was withdrawn by the sponsor (NYISO) at the the April 4, 2013 RRS meeting.
162-3	Mr. Smith gave the Defensive Strategies presentation at the March 7, 2013 Executive Committee meeting.
166-2	At the March 7, 2013 Executive Committee meeting, Mr. Gioia indicated that the D & O Policy had been renewed.
166-4	During the March 7, 2013 Executive Committee meeting, Mr. Gioia indicated that the Delaware corporate tax had been paid.

3.0 Organizational Issues

3.1 NYSRC Treasurer’s Report

- i. Summary of Receipts & Disbursements** - Mr. Adamson provided the Summary of Receipts and Disbursements which showed a balance of \$163,000 at the end of March 2013. He reported receipt of two TO payments of ~~\$25~~ 30,000 each in March 2013 toward the 2nd Quarter Call-For-Funds. Also, another payment of ~~\$25~~ 30,000 was received in early April 2013.
- ii. Electronic Transfers** – Mr. Adamson indicated that he met with the TRUSTCO Bank manager about electronic deposits. The manager confirmed that the Bank provides the service at no cost. A bank routing number and NYSRC account number is to be used to make electronic payments. Mr.

Adamson will provide written instructions to the affiliated members – **AI #168-2**. He requested a confirmation email from those TOs using the service indicating the amount of the deposit and its date. He suggested starting electronic deposits as an option with the 3rd Quarter Call-For-Funds. Mr. Adamson, requested members to contact their financial people to ask if they have questions. Policy 3 will need to be revised. Further, he suggested doing the necessary revisions at the end of the 3rd Quarter – **AI #168-3**. The Executive Committee concurred with Mr. Adamson’s suggestions. Mr. Adamson noted that the Executive Committee agreed at its March 7, 2013 meeting to have the Chair, Vice Chair, and Mr. Gioia authorized to sign checks should Mr. Adamson be unavailable. The Bank will provide a form requesting social security #, copies of driver’s license, date of birth, and title of their office.

3.2 Other Organizational Issues -

- i. 2011-12 Biennial Report** – Mr. Adamson introduced the draft 2011-12 NYSRC Biennial Report and requested that comments be provided by April 16, 2013. The final Report is expected to go to the printer in the last week of April 2013 and be available for the Executive Committee by the May 10, 2013 Executive Committee meeting.
- ii. D & O Policy** – Mr. Gioia noted the D & O Policy has been renewed. Preparation will begin shortly on the Liability Policy.
- iii. DSWG Membership** – Mr. Smith requested approval of Jiaxin Ning as a member of the DSWG. Though Mr. Ning works for EnerNex he will be representing himself. Mr. Gioia requested that Mr. Smith send a letter to Mr. Ning confirming that (a) his participation is as a representative of the NYSRC Executive Committee and to facilitate the work of the NYSRC-DSWG and not to represent the interests of his employer, or any other commercial interests, and (b) Mr. Ning agrees to sign the NYSRC’s Code of Conduct Form in his individual capacity and as an Executive Committee appointee to the DSWG – **AI #168-4**.
Mr. Claggett moved that Mr. Ning be appointed a member of the DSWG subject to the requirements expressed by Mr. Gioia. The motion was seconded by Mr. Loehr and unanimously approved by the Executive Committee – (13 to 0).
- iv. Membership Terms** – Mr. Gioia reminded the Executive Committee that the terms of Executive Committee members end on July 31, 2013. The new two year terms will begin August 1, 2013. He will send out a memo describing the election procedures – **AI #168-5**. A notice must be posted with respect to the procedures adopted by the NYISO for appointment of the wholesale sellers, large consumers and municipals/cooperatives representatives. The affiliated members will need to provide the Executive Secretary with the names of their member and alternate for the coming term. Mr. Gioia will solicit the willingness of the unaffiliated members to serve another term and request any additional nominations.
The Officers will serve one term without restriction on the number of terms served. The practice has been for the Chair to serve two one year terms and then the Vice Chair becomes the Chair. Mr. Gioia will solicit (a) the interest of the Vice Chair in becoming the Chair and any other nominations for the Chair and (b) nominations for the Vice Chair position. Voting will take place during the June 13, 2013 Executive Committee meeting.
- v. Other** – Mr. Gioia noted that the annual Audit Letter was submitted to the Auditor on March 7, 2013. and Version 22 of the Reliability Rules was send to the PSC. It is expected that the PSC follows-up by adopting the Rules.

4.0 Installed Capacity Subcommittee Status Report/Issues

4.1 ICS Chairman’s Report – Mr. Boyle reported that ICS met on April 3, 2013. He highlighted the ICS discussion including the following topics:

- (a) 2014-15 IRM Milestone Schedule** – Mr. Boyle expressed the view that the IRM Milestone Schedule is on track with no reason at this time to expect delays.

- (b) **Use of LTE vs. STE Rating** – The ICS has decided to continue using the STE ratings. A written explanation will be available shortly.
- (c) **Model of RMR Contracts** – Mr. Boyle advised that the ICS believes that modeling the RMR contracts is adequately addressed by Policy 5 since RMR units would be operating and any unit needed for reliability is captured by MARS.
- (d) **Capacity Shifting** – ICS has decided to address how capacity should be modeled if it becomes necessary to shift additional capacity into the upper Hudson Valley, Long Island, and/or the NYC area in order to meet a LOLE = .1.
- (e) **Policy 5 Changes** – Mr. Boyle indicated that ICS approved the changes to Policy 5 that will “lock down” data base dates and introduce a new Special Sensitivity Case. Messrs. Boyle and Adamson are preparing an updated Policy 5 document.
- (f) **EFORd Methodology Review** – Mr. Drake (NYISO) estimates that the review of the EFORd methodology will be completed by the May 2013 ICS meeting.
- (h) **New Capacity Zones** – The NYISO reported that the new capacity zone will be the current E, H, I and J zones for LCR calculations. Dr. Sasson confirmed that the new capacity zone will not affect the results of the IRM studies. Mr. Boyle stated that the ICS will stay with the current methodology.

Mr. Boyle added that a draft copy of the “Gold Book” was released on April 10, 2013 and will be finalized by the end of April 2013. Also, Ms. Hogan expects to deliver forecasts for wind and solar projects that will be operational by this coming summer at the May 2013 ICS meeting.

4.2 Other ICS Issues

- i. **Policy 5 Update** – Mr. Boyle described the changes to Policy 5 that will “lockdown” data base dates and provide for a new Special Sensitivity Case (see 4.1e). Mr. Gioia offered additional changes to the Policy’s narrative. Following further discussion, Mr. Bolbrock moved for approval of the Policy 5 changes. The motion was seconded by Mr. Clagett and unanimously approved by the Executive Committee – (13 to 0).

5.0 Reliability Rules Subcommittee Status Report/Issue

- 5.1 **RRS Status Report & Discussion Issues** – Mr. Clayton reported that the joint RRS/RCMS meeting was held on April 4, 2013. Two separate meetings were held, each with its own agenda and minutes. Mr. Clayton introduced the List of Potential Reliability Rule Changes and noted that PRR #8, PF Requirements at a BPS/LSE Boundary, has been removed at the request of the sponsor (NYISO). This does not preclude a new or updated PF rule in the future. Also, Mr. Yeomans noted that in Operations there are now voltage limits at major stations. Dr. Sasson pointed out that since there is now a planning process that looks out 10 years and tests for voltage (unlike when PRR #8 originated) the requirements are not as important.

Mr. Clayton gave a presentation on PRR#113, System Restoration at the March 7, 2013 Executive Committee meeting. The intent of the presentation was to provide the Executive Committee with the concepts being considered by RRS to clarify the restoration plan. After receiving the go ahead by the Executive Committee, Messrs. Clayton and Adamson have developed a template that embodies all of the concepts in the presentation including an implementation plan and compliance elements. The template is currently under review by Mr. Gioia and the NYISO. It is hoped that a recommendation will be available for the May 10, 2013 Executive Committee meeting.

5.2 Status of New/Revised Reliability Rules

- i. **Proposed NYSRC Reliability Rules Revision**
 - a. **List of Potential Reliability Rules (“PRR”) Changes**
 - b. **Status of New/Modified Reliability Rules**
 - 1. **PRRs for EC Final Approval**
 - None

2. PRRs for EC Approval to Post -

- None

3. PRRs for EC Discussion

- None

5.3 NPCC/NERC Standard Tracking

- NERC Standards Development** – Nothing new to report.
- NPCC Standards** – Nothing new to report.

5.4 Other RRS Issues

- Rules Enhancement Plan** – Mr. Clayton indicated that the Rules Enhancement Plan (REP) has been fully reviewed by RRS. RRS is recommended its use as a guide for modifying the Reliability Rules Manual. The Executive Committee concurred.

The REP report contains a description of the four tasks constituting the Plan as follows:

- Task 1 Reorganize the format of the NYSRC Reliability Rules and supporting elements,
- Task 2 Modify NYSRC rules to be consistent with NERC TLP-0001-2 and NPCC Directory 1 changes. Examine other NYSRC rules to ensure consistency with other NERC and NPCC standards and criteria, and modify as required,
- Task 3 Revise the Introduction of the Reliability Rules Manual to recognize Task 1 & 2 changes, and
- Task 4 Upon completion of Tasks 1-3, adopt the revised rules in Tasks 1&2 and incorporate them into a new version of the Reliability Rules Manual.

The appendix contains two examples of the reformatting in Task 1.

An important issue remains, namely to what list of facilities do the NYSRC Rules apply. Mr. Hipius summed up the apparent consensus of the Executive Committee by noting that while the existing NYSRC reliability rules do not explicitly refer to the ATR list, most EC members think of the ATR list as capturing the facilities to which the reliability rules should be applied. He observed that the ATR list is maintained by the NYISO under its procedures, not by the NYSRC. Broadening of the applicability of the reliability rules to include all NERC BES facilities could require the transmission owners to spend tens or possibly hundreds of millions of dollars, and may not yield much in incremental system reliability from the customer's perspective. Mr. Hipius indicated that the applicability of the rules should be driven by an appropriate level of system reliability, not by the ease with which the rules can be written. The Executive Committee suggested that RRS should take this input as guidance as the project to reformat the Reliability Rules proceeds.

The estimated cost of proceeding is: (a) Task 1 (\$5000), (b) Task 2 (\$1000), (c) Task 3 (\$2000).

Completion is expected early next year. The Executive Committee concurred with the implementation of the REP.

- NYISO Reactive Study** – See discussion of PRR #8, Section 5.1.

iii. Hurricane Sandy

- NYISO Report** – Mr. Clayton reported that the NYISO presented ~~RRS~~ a report titled, Hurricane Sandy – A Report from the New York Independent System Operator, to RRS and RCMS. The Report describes its investigation of the chronology and operator actions during the Hurricane, and the level of compliance with applicable rules, standards and criteria for the Bulk Power System, and lessons learned.

Of particular concern to RRS and the Executive Committee are: (1) whether the system was in compliance with the NYSRC Reliability Rules, (2) were there lessons learned, and (3) are there recommendations for future implementation?

During the investigation of the event, the NYISO did not find any conditions that would have resulted in the NYISO being out of compliance with NERC Standards, NPCC Criteria or NYSRC Reliability Rules.

The NYISO, not being an asset owner, did not address specific or distribution related assets. The NYISO noted the following lessons learned associated with system operations:

- Emphasis on gathering and maintaining weather forecasts,
- The regional conference calls hosted by NPCC,
- The recall of transmission and generation outages,
- The process of soliciting operational risk from storm surge to specific generators,
- Tracking the combined effects of tides and storm surge,
- The commitment of additional units in anticipation of storm damage impacts, and
- The scheduling of operations engineering and transmission studies support proved beneficial.

During the event, staff provided prompt analysis of fault duty evaluation for the severely disrupted system configuration.

As a future item, the NYISO will expand data collection to transmission facilities and expand the footprint surveyed for future events. RCMS concluded that the NYISO was in full compliance with NYSRC Measurement F-M2 which requires that in the event of a major emergency, the NYISO reports actions taken and the resulting level of compliance to the NYSRC.

b. NYC Presentation – Mr. Mager introduced Mr. Sergei Mahnovski from the NYC Mayor’s Office where he runs the Energy and Climate Team for Mayor Bloomberg. He presented the results of the early investigatory phase of a study of Hurricane Sandy designed to ultimately provide findings and recommendations to “harden” the NYC critical infrastructure against major storms. The storm surge from Hurricane Sandy was nearly 30% higher than the previous highest level. Furthermore, a large percentage of the NYC critical infrastructure lies well within the 100 year flood zone.

It was agreed that RRS would provide opportunity at the May 2, 2013 RRS for Mr. Mahnovski to present an electric specific interim report to gain expert feedback from RRS. RRS will be reviewing the final report to determine whether there is a basis for changes to the current Reliability Rules.

6.0 Reliability Compliance Monitoring Subcommittee (RCMS) Report/Issues

6.1 RCMS Status Report & Discussion Issues – Mr. Clayton reported that RCMS met on April 4, 2013 following the RRS meeting.

6.2 2013 New York Reliability Compliance Program – Mr. Clayton reported that RCMS found the NYISO to be in full compliance for the following Measurements:

- (a) A-M2, Establish Locational Capacity Requirements,
- (b) C-M2, Reporting Resource DMNC Test Results to the NYISO, and
- (c) C-M3, Reporting Generator Reactive Power Capacity Test Results to the NYISO.

Regarding A-M2, there was lengthy discussion on loss-of-fuel issues. Zack Smith (NYISO) reported that there is a Gas/Electric Coordination Working Group formed to focus on gas concerns. It has a meeting scheduled for April 12, 2013 at the NYISO.

An interregional pipeline study involving the NYISO, ISO-NE, PJM, and Midwest ISO will begin once DOE approves the project management plan and the first phase is scheduled for completion in December 2013. Pipeline and curtailment loss is being addressed.

6.3 Other RCMS Issues – Nothing additional to report.

7.0 Key Reliability Issues

7.1 Defensive Strategies – Mr. Smith introduced Mr. Quoc Le from the NPCC Staff who presented to the Executive Committee a white paper titled, SS-38 Load Modeling. Mr. Le pointed out that for static load models, which have been the preferred model for decades, P and Q at any instance are a function of voltage and frequency at the same instance. The static Model represents resistive and lighting loads and approximates motor loads. The Model includes constant impedance, current, or power, the so called ZIP Model. Dynamic load models represent P and Q at an instant as a function of voltage and frequency at past time instances, and usually, including the present time. These load models provide more detail for motor driven loads which constitutes about 57 % of electricity consumption in the US.

Sensitivity simulations of load were run with the following: (a) A frequency dependent model (LDFR), (b) An Induction motors model (CIM5/CIM6), (c) A Complex model (Combination of load models) (CLOD), and (d) the WECC composite model (CMLD). Most areas within NPCC use the ZIP model as do ERCOT, MRO, PJM, and RFC. FRCC and SERC have used CLOD and CIM5. WECC uses its model which can specifically replicate air conditioning loads. Findings and conclusions from the simulation include:

- (a) Modeling frequency dependent loads should only be used for situations resulting in large frequency deviations,
- (b) ZIP models do not necessarily provide the most conservative result.
- (c) For some event re-constructions, the modeling of dynamic motor loads leads to a more accurate post-fault voltage response vs. the standard static model,
- (d) The WECC composite load model is the most flexible; however, it is the most complex to use.

The recommendations from the SS-38 analysis included: (a) initiating a load survey, (b) investigating load, (c) installing monitoring equipment to aid benchmarking of dynamic load models and (d) continuing investigation of the use of dynamic load models in stability testing.

7.2 DSWG Discussion – Mr. Smith reported that the Defensive Strategies Working Group (DSWG) met on Wednesday, April 10, 2013 at the NYISO. The DSWG reviewed all the Controlled System Separation Study (CSSS) work to-date. It was clearly identified that any system which evolves will be an SPS Type 2. Mr. Quoc Le presented the SS-38 Load Modeling Study. It was recognized that there is a need to investigate at least some load model sensitivity cases. All cases to-date by EnerNex have used the ZIP model. Also, Mr. Jiaxin Ning offered some potential improvements for the CSSS process.

Regarding next steps, the consensus of the DSWG seems to support moving forward. There is a need to perform additional studies to further investigate the exposure of NYCA's current system to a wider set of simulated major disturbances and extending the study to more base conditions representative of the system state during 8760 hours of operation. Also, studies should address potential future systems, i.e. the Indian Point replacement and/or the Governor's Energy Highway.

Mr. Smith indicated that he is continuing to work with the NYISO on a follow-up plan. He noted that to move forward a commitment from the NYISO is necessary for a variety of reasons. Mr. Loehr stated that both the NYISO and the Working Group see a need to step back and take some time to thoroughly grasp all the potential lessons learned before considering a future plan; also, that any future work would have to address load model issues – **AI #168-6**.

8.0 State/NPCC/Federal Energy Activities

8.1 NPCC Board of Directors - Mr. Forte provided a written report summarizing the NPCC Board of Directors (BOD) meeting held on Tuesday March 12, 2013. The meeting addressed a presentation by the NPCC Staff of two Compliance Guidance Statements (CGS-004 and CGS-005) for review. These CGSs are applicable to Regional NERC Standard PRC-002-NPCC-1, Disturbance Monitoring. CGS-004 is deemed effective and was issued by NPCC on March 20, 2013. CGS-004 addresses an interpretation of the regional standard that was previously approved by the Task Force on System Protection (TFSP). Further, it clarifies that the generation 200 MVA threshold specified in Requirement 4 of PRC-002-NPCC-1 also applies to Requirements 5 and 6.

CGS-005 is on hold and under review by NPCC Staff. CGS-005 was developed to provide guidance to Transmission Owners and Generation Owners regarding the use of the term “capability” in PRC-002-NPCC-1. During March 2013, CGS-005 was reviewed with the NPCC Board and the Reliability Coordinating Committee (RCC). Members of both RCC and the Board recommended to NPCC Staff that CGS-005 be reviewed with TFSP to ensure it aligns with TFSP objectives regarding DME applicability.

8.2 NPCC Report – Mr. Fedora reported that NERC just released to the Planning Committee (PC) its draft of Special Assessment which is being sent to the NPCC-RCC for comment. There will be a voting conference call of the PC on April 18, 2013. NPCC expects to complete its review of the 2013 Summer Multi-Area Probabilistic Reliability Assessment and the corresponding more deterministic assessment shortly. After review by the BOD during its teleconference meeting on April 30, 2013, a media event has been scheduled for May 2, 2013 when the results will be released. It will be preceded by a press release.

9.0 State/Federal Energy Activities

9.1 NYISO 2012 Comprehensive System Planning Process (CSPP) – Mr. Adams reported that the NYISO Board of Directors approved the 2012 CRP Report at its March meeting.

9.2 CARIS - A comparison of capacity impacts using the ICAP metric defined in the Tariff and the Unified Method was presented at the March 21, 2013 ESPWG meeting. Also discussed at the April 5, 2013 ESWG meeting was the modeling of the Athens SPS and an assessment of modeling transmission outages. Follow-up discussions will focus on the ICAP metric, Base Case assumptions, including the incorporation of CRP market-based solutions (MBS) and reliability-backstop solutions (RBS) as well as the CO2 emissions allowance cost forecast. Model tuning and benchmarking continue on the Base Case MAPS model.

9.3 Interregional Transmission Studies

i. EIPC Study – The final draft of the Phase II Report was submitted to DOE for review on December 22, 2012. The Report is posted at <http://eipconline.com/Phase II Resources.html>.

ii. IPSAC Study – An IPSAC WebEx meeting was held on April 3, 2013 to consider FERC Order 1000 and the Northeast Planning Protocol. The NYISO Interregional Planning Task Force is meeting bi-weekly to discuss NYISO stakeholder concerns and comments on the Protocol, and to discuss revisions to the NYISO OATT Attachment Y. The FERC Order 1000 filing deadline has been extended to July 10, 2013.

9.4 Other Studies/Activities – Nothing additional to report.

10.0 Other Items

10.1 NYISO Operations Report – Mr. Yeomans provided the NYISO Operations Report for March 2013. The peak load occurred on Monday, March 4, 2013 at 22,319Mws versus the all time winter peak of 25,541Mws on Monday, December 20, 2004. There were no Major Emergencies declared during the month. Alert states were declared on 9 occasions; 1 time for system frequency. There were 0 TLR Level 3s declared for a total of 0 hours. On 15 occasions reserves were activated, 5 for ACE. At 10:28 on March 21, 2013 a RPU/SAR was initiated for loss of 7040 Chateauquay-Massena loaded at 1279Mws into New York. ACE crossed zero and the RPU was terminated at 10:37. The SAR was terminated at 10:55.

10.2 North American Energy Standard Board (NAESB) – Mr. Ellsworth noted that Wes Yeomans has replaced Jim Castle as the NYISO representative to NAESB. Also Mr. Ellsworth recommended three items for review on the NAESB website: (a) a new copyright policy, (b) a cyber security fact sheet, and (c) a report on the coordination with NERC on reliability business practices.

11.0 Visitors' Comments – None

12.0 Meeting Schedule

<u>Mtg.</u> <u>No.</u>	<u>Date</u>	<u>Location</u>	<u>Time</u>
#169	May 10, 2013	Albany Country Club, Voorheesville, NY	9:30 A.M.
#170	June 13, 2013	Albany Country Club, Voorheesville, NY	9:30 A.M.

The open session of Committee Meeting No.168 was adjourned at 2:45 P.M.