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March 27, 2017

SUBMITTED VIA E-TARIFF FILING
Kimberly D. Bose, Secretary
Federal Energy Regulatory Commission
888 First Street, N.E.
Washington, DC 20426

Re: New York Independent System Operator, Inc.
Docket No. ER17-___-000

Dear Secretary Bose:

For filing, attached please find proposed revisions to the Open Access Transmission Tariff (OATT) of the New York Independent System Operator, Inc. (NYISO). Pursuant to Section 31.5.5.4.1 of the NYISO's OATT, any methodology for allocating the costs of transmission facilities, which is prescribed in connection with a Public Policy Requirement (also referred to as a Public Policy Transmission Need), shall be filed pursuant to Section 205 of the Federal Power Act for approval by the Federal Energy Regulatory Commission (Commission).[1] Consistent with the NYISO's Public Policy Transmission Planning Process, the New York Public Service Commission (NYPSC) identified a Public Policy Requirement and cost allocation approach with respect to relieving the persistent transmission congestion across certain electrical interfaces, referred to as Central East and Upstate New York/Southeast New York (UPNY/SENY). The OATT revisions proposed herein provide the NYPSC's cost allocation methodology associated with addressing this AC Transmission Public Policy Transmission Need.[2] In addition, the NYPSC identifies its preferred approach for cost containment that was adopted in connection with the cost allocation methodology.

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1 16 U.S.C. § 824d (2012).

2 The NYISO advises that, upon acceptance by the Commission, the tariff revisions proposed herein will become part of the NYISO OATT under Section 31.8 of Attachment Y. Accordingly, the NYISO is submitting this filing in FERC's e-Tariff system on behalf of the NYPSC solely in its role as the Tariff Administrator. The burden of demonstrating that the proposed tariff amendments are just and reasonable resides with the NYPSC—the sponsoring party. The NYISO takes no position on any substantive aspect of the filing at this time.

The NYPSC respectfully submits that the proposed amendments for allocating costs under the NYISO OATT, as demonstrated by this transmittal letter and the attached affidavits and appendices, are just and reasonable, and should be accepted without suspension or hearing.[3] The NYPSC requests an effective date of May 26, 2017 for the cost allocation methodology and related tariff changes. Alternatively, the NYPSC requests that the Commission limit the issues set for hearing and impose a nominal suspension period. In addition, the Commission should direct that any developer selected to construct the transmission facilities shall apply the cost containment provisions identified herein.

I. BACKGROUND

A. Description of the NYPSC

The NYPSC is a regulatory body established under the laws of the State of New York with jurisdiction, in part, to regulate rates and charges for the sale of electric energy to consumers within the State, as well as the siting of major electric transmission facilities. Accordingly, the NYPSC is a State Commission as defined in section 3(15) of the Federal Power Act.

B. NYISO's Public Policy Transmission Planning and Cost Allocation Process

The NYISO's Public Policy Transmission Planning Process was developed to comply with the Commission's Order No. 1000, which required, in part, the development of a planning process for the consideration of public policy-driven transmission needs.[4] The NYISO's process consists of four main steps, which include: (1) the NYPSC's identification of any Public Policy Requirements/Public Policy Transmission Needs; (2) the NYISO's solicitation of proposed solutions to any identified Public Policy Transmission Needs; (3) the NYISO's evaluation of the viability and sufficiency of proposed transmission and non-transmission solutions to the Public Policy Transmission Needs; and, (4) upon the NYPSC's confirmation of a transmission need based on the viability and sufficiency evaluation, the NYISO's full evaluation and selection of the more efficient or cost-effective transmission project to satisfy the Public Policy Transmission Need.[5]

Consistent with the Commission's directives in Order No. 1000, the NYISO's Public Policy Transmission Planning Process contains a multi-step process to prescribe a cost allocation methodology for regulated transmission solutions that are selected to satisfy needs driven by

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[3] The views expressed herein are not intended to represent those of any individual member of the NYPSC. Pursuant to Section 12 of the New York Public Service Law, the Chair of the NYPSC is authorized to direct this filing on behalf of the NYPSC.

[4] See, Docket No. RM10-23-000, Transmission Planning and Cost Allocation by Transmission Owning and Operating Public Utilities, Order No. 1000 (issued July 21, 2011), reh'g denied, Order No. 1000-A (issued May 17, 2012) reh'g denied, Order No. 1000-B (issued October 18, 2012).

[5] NYISO Public Policy Transmission Planning Process Manual; Section 1.2 (July 2015).

Public Policy Requirements.[6] This process was designed to provide flexibility in prescribing a methodology that would allocate the costs of a selected Public Policy Transmission Project consistent with the Public Policy Requirement driving the identified transmission need and roughly commensurate with the derived benefits.[7] In allocating the costs of the selected Public Policy Transmission Project, the NYISO will use the methodology accepted by the Commission upon completion of this process.[8]

Section 31.5.5.4.1 of the NYISO OATT provides that where the identified Public Policy Requirement prescribes a particular cost allocation methodology, the NYISO will use that methodology, provided the Commission accepts it. Therefore, as the initial step in this process, the NYISO, on behalf of the NYPSC, will file with the Commission any cost allocation methodology prescribed by the NYPSC in a Public Policy Requirement driving the identified transmission need within 60 days of the NYPSC's order setting forth such methodology.[9]

If the Public Policy Requirement does not prescribe a cost allocation methodology or the Developer of the selected Public Policy Transmission Project wants to propose an alternative methodology, the Developer may submit to the NYPSC for its consideration a proposed cost allocation methodology within 30 days after the NYISO's selection of its transmission project as the more efficient or cost effective transmission solution to the identified Public Policy Transmission Need.[10] The NYPSC will have 150 days to review the Developer's proposed cost allocation methodology and to notify the Developer whether the NYPSC supports the methodology.[11] If the NYPSC supports the proposed methodology, the Developer will file it with the Commission under Section 205 of the Federal Power Act within 30 days of the NYPSC's indication of its support.[12]

However, if the NYPSC does not support the Developer's proposed cost allocation methodology, the Developer will have 60 days to work with the NYPSC to develop a mutually agreeable cost allocation methodology.[13] If they agree upon a cost allocation methodology, the Developer will file that methodology with the Commission within 30 days of the conclusion of the 60-day discussion period.[14] If they cannot agree, the Developer will file its preferred

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6 *See generally* Section 31.5.5.4 of the NYISO OATT

7 *See id.; New York Independent System Operator, Inc., et al.*, Compliance Filing, Docket No. ER13-102-000 (October 12, 2012), at p 46.

8 Section 31.5.5.4 of the NYISO OATT.

9 Section 31.5.5.4.1 of the NYISO OATT.

10 Section 41.5.5.4.2 of the NYISO OATT; *see also New York Independent System Operator, Inc., et al.*, Compliance Filing, Docket No. ER13-102-006 (September 15, 2014), at p 15.

11 Section 31.5.5.4.2.1 of the NYISO OATT.

12 Section 31.5.5.4.2.2 of the NYISO OATT.

13 Section 31.5.5.4.2.3 of the NYISO OATT.

14 Section 31.5.5.4.2.4 of the NYISO OATT.

methodology with the Commission within 30 days of the conclusion of the discussion period, which filing will also include the methodology supported by the NYPSC.[15]

In the event that this process does not result in the Commission accepting a cost allocation methodology prescribed by the Public Policy Requirement or proposed by a Transmission Owner or Other Developer, the NYISO will use the default *ex ante* methodology based on load-ratio share to allocate the costs to all Load Zones in the New York Control Area.[16]

C. NYPSC Identification of the Public Policy Transmission Need and Cost Allocation/Containment Approaches

The NYPSC initiated a proceeding in November 2012 to address the need for certain upgrades across the Central East and Upstate New York/Southeast New York portions of the AC transmission system (referred to as the AC Transmission Upgrades).[17] Following subsequent notice and comment procedures, the NYPSC issued a December 2014 Order,[18] attached as Appendix E, which adopted a cost allocation methodology related to the AC Transmission Upgrades, as recommended by its Advisory Staff. In particular, the NYPSC indicated that it:

> supports a "beneficiaries pay" approach for allocating costs, whereby those that derive the benefits of a project should bear the costs. Although a precise calculation of the projected benefits has not been completed, the cost allocation proposed in the Advisory Staff Recommendations is roughly commensurate with the anticipated beneficiaries. The [NYPSC] therefore adopts an approach whereby 75% of project costs are allocated to the economic beneficiaries of reduced congestion, while the other 25% of the costs are allocated to all customers on a load-ratio share. This would result in approximately 90% of the project costs being allocated to customers in the downstate region, and about 10% to upstate customers. This allocation reflects that the primary benefit of the projects will be reduced congestion into downstate load areas, but also recognizes that some benefits accrue to upstate customers in the form of increased reliability and reduced operational costs.

On December 17, 2015, the NYPSC issued an order, which is attached as Appendix F, finding that the need for certain upgrades across the Central East and UPNY/SENY portions of the AC transmission system were being driven by a Public Policy Requirement, as defined under the NYISO OATT.[19] The NYPSC indicated that upgrades to those sections of the transmission

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[15] Section 31.5.5.4.2.4 of the NYISO OATT.

[16] Section 31.5.5.4.3 of the NYISO OATT.

[17] Case 12-T-0502, AC Transmission Proceeding, Order Instituting Proceeding (issued November 30, 2012).

[18] Case 12-T-0502, et al., AC Transmission Proceedings, Order Establishing Modified Procedures for Comparative Evaluation (issued December 16, 2014) pp. 41-42 (December 2014 Order).

[19] Case 12-T-0502, Order Finding Transmission Needs driven by Public Policy Requirements (issued December 17, 2015) (December 2015 Order).

system could produce various benefits for New York, including: 1) enhancing system reliability, flexibility, and efficiency; 2) reducing environmental and health impacts; 3) increasing diversity in supply; 4) promoting job growth and the development of new efficient generation resources upstate; and, 5) mitigating reliability problems that may arise with expected generator retirements. In identifying the AC Transmission Public Policy Transmission Need, the NYPSC affirmed its support of the cost allocation approach identified in its December 2014 Order, which would result in approximately 90% of the project costs being allocated to customers in the downstate region (NYISO Zones G-K), and about 10% to upstate customers (NYISO Zones A-F). However, the NYPSC sought the NYISO's expertise in designing a more granular cost allocation among downstate entities.[20]

As directed under the OATT, the NYISO issued a solicitation on February 29, 2016, seeking potential solutions to resolve the Public Policy Requirement identified by the NYPSC. Subsequently, the NYISO provided the results of its Viability and Sufficiency Assessment to the NYPSC on October 28, 2016, which included the results of the NYISO's analysis of cost allocation methodologies that comport with the NYPSC-identified Public Policy Requirement.

On January 24, 2017, the NYPSC issued an order, attached as Appendix G, which directed the NYISO to proceed to a full evaluation and selection, as appropriate, of the more efficient or cost-effective transmission solution to meet the AC Transmission Public Policy Transmission Need.[21] The NYPSC also adopted the cost allocation methodology outlined in the NYISO's analysis for allocating and recovering the costs of the transmission upgrades. Further, the NYPSC stated that certain incentives are appropriate to ensure accurate cost estimates, whereby:

> [i]f actual costs come in above a bid, the developer should bear 20% of the cost over-runs, while ratepayers should bear 80% of those costs. If actual costs come in below a bid, then the developer should retain 20% of the savings. Furthermore, if the developer seeks incentives from FERC above the base return-on-equity otherwise approved by FERC, then the developer should not receive any incentives above the base return-on-equity on any cost overruns over the bid price. The bid price would therefore cap the costs that may be proposed to FERC for incentives.[22]

II. SUMMARY OF REQUESTED ACTIONS

A. Cost Allocation

The NYPSC requests that the proposed amendments for allocating costs under the NYISO OATT, as identified in clean format in Appendix A and redlined format in Appendix B, should be accepted without suspension or hearing. The NYPSC requests an effective date of

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[20] December 2015 Order.

[21] Case 12-T-0502, et al., Order Addressing Public Policy Transmission Need for AC Transmission Upgrades (issued January 24, 2017) (January 2017 Order).

[22] December 2015 Order, p. 48.

May 26, 2017 for the cost allocation methodology and related tariff changes. Alternatively, the NYPSC requests that the Commission limit the issues set for hearing and impose a nominal suspension period.

B. Cost Containment

The NYPSC requests that any developer selected by the NYISO to construct the transmission facilities for meeting the AC Transmission Public Policy Transmission Need shall be directed to apply the cost containment provisions adopted in the NYPSC's prior orders and discussed herein.

III. THE REQUESTED ACTIONS ARE JUST AND REASONABLE AND CONSISTENT WITH ORDER NO. 1000

As demonstrated in the affidavit of Jerry J. Ancona, attached as Appendix C, the 25%/75% breakdown between overall statewide benefits and more targeted congestion savings, respectively - resulting in approximately 10% of benefits accruing upstate and 90% accruing downstate - provides a just and reasonable approximation to assign costs commensurate with all anticipated benefits. This approach appropriately recognizes that the primary benefits of the AC Transmission Upgrades will be due to congestion relief savings, while also acknowledging that other benefits will accrue to some portions or all of the State, such as: 1) enhanced system reliability, flexibility, and efficiency; 2) reduced environmental and health impacts; 3) increased diversity in supply; 4) promotion of job growth and the development of new efficient generation resources upstate; and, 5) mitigation of reliability problems that may arise with expected generator retirements.

As further discussed in the affidavit of Mr. Ancona, an 80%/20% (ratepayer/developer) risk sharing mechanism provides a balanced incentive among competing interests for meeting the dual objectives of (i) reliable initial cost estimates, and (ii) well managed and cost-controlled project completions. The affidavit of MaryAnn Sorrentino, attached as Appendix D, illustrates a regulatory approach for effectuating this risk sharing and cost containment approach, whereby cost overruns would be addressed by reducing the allowed return on equity on any capital cost overrun. This approach would ensure the return on equity remains within the zone of reasonableness and is just and reasonable.

IV. PROPOSED EFFECTIVE DATE

The NYPSC requests that the Commission accept the tariff amendments to be effective 60 days after this filing, on May 26, 2017, without suspension or hearing. Alternatively, the NYPSC requests that the Commission limit the issues set for hearing and impose a nominal suspension period.

V. CONTENTS OF THE FILING

In addition to this transmittal letter, which provides a detailed description of the approvals requested and the bases for those requests, this filing contains the following components:

Appendix A:	Clean Version of NYISO OATT
Appendix B:	Redlined Version of NYISO OATT
Appendix C:	Affidavit of Jerry J. Ancona, PE
Appendix D:	Affidavit of MaryAnn Sorrentino
Appendix E:	NYPSC Order issued December 16, 2014
Appendix F:	NYPSC Order issued December 17, 2015
Appendix G:	NYPSC Order issued January 24, 2017

VI. REQUESTED WAIVERS

Based on its status as a non-jurisdictional utility, the NYPSC respectfully requests that it be exempt from FERC's filing fees and from compliance with any requirements of section 35.13 of the Commission's regulations not otherwise satisfied by this filing.[23] In the event any additional waivers are required in connection with this filing, the NYPSC respectfully requests that the Commission grant such waivers.

VII. CORRESPONDENCE AND COMMUNICATIONS

The following persons are authorized to receive notices and communications with respect to this Application:

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[23] See, 18 C.F.R. § 381.108 (indicating that "States, municipalities and anyone who is engaged in the official business of the Federal Government are exempt from the fees required by this part and may file a petition for exemption in lieu of the applicable fee").

VIII. CONCLUSION

For the reasons set forth herein, the NYPSC requests that the Commission accept the OATT revisions providing for a cost allocation methodology, to be effective May 26, 2017, and direct that the cost containment provisions to be applied to the recovery of project costs.

Respectfully submitted,

/s/ Paul Agresta

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Attachments: Appendices A-G

Appendix A

31.8 Appendix E – Public Policy Transmission Need Cost Allocation Methodologies

31.8.1 General

Under the Public Policy Transmission Planning Process, Section 31.5.5.4 of Attachment Y to the ISO OATT provides the process for prescribing an alternative to the default cost allocation methodology for Public Policy Transmission Projects that the ISO selected pursuant to Section 31.4.8.2 of Attachment Y to the ISO OATT. This Appendix E contains the Commission-accepted alternative cost allocation methodologies that the ISO will apply instead of the default cost allocation methodology set forth in Section 31.5.5.4.3 of Attachment Y to the ISO OATT for selected Public Policy Transmission Projects.

31.8.2 AC Transmission Public Policy Transmission Need Cost Allocation Methodology

This Section 31.8.2 of Appendix E sets forth the Commission-accepted methodology prescribed by the Public Policy Requirement for allocating costs associated with the Public Policy Transmission Project that the ISO has selected pursuant to Section 31.4.8.2 of Attachment Y to the ISO OATT to satisfy the AC Transmission Public Policy Transmission Need identified by the NYPSC in an order issued on December 17, 2015 ("AC Transmission Project"). For purposes of this Section 31.8.2, the aforementioned costs are collectively referred to as the "AC Transmission Costs."

The AC Transmission Costs to be allocated pursuant to this cost allocation methodology under this Section 31.8.2 of Appendix E will be determined in accordance with Sections 31.4 and 31.5.6.5 of Attachment Y to the ISO OATT. This cost allocation methodology is not applicable to any costs not approved by the Commission.

The ISO will apply the cost allocation methodology set forth under this Section 31.8.2 of Appendix E in the absence of the Commission accepting a different methodology. The ISO will perform the calculations prescribed under this Section 31.8.2 of Appendix E one time no earlier than thirty (30) days following the ISO's selection of the AC Transmission Project; provided, however, if the Developer of the selected AC Transmission Project proposes an alternative cost allocation methodology pursuant to Section 31.5.5.4 of Attachment Y to the ISO OATT, the NYISO will perform the calculations under this cost allocation methodology following the Commission's determination not to accept a methodology proposed in the filing by the Developer, or on behalf of the Developer, of the AC Transmission Project.

The cost allocation methodology set forth under this Section 31.8.2 of Appendix E will use the forecasts and assumptions identified in the Public Policy Transmission Planning Report for the AC Transmission Public Policy Transmission Need as the set of forecasts and assumptions to be used in the cost allocation methodology calculation. This methodology will be applied over a ten-year period beginning with the calendar year following the in-service date for the AC Transmission Project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT. Recovery of the revenue requirements based upon the AC Transmission Costs resulting from this cost allocation methodology will be based on real-time usage data in accordance with NYISO's Billing and Settlements process under the applicable rate schedule in the ISO OATT.

The AC Transmission Costs will be allocated in accordance with the following methodology: (i) 25 percent of the costs will be allocated to all Load Zones in the NYCA based upon load-ratio share, and (ii) 75 percent of the costs will be allocated to those Load Zones that

would economically benefit from the implementation of the AC Transmission Project based on the relative reduction in energy payments.

31.8.2.1 NYCA-Wide Load-Ratio Share Allocation

For purposes of allocating 25 percent of the AC Transmission Costs, the ISO will allocate such costs based on a load-ratio share to each Load Zone in the NYCA. The ISO will use the forecasted coincident summer peak demand contained in the forecasts and assumptions identified in the Public Policy Transmission Planning Report for the AC Transmission Public Policy Transmission Need as the set of forecasts and assumptions to be used in the cost allocation methodology calculation over the ten-year period beginning with the calendar year following the in-service date specified in accordance with Section 31.4.11 of Attachment Y to the ISO OATT, as follows:

$$\text{NYCAWideCostAllocation}_{z} = \left(\frac{\sum_{y=1}^{10} \text{CoincidentPeak}_{z,y}}{\sum_{y=1}^{10} \text{CoincidentPeak}_{\text{NYCA},y}}\right) \text{x } (25\%)$$

Where: z = an individual Load Zone in the NYCA;

y = forecast year 1 through 10, beginning with the calendar year following the in-service date for the AC Transmission Project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT;

$\text{CoincidentPeak}_{z,y}$ = the forecasted coincident summer peak demand in Load Zone z and year y; and

$\text{CoincidentPeak}_{\text{NYCA},y}$ = the forecasted coincident summer peak demand for the NYCA in year y.

31.8.2.2 Economic Beneficiaries Allocation

For purposes of allocating 75 percent of the AC Transmission Costs to the Load Zones that would economically benefit from the implementation of the AC Transmission Project, the ISO will identify those Load Zones and allocate the costs as follows:

31.8.2.2.1 The ISO will identify the Load Zones that would economically benefit from the AC Transmission Project over the ten-year period beginning with the calendar year following the in-service date for the project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT.

31.8.2.2.2 The ISO will measure the present value of the annual zonal LBMP load savings for all Load Zones that would have a load savings net of changes in TCC revenues as a result of the implementation of the AC Transmission Project. For purposes of this calculation, the present value of the load savings will be equal to the sum of the present value of the Load Zone's load savings for each year over the ten-year period beginning with the calendar year following the in-service date for the project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT. The discount rate to be used for the present value analysis shall be the discount rate identified in the Public Policy Transmission Planning Report for the AC Transmission Public Policy Transmission Need. The load savings for a Load Zone will be equal to the difference between the zonal LBMP load cost without the AC Transmission Project and the LBMP load cost with the AC Transmission Project, net of changes in TCC revenues. For the purposes of this methodology under this Section 31.8.2.2.2, the ISO will not account for load served by

generation owned by LSEs or bilateral contracts in calculating a Load Zone's LBMP benefit and, for the purpose of cost allocation, will treat all load as being priced at the zonal LBMP.

31.8.2.2.2.1 The economic beneficiaries will be those Load Zones that experience net zonal benefits measured over the ten-year period beginning with the calendar year following the in-service date for the AC Transmission Project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT.

31.8.2.2.2.2 Reductions in TCC revenues will reflect the forecasted impact of the AC Transmission Project on TCC auction revenues and day-ahead residual congestion rents allocated to Load in each Load Zone, not including the congestion rents that accrue to the ISO's projection of any potential Incremental TCCs that may be made feasible as a result of this project. This impact will include forecasts of: (i) the total impact of the AC Transmission Project on the Transmission Service Charge offset applicable to loads in each Load Zone (which may vary for loads in a given Load Zone that are in different Transmission Districts); (ii) the total impact of that project on the NYPA Transmission Adjustment Charge offset applicable to loads in that Load Zone; and (iii) the total impact of that project on payments made to LSEs serving load in that Load Zone and that hold Grandfathered Rights or Grandfathered TCCs, to the extent that these have not been taken into account in the calculation of item (i) above. These forecasts shall be performed using the procedure described in Appendix B in Section 31.7 of Attachment Y to the ISO OATT.

31.8.2.2.2.3 Estimated TCC revenues from the ISO's projection of any potential Incremental TCCs created by the AC Transmission Project over the ten-year period commencing with the calendar year following the in-service date for the project, as specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT, will be added to the net load savings used for the economic beneficiaries cost allocation determination. Any actual Incremental TCCs ultimately awarded to the AC Transmission Project shall be determined in accordance with the requirements of Section 19.2.4 of Attachment M to the ISO OATT.

31.8.2.2.2.4 The ISO will calculate the net zonal benefits for each Load Zone in the NYCA as the difference between the zonal LBMP load cost without the AC Transmission Project and the zonal LBMP load cost with the AC Transmission Project, net of reductions in TCC revenues, using the following equation:

$$\text{NetZonalBenefits}_{z} = \max\left[0, \sum_{y=1}^{10}\left(\left(\text{LBMP}_{z,y,\text{base}} - \text{LBMP}_{z,y,\text{project}} - \text{TCCRevImpact}_{z,y}\right) \text{x DF}\right)\right]$$

Where: z = an individual Load Zone in the NYCA;

y = forecast year 1 through 10, beginning with the calendar year following in-service date for the AC Transmission Project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT;

$\text{LBMP}_{z,y,\text{base}}$ = forecasted load LBMP cost for Load Zone z in year y assuming the AC Transmission Project is not in service;

$\text{LBMP}_{z,y,\text{project}}$ = forecasted load LBMP cost for Load Zone z in year y assuming the AC Transmission Project is in service;

$TCCRevImpact_{z,y}$ = the forecasted impact of TCC revenues allocated to Load Zone z in year y, calculated using the procedure described in Appendix B in Section 31.7 of Attachment Y to the ISO OATT; and

DF = is the discount factor identified in the Public Policy Transmission Planning Report for the AC Transmission Public Policy Transmission Need.

31.8.2.2.2.5 Any Load Zone that does not have a net zonal benefit is not considered an economic beneficiary and will not be allocated any portion of the 75 percent of the AC Transmission Costs. There will be no "make whole" payments to non-economic beneficiary Load Zones.

31.8.2.2.3 Those Load Zones identified in Section 31.8.2.2 of this Appendix E as economically benefiting from the AC Transmission Project will be allocated 75 percent of the AC Transmission Costs as follows:

$$EconomicCostAllocation_z = \left(\frac{NetZonalBenefits_z}{\sum_{k=1}^{m} NetZonalBenefits_k}\right) x\ (75\%)$$

Where: z = an individual Load Zone in the NYCA;

k = a Load Zone in the NYCA with net zonal benefits as calculated under Section 31.8.2.2.2.4 of this Appendix E; and

m = the total number of Load Zones in the NYCA with net zonal benefits as calculated under Section 31.8.2.2.2.4 of this Appendix E.

38.1.2.3 Zonal Cost Allocation

The NYISO will calculate the proportion of the AC Transmission Costs allocated to each individual Load Zone to be used in the applicable rate schedule under the ISO OATT, as follows:

$$ZonalCostAllocation_z = (NYCAWideCostAllocation_z + EconomicCostAllocation_z)$$

Where: z = an individual Load Zone in the NYCA.

Appendix B

31.8 ~~This section is reserved for future use.~~Appendix E – Public Policy Transmission Need Cost Allocation Methodologies

31.8.1 General

Under the Public Policy Transmission Planning Process, Section 31.5.5.4 of Attachment Y to the ISO OATT provides the process for prescribing an alternative to the default cost allocation methodology for Public Policy Transmission Projects that the ISO selected pursuant to Section 31.4.8.2 of Attachment Y to the ISO OATT. This Appendix E contains the Commission-accepted alternative cost allocation methodologies that the ISO will apply instead of the default cost allocation methodology set forth in Section 31.5.5.4.3 of Attachment Y to the ISO OATT for selected Public Policy Transmission Projects.

31.8.2 AC Transmission Public Policy Transmission Need Cost Allocation Methodology

This Section 31.8.2 of Appendix E sets forth the Commission-accepted methodology prescribed by the Public Policy Requirement for allocating costs associated with the Public Policy Transmission Project that the ISO has selected pursuant to Section 31.4.8.2 of Attachment Y to the ISO OATT to satisfy the AC Transmission Public Policy Transmission Need identified by the NYPSC in an order issued on December 17, 2015 ("AC Transmission Project"). For purposes of this Section 31.8.2, the aforementioned costs are collectively referred to as the "AC Transmission Costs."

The AC Transmission Costs to be allocated pursuant to this cost allocation methodology under this Section 31.8.2 of Appendix E will be determined in accordance with Sections 31.4 and 31.5.6.5 of Attachment Y to the ISO OATT. This cost allocation methodology is not applicable to any costs not approved by the Commission.

The ISO will apply the cost allocation methodology set forth under this Section 31.8.2 of Appendix E in the absence of the Commission accepting a different methodology. The ISO will perform the calculations prescribed under this Section 31.8.2 of Appendix E one time no earlier than thirty (30) days following the ISO's selection of the AC Transmission Project; provided, however, if the Developer of the selected AC Transmission Project proposes an alternative cost allocation methodology pursuant to Section 31.5.5.4 of Attachment Y to the ISO OATT, the NYISO will perform the calculations under this cost allocation methodology following the Commission's determination not to accept a methodology proposed in the filing by the Developer, or on behalf of the Developer, of the AC Transmission Project.

The cost allocation methodology set forth under this Section 31.8.2 of Appendix E will use the forecasts and assumptions identified in the Public Policy Transmission Planning Report for the AC Transmission Public Policy Transmission Need as the set of forecasts and assumptions to be used in the cost allocation methodology calculation. This methodology will be applied over a ten-year period beginning with the calendar year following the in-service date for the AC Transmission Project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT. Recovery of the revenue requirements based upon the AC Transmission Costs resulting from this cost allocation methodology will be based on real-time usage data in accordance with NYISO's Billing and Settlements process under the applicable rate schedule in the ISO OATT.

The AC Transmission Costs will be allocated in accordance with the following methodology: (i) 25 percent of the costs will be allocated to all Load Zones in the NYCA based upon load-ratio share, and (ii) 75 percent of the costs will be allocated to those Load Zones that

would economically benefit from the implementation of the AC Transmission Project based on the relative reduction in energy payments.

31.8.2.1 NYCA-Wide Load-Ratio Share Allocation

For purposes of allocating 25 percent of the AC Transmission Costs, the ISO will allocate such costs based on a load-ratio share to each Load Zone in the NYCA. The ISO will use the forecasted coincident summer peak demand contained in the forecasts and assumptions identified in the Public Policy Transmission Planning Report for the AC Transmission Public Policy Transmission Need as the set of forecasts and assumptions to be used in the cost allocation methodology calculation over the ten-year period beginning with the calendar year following the in-service date specified in accordance with Section 31.4.11 of Attachment Y to the ISO OATT, as follows:

$$\text{NYCAWideCostAllocation}_z = \left(\frac{\sum_{y=1}^{10} \text{CoincidentPeak}_{z,y}}{\sum_{y=1}^{10} \text{CoincidentPeak}_{\text{NYCA},y}} \right) \text{x } (25\%)$$

Where: z = an individual Load Zone in the NYCA;

y = forecast year 1 through 10, beginning with the calendar year following the in-service date for the AC Transmission Project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT;

$\text{CoincidentPeak}_{z,y}$ = the forecasted coincident summer peak demand in Load Zone z and year y; and

$\text{CoincidentPeak}_{\text{NYCA},y}$ = the forecasted coincident summer peak demand for the NYCA in year y.

31.8.2.2 Economic Beneficiaries Allocation

For purposes of allocating 75 percent of the AC Transmission Costs to the Load Zones that would economically benefit from the implementation of the AC Transmission Project, the ISO will identify those Load Zones and allocate the costs as follows:

31.8.2.2.1 The ISO will identify the Load Zones that would economically benefit from the AC Transmission Project over the ten-year period beginning with the calendar year following the in-service date for the project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT.

31.8.2.2.2 The ISO will measure the present value of the annual zonal LBMP load savings for all Load Zones that would have a load savings net of changes in TCC revenues as a result of the implementation of the AC Transmission Project. For purposes of this calculation, the present value of the load savings will be equal to the sum of the present value of the Load Zone's load savings for each year over the ten-year period beginning with the calendar year following the in-service date for the project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT. The discount rate to be used for the present value analysis shall be the discount rate identified in the Public Policy Transmission Planning Report for the AC Transmission Public Policy Transmission Need. The load savings for a Load Zone will be equal to the difference between the zonal LBMP load cost without the AC Transmission Project and the LBMP load cost with the AC Transmission Project, net of changes in TCC revenues. For the purposes of this methodology under this Section 31.8.2.2.2, the ISO will not account for load served by

generation owned by LSEs or bilateral contracts in calculating a Load Zone's LBMP benefit and, for the purpose of cost allocation, will treat all load as being priced at the zonal LBMP.

31.8.2.2.2.1 The economic beneficiaries will be those Load Zones that experience net zonal benefits measured over the ten-year period beginning with the calendar year following the in-service date for the AC Transmission Project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT.

31.8.2.2.2.2 Reductions in TCC revenues will reflect the forecasted impact of the AC Transmission Project on TCC auction revenues and day-ahead residual congestion rents allocated to Load in each Load Zone, not including the congestion rents that accrue to the ISO's projection of any potential Incremental TCCs that may be made feasible as a result of this project. This impact will include forecasts of: (i) the total impact of the AC Transmission Project on the Transmission Service Charge offset applicable to loads in each Load Zone (which may vary for loads in a given Load Zone that are in different Transmission Districts); (ii) the total impact of that project on the NYPA Transmission Adjustment Charge offset applicable to loads in that Load Zone; and (iii) the total impact of that project on payments made to LSEs serving load in that Load Zone and that hold Grandfathered Rights or Grandfathered TCCs, to the extent that these have not been taken into account in the calculation of item (i) above. These forecasts shall be performed using the procedure described in Appendix B in Section 31.7 of Attachment Y to the ISO OATT.

31.8.2.2.2.3 Estimated TCC revenues from the ISO's projection of any potential Incremental TCCs created by the AC Transmission Project over the ten-year period commencing with the calendar year following the in-service date for the project, as specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT, will be added to the net load savings used for the economic beneficiaries cost allocation determination. Any actual Incremental TCCs ultimately awarded to the AC Transmission Project shall be determined in accordance with the requirements of Section 19.2.4 of Attachment M to the ISO OATT.

31.8.2.2.2.4 The ISO will calculate the net zonal benefits for each Load Zone in the NYCA as the difference between the zonal LBMP load cost without the AC Transmission Project and the zonal LBMP load cost with the AC Transmission Project, net of reductions in TCC revenues, using the following equation:

$$\text{NetZonalBenefits}_z = \max\left[0, \sum_{y=1}^{10}\left(\left(\text{LBMP}_{z,y,\text{base}} - \text{LBMP}_{z,y,\text{project}} - \text{TCCRevImpact}_{z,y}\right) \text{x DF}\right)\right]$$

Where: z = an individual Load Zone in the NYCA;

y = forecast year 1 through 10, beginning with the calendar year following in-service date for the AC Transmission Project specified in the Public Policy Transmission Planning Report in accordance with Section 31.4.11 of Attachment Y to the ISO OATT;

$\text{LBMP}_{z,y,\text{base}}$ = forecasted load LBMP cost for Load Zone z in year y assuming the AC Transmission Project is not in service;

$\text{LBMP}_{z,y,\text{project}}$ = forecasted load LBMP cost for Load Zone z in year y assuming the AC Transmission Project is in service;

$TCCRevImpact_{z,y}$ = the forecasted impact of TCC revenues allocated to Load Zone z in year y, calculated using the procedure described in Appendix B in Section 31.7 of Attachment Y to the ISO OATT; and

DF = is the discount factor identified in the Public Policy Transmission Planning Report for the AC Transmission Public Policy Transmission Need.

31.8.2.2.2.5 Any Load Zone that does not have a net zonal benefit is not considered an economic beneficiary and will not be allocated any portion of the 75 percent of the AC Transmission Costs. There will be no "make whole" payments to non-economic beneficiary Load Zones.

31.8.2.2.3 Those Load Zones identified in Section 31.8.2.2 of this Appendix E as economically benefiting from the AC Transmission Project will be allocated 75 percent of the AC Transmission Costs as follows:

$$EconomicCostAllocation_z = \left(\frac{NetZonalBenefits_z}{\sum_{k=1}^{m} NetZonalBenefits_k}\right) x\ (75\%)$$

Where: z = an individual Load Zone in the NYCA;

k = a Load Zone in the NYCA with net zonal benefits as calculated under Section 31.8.2.2.2.4 of this Appendix E; and

m = the total number of Load Zones in the NYCA with net zonal benefits as calculated under Section 31.8.2.2.2.4 of this Appendix E.

38.1.2.3 Zonal Cost Allocation

The NYISO will calculate the proportion of the AC Transmission Costs allocated to each individual Load Zone to be used in the applicable rate schedule under the ISO OATT, as follows:

$$ZonalCostAllocation_z = (NYCAWideCostAllocation_z + EconomicCostAllocation_z)$$

Where: z = an individual Load Zone in the NYCA.

Appendix C

UNITED STATES OF AMERICA
BEFORE THE
FEDERAL ENERGY REGULATORY COMMISSION

New York Independent System Operator, Inc.) Docket No. ER17-___-000

AFFIDAVIT OF JERRY J. ANCONA

I, Jerry J. Ancona, being duly sworn, depose and say:

1. My name is Jerry J. Ancona, and I am employed by the New York State Department of Public Service (NYDPS) as a Power Transmission Planner IV in the Office of Electricity, Gas and Water. My business address is 300 Erie Blvd West, Room A-114, Syracuse, New York 13202.

2. I have been employed by NYDPS since May 2008. My areas of responsibility for NYDPS include the review, analysis, evaluation of and recommendations for bulk electric system capital projects and budgets, power system planning and reliability studies, interpretations and applications of reliability criteria, electric rate case submittals, utility management audits, transmission siting applications under Article VII of the New York Public Service Law (PSL), generator siting applications under Article 10 of the PSL, generator repowerings and retirements, renewable resource development, resource capacity and energy deliverability, power quality issues, electric delivery system losses, wholesale electric market issues and operations, and cost allocation methodologies. Overall, I have experience in electric system planning and operations, demand response programs, reliability analyses, engineering economic evaluations, and wholesale electric market rule design and operations.

3. I hold a Bachelor of Science Degree in Electrical Engineering from Clarkson University, and a Master of Business Administration degree from Syracuse University. I also

completed the Power Technologies Inc. (now PTI, a division of Siemens) Power Systems Engineering Course. Additionally, I am a registered Professional Engineer in the State of New York, and a Life Senior Member of the Institute of Electrical and Electronic Engineers.

4. Prior to joining the NYDPS, I worked for Niagara Mohawk Power Corporation, d.b.a. National Grid, from 1969 until November 2007. During this time, I held various professional and managerial positions in Distribution Planning, Transmission Planning, Generation Planning and Economic Planning as well as System Power Control, ISO Market Design and Development, and Transmission Regulatory Affairs. I was also elected to serve as Vice-Chair and Chair of the New York Independent System Operator, Inc. (NYISO) Management Committee (MC) (i.e., the stakeholder group that shares governance with the NYISO Board of Directors). I also taught several sessions of Engineering Economics (in-house and as an adjunct instructor at the State University of New York, College of Environmental Science and Forestry).

Purpose and Summary of Affidavit

5. The purpose of my affidavit is to support the New York Public Service Commission's (NYPSC) filing for cost allocation and cost containment related to the AC transmission projects that address the Public Policy Transmission Needs identified by the NYPSC.

6. In my affidavit, I: (i) briefly describe the cost allocation methodology adopted by the NYPSC; (ii) provide a rationale for adoption of that methodology as just and reasonable; (iii) briefly describe the cost containment methodology adopted by the NYPSC; and (iv) provide a rationale for adoption of that methodology as just and reasonable.

NYPSC Orders on Cost Allocation

7. In its December 2014 Order,[1] the NYPSC adopted a cost allocation methodology for certain upgrades across the Central East and Upstate New York/Southeast New York portions of the AC transmission system (referred to as the AC Transmission Upgrades), as recommended by its Advisory Staff. In particular, the NYPSC indicated that it:

> supports a "beneficiaries pay" approach for allocating costs, whereby those that derive the benefits of a project should bear the costs. Although a precise calculation of the projected benefits has not been completed, the cost allocation proposed in the Advisory Staff Recommendations is roughly commensurate with the anticipated beneficiaries. The [NYPSC] therefore adopts an approach whereby 75% of project costs are allocated to the economic beneficiaries of reduced congestion, while the other 25% of the costs are allocated to all customers on a load-ratio share. This would result in approximately 90% of the project costs being allocated to customers in the downstate region, and about 10% to upstate customers. This allocation reflects that the primary benefit of the projects will be reduced congestion into downstate load areas, but also recognizes that some benefits accrue to upstate customers in the form of increased reliability and reduced operational costs.

8. In its December 2015 Order,[2] the NYPSC found that the need for the AC Transmission Upgrades were being driven by a Public Policy Requirement, as defined under the NYISO OATT, and provided two clarifications regarding its position on cost allocation. First, to address the Long Island Power Authority's concerns that the cost allocation methodology did not take into account that benefits within downstate New York could vary within that region, the NYPSC agreed that:

> [a] more granular analysis would be beneficial and perhaps more equitable. Therefore, the NYISO will be asked to incorporate such an analysis into the cost

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[1] Case 12-T-0502, et al., AC Transmission Proceedings, Order Establishing Modified Procedures for Comparative Evaluation (issued December 16, 2014) pp. 41-42 (December 2014 Order).

[2] Case 12-T-0502, et al., AC Transmission Proceedings, Order Establishing Modified Procedures for Comparative Evaluation (issued December 17, 2015) pp. 52-53 (December 2015 Order).

> allocation methodology. The NYISO should apply its expertise in designing the more granular analysis to be performed.

Second, with respect to avoided transmission refurbishment costs that accrue from a Public Policy AC Transmission Project, it indicated that:

> [t]he benefits of avoided refurbishment costs accrue to all the beneficiaries of the facility, regardless of who owns the lines. Therefore, no adjustment in cost allocation is to be made to the prescribed cost allocation and recovery methodology adopted herein on the basis that the current owner will avoid future refurbishment costs.

9. In its January 2017 Order, the NYPSC adopted the NYISO's analysis of the recommended cost allocation methodology utilizing, to a large extent, the same methodology the NYISO uses to allocate costs under its economic planning process, known as the Congestion Analysis and Resource Integration Study (CARIS). This methodology has been vetted through the NYISO's stakeholders and approved by FERC as just and reasonable for the allocation of costs for projects resulting in lower system congestion costs. This approach allocates costs to New York Control Area load zones based on the relative reduction in energy payments resulting from the addition of the proposed project to a production cost analysis model. The results of the NYISO's illustrative analysis determined that, overall, 89.5% of the costs would be allocated to downstate zones (G-K) and 10.5% to upstate zones (A-F). The NYPSC found this approach was consistent with a 'beneficiaries pay' approach and reflects the expectation that the primary benefits of the upgrades will be reduced congestion into downstate load areas, while also recognizing that some benefits would accrue to upstate customers in the form of increased reliability and reduced operational costs.[3]

[3] Case 12-T-0502, et al., AC Transmission Proceedings, Order Addressing Public Policy Transmission Need for AC Transmission Upgrades (issued January 24, 2017) pp. 9-10, 20-21 (January 2017 Order).

Rationale for NYPSC Cost Allocation Methodology

10. As stipulated by FERC - that a cost allocation methodology needs to be roughly commensurate with benefits received - the NYPSC asserts that its methodology meets this test and better aligns with anticipated beneficiaries than a pure statewide load ratio share computation, while also remaining transparent and unambiguous. In this regard, benefits from reduced congestion into downstate areas are relatively straightforward to quantify. Clearly, however, other benefits from AC transmission projects will accrue to some portions or all of the State, such as: 1) enhanced system reliability, flexibility, and efficiency; 2) reduced environmental and health impacts; 3) increased diversity in supply; 4) promotion of job growth and the development of new efficient generation resources upstate; and, 5) mitigation of reliability problems that may arise with expected generator retirements.[4] These benefits are generally expected to be less significant compared to congestion relief savings, and simultaneously more difficult to quantify and more qualitative in nature. Nevertheless, they are anticipated to materialize. Consequently, the 25%/75% breakdown between overall statewide benefits and more targeted congestion savings, respectively - resulting in approximately 10% of benefits accruing upstate and 90% accruing downstate - provides a just and reasonable approximation to assign costs commensurate with all anticipated benefits. Furthermore, an attempt to develop a methodology deemed "more accurate" would likely be more contentious, complex, and time consuming with no assurance that it would result in fairer or more robust outcomes.

NYPSC Order Regarding Cost Containment

[4] Case 12-T-0502, Order Instituting Proceeding (issued November 30, 2012), pp. 1-2.

11. In its December 2014 Order,[5] the NYPSC adopted a cost containment methodology with respect to the AC Transmission Upgrades, which would require: (i) detailed and thorough cost estimates submitted as binding bids; and (ii) a risk sharing mechanism for cost overruns or underruns.

12. With respect to bid cost estimates, the NYPSC Order specifies:

> … In particular, each developer should provide credible capital cost estimates for its proposed project, with itemized supporting work sheets that identify all material and labor cost assumptions. The work sheets should include an estimated quantification of cost variance, providing an assumed plus/minus range around the capital cost estimate. Each developer should itemize: material and labor cost by equipment, engineering and design work, permitting, site acquisition, procurement and construction work, and commissioning needed for the proposed solution, all in accordance with Good Utility Practice.
>
> For each of the above cost categories, the developer should specify the nature and estimated cost of all major project components, and estimate the cost of the work to be done at each substation and/or on each feeder to physically and electrically connect each facility to the existing system. The work sheets should itemize, to the extent applicable, all equipment for: (i) the proposed project, (ii) interconnection facilities (including Attachment Facilities and Direct Assignment Facilities), and (iii) System Upgrade Facilities, System Deliverability Upgrades, Network Upgrades, and Distribution Upgrades.[6]

13. With respect to risk sharing, the NYPSC adopted an 80%/20% assignment to ratepayers and the developer, respectively, to help balance the interests of both. More specifically, the NYPSC's December 2014 Order indicates:

> The Commission believes a transmission developer who intends to seek regulated rates should be incented to produce accurate cost estimates in the Article VII process, and then to meet them, particularly since cost is one of the criteria by which projects will be selected or rejected. The developer should be entitled to a reasonable base rate-of-return up to the amount of its estimates, but should not receive compensation at the same level for the actual costs that exceed those estimates. The Advisory Staff recommendation, which recognizes this principle,

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[5] Case 12-T-0502, et al., AC Transmission Proceedings, Order Establishing Modified Procedures for Comparative Evaluation (issued December 16, 2014).

[6] Id. pp 42-43.

> is a reasonable approach for risk-sharing and is therefore adopted. Accordingly, if actual costs come in above a bid, the developer should bear 20% of the cost overruns, while ratepayers should bear 80% of those costs. If actual costs come in below a bid, then the developer should retain 20% of the savings. Furthermore, if the developer seeks incentives from FERC above the base return-on-equity otherwise approved by FERC, then the developer should not receive any incentives above the base return-on-equity on any cost overruns over the bid price. The bid price would therefore cap the costs that may be proposed to FERC for incentives. The Commission believes this approach to be consistent with FERC policies and reflects FERC‟s underlying objectives of balancing customer and utility interests, and FERC's policies encouraging innovative risk and reward sharing arrangements.[7]

Also:

> The Commission also acknowledges that a developer may incur additional, identifiable, and verifiable costs necessary to comply with Commission-imposed modifications and mandates that could not have been reasonably anticipated in formulating the initial bid price. These additional qualifying costs would need to exceed a materiality threshold of 5% above the initial bid price to be recoverable. To encourage further creativity, developers will be allowed to propose alternative risk-sharing proposals if they are submitted in addition to the developer's bid prepared on the above-described partial pass-through model. Developers are also free to propose methods to index their bid prices to changes in the cost of key elements so long as the indexes chosen are governmental in origin and not subject to influence or manipulation by developers.[8]

14. The NYPSC’s December 2015 and January 2017 Orders establishing the AC Transmission Upgrades as a Public Policy Requirement, the NYPSC adopted the same cost containment/risk-sharing approach identified in the December 2014 Order.

15. To adhere to the NYPSC’s preferred cost containment “80%/20%” mechanism to the extent practical - while also adhering to FERC’s policy of allowing full recovery of prudently incurred costs – the affidavit of MaryAnn Sorrentino, attached as Appendix D to this filing, recommends a sliding scale allowed return on equity to effectuate an 80%/20%

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[7] Id. pp 43-44.

[8] Id. p 45.

ratepayer/developer risk sharing, with an override mechanism available to ensure that the overall return on equity remains with the FERC-determined zone of reasonableness. Further discussion below refers to this definition of the 80%/20% risk sharing mechanism.

Rationale for NYPSC Cost Containment Methodology

16. In its approach to adopting a cost containment methodology for AC Transmission Upgrades Public Policy Requirement, the NYPSC balanced the interests of both developers and ratepayers. In this regard, the NYPSC is concerned with two cost aspects: (i) the accuracy of initial cost estimates used in developer and project bid selections; and (ii) once selected and approved, the proficiency in which a specific project is completed and cost controlled.

17. Accurate and thorough initial project cost estimates submitted as binding bids – that properly allow for cost variances and the impacts of potential contingencies – are important because they will help to: (i) encourage that project scope definitions are sufficiently defined and finalized early in the process to reduce future uncertainties; (ii) ensure confidence in the validity of benefit-cost ratios of proposed projects; (iii) assure that the appropriate developer will be selected from among competing developers in a bidding process for a given project; and, (iv) provide better guidance for project management and cost control as the project proceeds. These attributes of higher quality cost estimate bids will serve to protect ratepayers from sub-optimal decisions with respect to project or developer selections, as well as reduce the overall risk of cost overruns. This, in turn, will encourage ratepayers or their representatives to take a more involved interest in the details and validity of project scope definitions and cost estimates. Simultaneously, higher quality cost estimates will help reduce the risk to all bidding developers, resulting from inaccurate or incomplete bids, as well as assisting winning bidders in subsequently avoiding cost overruns.

18. Effectively and efficiently managed projects in which actual project completion costs are reasonably aligned with their original cost estimates – given that actual project procurements, construction, and conditions will often present problems – provide a benefit to both ratepayers and the project's developer. In this instance, ratepayers are more likely to realize a cost-effective outcome originally envisioned in which benefits exceed costs. Correspondingly, the developer: (i) is more likely to be shielded from the financial impact of cost overruns; (ii) may in fact obtain the benefit associated with cost underruns; and, (iii) is more likely to have its reputation enhanced.

19. The requirement for an accurate and thorough binding cost estimate bid coupled with an 80%/20% (ratepayer/developer) risk sharing mechanism (as defined in the affidavit of MaryAnn Sorrentino, and attached as Appendix D to this filing) is intended to provide a balanced incentive among competing interests for meeting the dual objectives of (i) reliable initial cost estimates, and (ii) well managed and cost-controlled project completions. It provides a reasonable combination of a "carrot" and a "stick."

20. A 100% assignment of cost overruns to a developer would be problematic. It would essentially result in two detrimental impacts. First, it would have a chilling effect on some bidders because they would not be willing or able to bear that level of perceived risk. Therefore, they could be precluded from submitting bids, thereby reducing overall competition among qualified bidders. Second, a smaller pool of interested bidders – sensing the reduced competition – could submit bids with inflated risk premium adders. Both effects would have the impact of increasing costs of the available bids received. Admittedly, a corresponding assignment of 100% of cost underruns to developers would be somewhat enticing, but would not likely offset the potential detrimental impact of the higher project costs brought about by higher

perceived risk and reduced competition. Additionally, 100% of cost overruns assigned to developers would place intense pressure on developers for project management proficiency; but in extreme circumstances, it could tempt developers to "cut corners" resulting in reduced quality and/or performance of completed projects.

21. Alternately, a 100% assignment of cost overruns to ratepayers would be problematic as well. Developers would have a reduced incentive to submit accurate and thorough cost estimates in their bids. In fact, a tendency would exist for developers to submit unrealistically low cost bids which would essentially be non-binding. This could potentially result in two deleterious effects: (i) computations of project benefit-cost ratios and economic viability could be flawed such that uneconomic projects may be selected; and/or (ii) comparisons between competing developers could be inconsistent and erroneous such that a less suitable candidate could be chosen to proceed with a given project.

22. Also, under a 100% assignment of project cost overruns (and underruns) to ratepayers – except for a desire by a developer to maintain or enhance its reputation – little incentive would exist for the developer to abide by its bid cost. Consequently, a developer would be less likely to: (i) implement a highly disciplined, effective and efficient project management and cost control process; (ii) actively seek creative innovations and improvements in its approach; and, (iii) provide incentives to its employees for better performance and diligent cost control. Under these circumstances – although 100% of cost underruns would be designated to ratepayers – actual cost underruns would be exceedingly unlikely to occur. Additionally, although only prudently incurred cost overruns would be compensated for by ratepayers under 100%/0% ratepayer/developer risk sharing, as discussed further in Paragraph 22 below, the prudency review process would likely be complex and costly.

23. Compared to 100% of cost overruns assigned to either ratepayers or developers, an 80%/20% (ratepayer/develop) risk sharing mechanism reduces the likelihood of expensive and prolonged litigated disputes involving project costs. Cost overruns can result from developer mismanagement, subsequent project scope changes made at the behest of ratepayers, changes imposed by outside forces, and random events; or by a combination of some or all of these factors. In actuality, root causes of cost overruns may be complex and difficult to identify. Thus, if a prudency review were to be invoked, the determination of prudently versus imprudently incurred costs associated with cost overruns would be challenging. In this context, an *a priori* 80%/20% (ratepayer/developer) risk sharing mechanism will help serve to both reduce cost overruns, and reduce the need and expense of litigation associated with cost overruns.

24. With respect to the 80%/20% split in risk sharing between ratepayers and the developers respectively, it is reasonable to assign the higher proportion of risk to ratepayers because: (i) presuming a project's anticipated benefit-cost ratio is reasonably above 1.0 – thereby providing a relatively secure margin of safety – ratepayers would stand to realize benefits that are still comfortably above costs, provided actual cost overruns are not excessive; and, (ii) a developer's profit margins may be limited or truncated in the case of cost overruns. In the extreme, assigning a higher percentage of risk to developers could lead to a situation where cost overruns might entirely eliminate a developer's profits, in which case the developer might be tempted to abandon the project; this would jeopardize the ratepayer benefits anticipated to materialize from the completion of the project. The 80%/20% ratepayer/developer risk sharing split provides an appropriate balance between competing and conflicting interests. A 90%/10% ratepayer/developer risk sharing would drive closer to the disadvantages inherent with a

100%/0% split. Alternately, a 60%/40% or 50%/50% ratepayer/developer split would drive closer to the disadvantages inherent with a 0%/100% split.

25. With respect to applying a bandwidth to project cost risk sharing, such as plus and minus 10% of a cost estimated bid – so that a developer would receive full payment for a cost overrun up to 10% above the bid price, and would capture 100% of savings from a cost underrun down to 90% of the bid price – this would be tantamount to making the bid price actually 110% of the "original bid." Thus, in this example, a cost overrun would be defined as a final project cost 10% above the bid price; a cost underrun would be defined as a final project cost 10% under the bid price. While admittedly, this approach would provide a certain level of incentives for a developer to control costs, it would put ratepayers at risk of incurring a 10% cost overrun with no recourse. Furthermore, ratepayers would receive no benefit from cost underruns unless final project costs were 10% below the bid cost.

26. Providing a different return on equity for all cost overruns and underruns (i.e., a lower return on equity for an overrun portion, and a higher return on equity for an underrun portion) has been proposed by some as a project cost risk sharing mechanism. This approach would provide a return on equity with adders for a project's bid price, a lower return on equity for the portion of a final project cost above the bid price, or a higher return on equity for the portion of a final project cost below the bid price. In comparison to an 80%/20% (ratepayer/developer) project cost risk sharing (as recommended in the affidavit MaryAnn Sorrentino, attached as Appendix D), that proposal would: (i) burden ratepayers with greater project cost risks; (ii) shield developers more from project cost risk; and, (iii) weaken the incentive for a developer to impose discipline and innovation on project management and cost control.

27. This concludes my affidavit.

ATTESTATION

I am the witness identified in the foregoing affidavit. I have read the affidavit and am familiar with its contents. The facts set forth herein are true to the best of my knowledge, information, and belief.

Jerry J. Ancona, PE
Dated: March 27, 2017

Subscribed and sworn to before me this 27th day of March, 2017

Notary Public

KAREN M. DODGE
Notary Public, State of New York
No. 01DO6067882
Qualified in Onondaga County
Commission Expires Dec. 17, 2017

My Commission expires:

Appendix D

UNITED STATES OF AMERICA
BEFORE THE
FEDERAL ENERGY REGULATORY COMMISSION

New York Independent System Operator, Inc.) Docket No. ER17-___-000

AFFIDAVIT OF MARY ANN SORRENTINO

I, Mary Ann Sorrentino, being duly sworn, depose and say:

1. My name is Mary Ann Sorrentino and I am employed by the New York State Department of Public Service (NYDPS) as a Utility Supervisor in the Office of Electric, Gas and Water. My business address is Three Empire State Plaza, Albany, New York, 12223-1350. I received a Bachelor of Science Degree in Chemical Engineering from Clarkson University in 1991. I have testified numerous times before the New York State Public Service Commission. My current responsibilities with the NYDPS include: the oversight and review, analysis, evaluation and recommendation of cost allocation and rate design studies pertaining to electric utilities in New York State; review and recommendations related utility asset transfers, and oversight and review of tariff modifications of New York electric utilities.

Purpose and Summary of Affidavit

2. In this affidavit, I will: (i) describe the New York Public Service Commission (NYPSC) proceeding to examine upgrades across the Central East and Upstate New York/Southeast New York portions of the Alternating Current (AC) transmission system (referred to as the AC Transmission Upgrades); and, (ii) present a method to implement the NYPSC preferred cost-containment incentive mechanism, to the extent practicable.

NYPSC AC Transmission Upgrades Proceeding

3. By NYPSC Order issued in November 2012, the NYPSC initiated the AC Proceeding. The NYPSC indicated that studies performed by the New York Independent System Operator, Inc. (NYISO) identified persistent congestion on AC electric transmission facilities located in the corridor that traverses the Mohawk Valley, the Capital, and the Lower Hudson Valley regions of New York State. The NYPSC solicited written public Statements of Intent from developers and transmission owners proposing projects to increase the transfer capacity through the congested transmission corridor. The Statements of Intent were to include preliminary cost estimates for the project.[1]

4. In April 2013, the NYPSC required NYDPS Staff to develop a straw proposal addressing mechanisms for allocating risk between developers and ratepayers, among other things.[2] The NYDPS straw proposal, which was filed in July 2013, identified multiple risk sharing methods. In August 2014 the NYPSC issued a notice seeking comments on NYPSC Advisory Staff recommendations in the AC Proceeding. NYPSC Advisory Staff recommended that the NYPSC "require applicant bids to include risk sharing of cost overruns or underruns (80/20) between ratepayers and independent developers/investor-owned utility shareholders."

5. In December 2014, the NYPSC issued an Order addressing developer cost estimates in its transmission line siting process under Article VII of the New York Public Service

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1 Case 12-T-0502, AC Transmission Proceeding, Order Instituting Proceeding (issued November 30, 2012).

2 Case 12-T-0502, AC Transmission Proceeding, Order Establishing Procedures for Joint Review Under Article VII of the Public Service Law and Approving Rule Changes (issued April 22, 2013).

Law, since cost was a criterion by which projects would be selected or rejected. The NYPSC indicated:

> The [NYPSC] believes a transmission developer who intends to seek regulated rates should be incented to produce accurate cost estimates in the Article VII process, and then to meet them, particularly since cost is one of the criteria by which projects will be selected or rejected. The developer should be entitled to a reasonable base rate-of-return up to the amount of its estimates, but should not receive compensation at the same level for the actual costs that exceed those estimates. The Advisory Staff recommendation, which recognizes this principle, is a reasonable approach for risk-sharing and is therefore adopted. Accordingly, if actual costs come in above a bid, the developer should bear 20% of the cost overruns, while ratepayers should bear 80% of those costs. If actual costs come in below a bid, then the developer should retain 20% of the savings.
>
> Furthermore, if the developer seeks incentives from FERC above the base return-on-equity otherwise approved by FERC, then the developer should not receive any incentives above the base return-on-equity on any cost overruns over the bid price. The bid price would therefore cap the costs that may be proposed to FERC for incentives. The [NYPSC] believes this approach to be consistent with FERC policies and reflects FERC's underlying objectives of balancing customer and utility interests, and FERC's policies encouraging innovative risk and reward sharing arrangements.

Pursuant to its December 2014 Order, the NYPSC required developers to file risk-sharing methodologies as a prerequisite to being selected to construct the AC Transmission Upgrades.[3]

6. In December 2015, the NYPSC indicated that, due to the uncertainty of the FERC's acceptance of the NYPSC's preference for a cost-containment mechanism, bids should be sought from all developers assuming traditional full recovery and assuming the NYPSC cost sharing preference.[4]

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[3] Case 12-T-0502, et al., AC Transmission Proceedings, Order Establishing Modified Procedures for Comparative Evaluation (issued December 16, 2014), pp. 42-45.

[4] Case 12-T-0502, Order Finding Transmission Needs driven by Public Policy Requirements (issued December 17, 2015), pp. 48-49.

NYPSC Preferred Cost-Containment Mechanism

7. In the event the actual capital cost of a project exceeds the bid price, the NYPSC preferred cost-containment mechanism would require the developer to absorb 20% of the cost that exceeds the bid, whereas ratepayers would be responsible for 80% of those excess capital costs. If the actual capital costs of the project are below those contained in the bid, the developer would retain 20% of the cost underrun and ratepayers would retain 80% of the underrun.

8. In the NYPSC preferred cost containment measure, the developer would not be allowed to depreciate or to earn any return on debt or equity costs on 20% of the capital expenditures that exceed the bid price. Additionally, the cost containment measure preferred by the NYPSC would disallow return on equity incentives on the portion (80%) of the overrun that is allowed to earn a return.

9. In the NYPSC preferred cost-containment mechanism, most of the disallowance would be attributable to the return on the capital investment. Conversely, a small amount of the disallowance would be attributable to return of the investment (i.e., depreciation).

10. The NYPSC recognizes that FERC policies allow for full recovery of prudently incurred costs and provide developers with a return equity on all prudently incurred costs that fall within a zone of reasonableness. Further, FERC has allowed different rates of return on a single capital investment by granting a higher return on the estimated cost of an investment and a lower return on the capital cost overrun.[5]

[5] Docket No. ER15-572-000, New York Independent System Operator, Inc., Order on Transmission Formula Rate, Return on Equity, Cost Allocation, and Transmission Incentives, 151 FERC ¶61,004 (issued April 2. 2015), at ¶99.

11. To fully implement the NYPSC preferred approach while adhering to the FERC policy of full recovery of prudently incurred costs would require an allowed return on equity that changes annually as the net plant declines. As a result, it would be difficult, if not impossible, to administer or ensure that the overall equity return in a given year would remain within the FERC-determined zone of reasonableness.

12. To achieve the NYPSC's preferred cost containment mechanism to the extent practicable, while adhering to FERC's policies, we recommend that FERC reduce the allowed return on equity on any capital cost overrun. The reduced return on the capital cost overrun would be set such that the overall equity return on the prudently-incurred costs of the entire project is at the bottom of the zone of reasonableness, as determined by the FERC. This recommendation balances ratepayer interests with the developer's ability to earn a reasonable, regulated rate of return on the entire project while complying with the FERC's policies. This approach would also further the NYPSC's goal of providing an incentive to developers to provide realistic bids and thereafter manage project costs.

13. Under the recommended approach, the capital expenditure contained in the bid would be allowed a return on equity at the base level plus any earned incentives, as well as the allowed return on debt.

14. In addition, twenty percent of the capital expenditure above the amount contained in the bid would not be allowed to earn any return on equity or debt.

15. Further, eighty percent of the capital expenditure above the amount contained in the bid would be allowed a return on equity at the base level, which would be reduced to acknowledge the disallowed debt associated with 20% of the capital expenditure overrun; a debt cost incurred by the developer.

16. In order to determine the resulting allowed return on equity on the cost overrun, the amount determined in paragraph 15 is divided by the capital cost of the overrun.

17. In order to determine the return on equity for the entire project, the returns calculated pursuant to paragraphs 13 and 15 would be divided by the capital costs of the project. This return on equity would be compared to the FERC-determined zone of reasonableness. If the resulting project return on equity is outside the zone of reasonableness, the allowed equity return applied to 80% of the capital cost overrun would be adjusted such that the project return on equity is equal to the bottom of the zone of reasonableness.

18. The cost containment method recommended herein could be applied symmetrically (i.e., in situations where actual capital costs are below those included in developers' bids).

19. This concludes my affidavit.

ATTESTATION

I am the witness identified in the foregoing affidavit. I have read the affidavit and am familiar with its contents. The facts set forth herein are true to the best of my knowledge, information, and belief.

Mary Ann Sorrentino
Dated: March 27, 2017

Subscribed and sworn to before me this 27th day of March, 2017

Notary Public

My Commission expires:

CAROL ELIZABETH COYNE
Notary Public, State of New York
Qual. in Rensselaer Co. No. 02CO4940511
Commission Expires July 18, 20 18

Appendix E

STATE OF NEW YORK
PUBLIC SERVICE COMMISSION

At a session of the Public Service Commission held in the City of Albany on December 11, 2014

COMMISSIONERS PRESENT:

Audrey Zibelman, Chair
Patricia L. Acampora
Garry A. Brown
Gregg C. Sayre
Diane X. Burman

CASE 12-T-0502 - Proceeding on Motion of the Commission to Examine Alternating Current Transmission Upgrades.

CASE 13-E-0488 - In the Matter of Alternating Current Transmission Upgrades - Comparative Proceeding.

CASE 13-T-0454 - Application of North America Transmission Corporation and North America Transmission, LLC for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII of the Public Service Law for an Alternating Current Transmission Upgrade Project Consisting of an Edic to Fraser 345 kV Transmission Line and a New Scotland to Leeds to Pleasant Valley 345 kV Transmission Line.

CASE 13-T-0455 - Part A Application of NextEra Energy Transmission New York, Inc. for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII of the Public Service Law for the Marcy to Pleasant Valley Project.

CASE 13-T-0456 - The Part A Application of NextEra Energy Transmission New York, Inc. for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII for the Oakdale to Fraser Project.

CASE 13-M-0457 - Application of New York Transmission Owners Pursuant to Article VII for Authority to Construct and Operate Electric Transmission Facilities in Multiple Counties in New York State.

CASE 12-T-0502, et al.

CASE 13-T-0461 - Application of Boundless Energy NE, LLC for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII for Leeds Path West Project.

ORDER ESTABLISHING MODIFIED PROCEDURES FOR COMPARATIVE EVALUATION

(Issued and Effective December 16, 2014)

BY THE COMMISSION:

INTRODUCTION

The Commission initiated these proceedings to consider whether to address the persistent transmission congestion that exists at the Central East and Upstate New York/Southeast New York (UPNY/SENY) electrical interfaces. On August 13, 2014, a notice was issued seeking comments on certain Advisory Staff recommendations regarding: 1) the procedural steps for evaluating the proposed transmission projects; 2) the mechanism for recovering the costs; 3) the methodology for allocating those costs; and 4) how the risk of cost-overruns should be handled (collectively, Advisory Staff Recommendations). By this order, the Commission adopts Advisory Staff's recommended procedural steps, with modifications, as discussed herein. The order also identifies the Commission's preferred approaches for cost recovery, cost allocation, and risk-sharing.

A number of the comments question the need for a transmission solution to the identified congestion. The Commission responds to those concerns by expanding the process to address the issue of basis of the need before proceeding to a full Article VII review. Included in the approved process are requirements that Trial Staff prepare a report addressing the question and present its findings in a technical conference open

to all the parties so that there can be a full airing and discussion among the stakeholders of the basis of the need for transmission facilities and the viability of potential alternatives.

BACKGROUND

In the order instituting Case 12-T-0502, the Commission explained that the transmission corridors that include the Central East and UPNY/SENY electrical interfaces were persistently congested and contributing to higher energy costs and reliability concerns. The Commission recognized that upgrades to those sections of the transmission system could produce various benefits for New York, including: 1) enhancing system reliability, flexibility, and efficiency; 2) reducing environmental and health impacts; 3) increasing diversity in supply; 4) promoting job growth and the development of new efficient generation resources upstate; and, 5) mitigating reliability problems that may arise with expected generator retirements.[1]

The Commission sought Statements of Intent from transmission owners and other developers proposing projects to increase the UPNY/SENY transfer capacity by approximately 1,000 MW.[2] On January 25, 2013, six interested parties offered

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[1] Case 12-T-0502, Order Instituting Proceeding (issued November 30, 2012), pp. 1-2.

[2] Case 12-T-0502, Order Instituting Proceeding (issued November 30, 2012), p. 2. A technical conference was held on December 17, 2012, in order to explain the purpose and information requirements for the Statements of Intent, and the process for reviewing specific projects. Case 12-T-0502, Notice of Technical Conference (issued November 30, 2012).

proposals intended to address the Commission's objectives.[3] Supplemental information related to the Statements of Intent was subsequently requested by February 15, 2013.[4]

On February 7, 2013, comments were sought on proposed rule changes to streamline the certification process under Article VII of the Public Service Law (PSL) by avoiding the need for future applicants to seek case-specific routine waivers, and to clarify certain regulatory requirements.[5] On April 22, 2013, the Commission adopted the proposed rule changes under PSL Article VII, with modifications, and established procedures for a comparative evaluation of proposed AC project applications, while outlining additional procedural steps.[6] The Commission also directed Department of Public Service Staff (Staff) to

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[3] Statements of Intent were filed by: 1) North America Transmission, LLC and North America Transmission Corporation (collectively, NAT); 2) Central Hudson Gas and Electric Corporation, Consolidated Edison Company of New York, Inc./ Orange & Rockland Utilities, Inc., Niagara Mohawk Power Corporation d/b/a National Grid, New York State Electric & Gas Corporation/ Rochester Gas and Electric Corporation, New York Power Authority, and the Long Island Power Authority (collectively, the New York Transmission Owners (NYTOs)); 3) West Point Partners, LLC; 4) Cricket Valley Energy Center, LLC; 5) NextEra Energy Resources, LLC (NextEra); and, 6) Boundless Energy NE, LLC (Boundless).

[4] Case 12-T-0502, Notice of Information Requirements (issued February 12, 2012).

[5] Case 12-T-0502, Notice Soliciting Comments (issued February 7, 2013).

[6] Case 12-T-0502, Order Establishing Procedures for Joint Review under Article VII of the Public Service Law and Approving Rule Changes (issued April 22, 2013) (April 2013 Order). A two-step review process was established involving the submission of initial application materials, scoping documents, and proposed schedules by October 1, 2013 (referred to as "Part A" application materials), and the submission of the remaining Article VII application materials (referred to as "Part B" application materials) on a schedule to be set by an Administrative Law Judge (ALJ).

develop a straw proposal addressing mechanisms for cost recovery, mechanisms for allocating cost-overrun risk between developers and ratepayers, and methods for allocating project costs among ratepayers. Further, the Commission advised that other rule changes might be necessary to facilitate the comparative evaluation and directed Staff to prepare a proposal identifying such changes.[7]

On May 29, 2013, a notice was issued seeking comments on Staff's proposed procedures to facilitate a comparative evaluation of multiple projects on a common record. Staff also proposed rule changes for how projects that are not subject to Article VII of the PSL would be reviewed, including the content for such applications (collectively, May 2013 Staff Proposal).[8]

On July 10, 2013, a notice was issued soliciting comments on a separate Staff proposal to address the allocation and recovery of project costs, and mechanisms for allocating risk between developers and ratepayers (collectively, July 2013 Staff Proposal).[9] The July 2013 Staff Proposal focused on the establishment of a State mechanism for allocating and recovering costs, while recognizing that an alternative cost recovery

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[7] On May 14, 2013, Staff hosted a technical conference to discuss the process with potential applicants and other interested parties and to answer questions. Case 12-T-0502, Notice of Technical Conference (issued April 29, 2013); Case 12-T-0502, Technical Conference Agenda (issued May 10, 2013).

[8] Case 12-T-0502, Notice Soliciting Comments (issued May 29, 2013). On June 17, 2013, Staff convened an additional technical conference to further discuss the process set forth in the April 2013 Order and to answer questions. Case 12-T-0502, Notice of Technical Conference (issued May 31, 2013).

[9] Case 12-T-0502, Notice Soliciting Comments and Scheduling Technical Conference (issued July 10, 2013). The July 10, 2013 notice also advised interested parties of a technical conference to discuss the July 2013 Staff Proposal. The conference was subsequently held on August 1, 2013.

mechanism might be available pursuant to the New York Independent System Operator, Inc's (NYISO) transmission planning process to address Public Policy Requirements, as approved by the Federal Energy Regulatory Commission (FERC).[10]

On September 19, 2013, the Commission addressed the May 2013 Staff Proposal and adopted procedural and substantive rules to help expedite and process proposed solutions. The Commission also directed the assigned ALJ(s) to "consider, promptly after the initial applications are filed, whether an early screening would help streamline the process and serve the goal of obtaining congestion relief at the least cost to ratepayers, and in the 2014-2018 timeframe set out in the Energy Highway Blueprint."[11]

On October 1, 2013, four AC transmission developers submitted Part A application materials for consideration (i.e., NAT, NextEra, Boundless, and NYTOs). Thereafter, the ALJs analyzed and ruled on deficiencies alleged in the applications. On February 14, 2014, the NYISO filed an initial screening-level analysis of the incremental transfer capability of each project. At a technical conference held on March 19, 2014, the NYISO provided in-depth explanations of its process and results for the initial screening-level analysis.

On February 21, 2014, the Commission stated that it would accept proposals that contribute to the targeted level of

[10] FERC Docket No. ER13-102 et al., New York Independent System Operator, Inc., Order on Rehearing and Compliance, 148 FERC ¶61,044 (issued July 17, 2014). The Commission issued a Policy Statement on August 15, 2014, in Case 14-E-0068, which established generic procedures that will be used to guide the implementation of the Commission's role in the NYISO's public policy planning process.

[11] Case 12-T-0502, Order Adopting Additional Procedures and Rule Changes for Review of Multiple Projects Under Article VII Of the Public Service Law (issued September 19, 2013), p. 11.

congestion relief, even if they do not, individually, provide the full 1,000 MW of additional transfer capability. The ALJs were also directed to establish a process that offers the current applicants an opportunity to "submit alternatives to their existing proposals, incorporating, to the maximum extent possible, projects that can be contained within the bounds of existing rights-of-way."[12]

The ALJs conducted a telephone conference on February 27, 2014 to discuss the establishment of such a process. Thereafter, on April 10, 2014, the parties were advised by the ALJs that further guidance on the next procedural steps would be forthcoming that would also address how the NYISO cost recovery mechanism for public policy requirements should apply to the ongoing AC Transmission proceeding. After considering various comments and requests for clarification made in the course of these proceedings, Advisory Staff developed recommendations regarding procedural matters, cost recovery, cost allocation, and risk-sharing. On August 13, 2014, the Commission sought comments on the Advisory Staff Recommendations.[13] The deadline for initial comments was September 2, 2014, and reply comments were due September 12, 2014.[14]

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[12] Case 12-T-0502 et al., Order Authorizing Modification Of The Process To Allow For Consideration Of Alternative Proposals (issued February 21, 2014) (February 2014 Order), p. 4.

[13] Case 12-T-0502 et al., Notice Seeking Comment on Attached Advisory Staff Recommendations (issued August 13, 2014).

[14] Case 12-T-0502 et al., Letter Ruling On Extension Request (issued August 27, 2014); Case 12-T-0502 et al., Notice Regarding Reply Comments (issued September 5, 2014).

ADVISORY STAFF RECOMMENDATIONS

Procedural Matters

Advisory Staff recommends that the Commission conduct a comparative evaluation of the proposals in order to identify the project or group of projects that best meet the objectives of these proceedings and therefore should continue towards certification. To accomplish this, Advisory Staff would require applicants to submit their existing proposals, revisions to those proposals, or any alternatives developed in response to the Commission's February 2014 Order, for a comparative evaluation. Advisory Staff suggested a deadline of November 14, 2014, for applicants to file certain information identified in Appendix B of the Advisory Staff Recommendations and a deadline of January 19, 2015, for applicants to file additional materials identified in Appendix C. This information would be reviewed using the following criteria: (1) the amount of increased transfer capability that each proposal offers; (2) the cost of the proposal(s) to ratepayers; (3) electric system impacts, emissions reductions, and production cost impacts, measured in terms of overall changes to electric generation dispatch; (4) the extent of any additional rights-of-way (ROW) that the applicant(s) will need to acquire in order to build and operate the proposed facility(ies); (5) the application of innovative technologies to enhance transfer capability or reduce the physical footprint of the project; and, (6) an initial assessment of environmental compatibility, including visual impacts. An analysis of any alternative risk-sharing proposals would be used in assigning a cost to the potential for cost-overruns.

Trial Staff would submit the results of its comparative evaluation to the Commission in the form of a report and motion, upon which all parties would have the opportunity to

comment. The motion portion of the document would contain Trial Staff's proposal as to which projects best meet the Commission's objectives and should therefore proceed, with an expectation of public policy benefit and cost recovery, and which projects should proceed on their own, at the developers' option, without any such expectations. At the time of considering the report and motion, the Commission would also consider whether it should request one or more of the applicants to propose their projects to the NYISO as potential transmission solutions under the NYISO's public policy planning process. The individual Article VII cases would thereafter proceed before the assigned ALJs under the Commission's existing regulations. A table of proposed milestones and deadlines is contained in Appendix A of the Advisory Staff Recommendations.

Cost Recovery

Advisory Staff recommends that the Commission decline, at this time, to adopt a State rate-based cost recovery mechanism, as had been suggested in the July 2013 Staff Proposal. Advisory Staff concludes that there is no compelling reason to adopt such a mechanism since the NYISO's tariff provides a cost recovery mechanism for transmission projects that meet certain Public Policy Requirements, which may well include the congestion relief being sought in these proceedings. Alternatively, a transmission developer could seek cost recovery under Section 205 of the Federal Power Act, by filing directly with FERC.

Advisory Staff recommends that the Commission coordinate the comparative evaluation phase of these proceedings with the NYISO public policy planning process so as to potentially afford applicants an opportunity for cost recovery

through FERC.[15] The NYISO tariff provides for the recovery of costs incurred by an applicant in preparing a proposed transmission solution in response to a request by the Commission, regardless of whether the project is ultimately selected by the NYISO as the best solution. Moreover, Advisory Staff notes that a project that is ultimately granted a certificate under Article VII of the PSL and that has been identified as the most cost-effective or efficient by the NYISO would be able to recover its development costs under the NYISO tariff.

Cost Allocation

Advisory Staff recommends that 75% of project costs be allocated to the economic beneficiaries of reduced congestion, consistent with the methodology embodied in the NYISO's Congestion Assessment and Resource Integration Study process, and that the other 25% of the costs be allocated to all customers on a load-ratio share. The net result would be about 90% of the costs being allocated to customers in the downstate region, and about 10% to upstate customers, instead of a 79%/21% split previously proposed in a Straw Proposal issued on July 10, 2013, in Case 12-T-0502. According to Advisory Staff, this revision recognizes that the primary benefit of the projects will be reduced congestion into downstate load areas, but also acknowledges that there will be some benefits accruing to upstate customers in the form of increased reliability and reduced operational costs.

[15] On August 1, 2014, the NYISO commenced its public policy planning process by soliciting filings by parties proposing transmission needs believed to be driven by Public Policy Requirements.

Risk-Sharing

In order to balance the competing interests of ratepayers and developers, Advisory Staff recommends that the Commission treat project cost estimates as binding applicant bids subject to risk-sharing of cost over-runs or under-runs between ratepayers and independent developers/investor-owned utility shareholders. Specifically, Advisory Staff explains that the developer would bear 20% of the actual cost over-runs, while ratepayers would bear 80% of those costs. If actual costs come in below the bid, the developer would retain 20% of the savings.

In addition, as a component of the risk-sharing model, if the developer is seeking incentives from FERC above the base return-on-equity otherwise approved by FERC, Advisory Staff recommends that the developer not receive any incentives above the base return-on-equity on any cost overruns over the bid price. Applying the risk-sharing model, the bid price would cap the costs that may be proposed to FERC for incentives. The initial bid price, however, could be updated to reflect additional identifiable and verifiable costs associated with Commission-imposed modifications and mandates, the cost of which the developer could not have anticipated in formulating the initial bid price. These additional costs would need to exceed a materiality threshold of 5% above the initial bid price. Advisory Staff also recommends that developers be allowed to propose alternative risk-sharing proposals if they are submitted in addition to the developer's bid prepared on the partial pass-through model. Advisory Staff maintains that this approach would allow the projects to be evaluated on a comparable basis.

Advisory Staff recommends that the Commission adopt an approach whereby the NYISO would include the risk-sharing proposal as part of the cost allocation prescribed under the

Public Policy Requirement. Any successful developer would similarly include the risk-sharing proposal when filing at FERC for cost recovery.

COMMENTS

Approximately 2,300 public comments have been received in these cases since their inception. The overwhelming majority of the comments are in opposition to building any overhead power lines because of adverse visual impacts that would occur in the Hudson Valley, the loss or impairment of agricultural uses, and resultant adverse impacts on property values or from the taking of land. In general, the people expressing opposition believe that the proposed projects are either unnecessary or will cost too much in relation to alternative technologies or resources such as undergrounding, local grid enhancements, demand-side management, and renewable resources. Many argue that undergrounding may have a higher initial cost, but will be less expensive to maintain in the long run considering the newly higher threat of severe storms due to climate change. Many argue that the need for more power should be addressed in the Reforming the Energy Vision (REV) proceeding or as part of the Clean Energy Fund. Another common concern is that property values are currently being harmed by the pendency of the proposed projects. A few people mentioned concerns about the potential health effects of power lines or the use of herbicides to treat the right-of-way.

Procedural Matters

Several commenters raise issues, which they consider to be threshold matters, related to the need for 1,000 MW of AC transmission upgrades, and how this need relates to other Commission proceedings, such as the REV initiative in Case 14-M-

0101.[16] Scenic Hudson, Inc. (Scenic Hudson) suggests that the AC transmission upgrade proceeding should be suspended pending a determination of need for the proposed projects, as well as an analysis of alternative non-transmission congestion solutions.[17] Clinton similarly seeks to postpone the Commission's consideration of 1,000 MW of AC congestion relief until after the REV proceeding is completed.[18]

A concerned citizen urges the reconductoring of existing transmission lines to reduce line losses and increase capacity, while providing time to implement REV initiatives and integrate new renewable resources.[19] Congressman Gibson supports upgrades to the transmission system, but urges the Commission to examine all alternatives, such as buried cable, to minimize impacts.[20] Congressman Gibson also requests that the Commission conduct a full and transparent public comment process, and expeditiously address the concerns about the need for AC transmission upgrades. Assembly-member Barrett urges the Commission to close down the current AC Transmission proceedings and look at opportunities to be innovative and visionary in our energy policies in New York State to meet the real needs before moving forward.

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[16] Town of Clinton, Clinton Concerned Citizens, and Pleasant Valley Concerned Citizens comments (Clinton) (filed August 28, 2014); Town of Pleasant Valley and Farmers and Families of Livingston (Pleasant Valley) comments (filed September 2, 2014); Dutchess County of New York (Dutchess County) comments (filed August 20, 2014); Dutchess Land Conservancy comments (filed September 2, 2014); Farmers and Families for Claverack comments (filed August 26, 2014); Town of Milan comments (filed August 27, 2014).

[17] Scenic Hudson comments (filed September 2, 2014), pp. 1, 4.

[18] Clinton comments (filed August 28, 2014), p. 2.

[19] Todd M. Pfleger comments (filed August 26, 2014).

[20] Congressman Gibson comments (filed August 29, 2014).

The Department of Environmental Conservation (DEC) seeks clarification of the impact that the comparative evaluation process and the NYISO public policy transmission planning process will have upon the required statutory findings under Article VII of the PSL, such as the basis of need. DEC requests further clarification of the extent to which procedures previously adopted by the Commission will apply going forward. In establishing new procedures, DEC asks that the Commission define the scope, factual basis, and legal significance of the findings and determinations that will be made at each phase of these proceedings.

NextEra supports the Advisory Staff Recommendations in their entirety, but requests clarification whether the Part A cost estimates will be binding estimates for purposes of the comparative evaluation and for calculating the risk allocation mechanism. If so, NextEra asks for clarification as to how the cost estimates provided in Part B would differ.

Entergy supports the proposal to utilize the NYISO public policy planning process.[21] NextEra suggests that the Commission designate the relief of transmission congestion, through a 1,000 MW increase in transfer capability, as a Public Policy Requirement within the meaning of the NYISO's planning process.

Scenic Hudson suggests the timeframes proposed under the Advisory Staff Recommendation are unrealistically short. These include: 1) three weeks for the NYISO to conduct an analysis of Part A proposals; 2) four weeks for Trial Staff to prepare its report and motion ranking the proposals; and, 3)

[21] Entergy Nuclear FitzPatrick, LLC, Entergy Nuclear Indian Point 2, LLC, Entergy Nuclear Indian Point 3, LLC, and Entergy Nuclear Operations, Inc. (collectively, Entergy) comments (filed September 2, 2014), p. 2.

three weeks for public comment on the Trial Staff report and motion.[22] Scenic Hudson seeks to extend the public comment period to a minimum of 60 days.[23] DEC requests an additional week to review Trial Staff's report and motion. The Otsego County Conservation Association, Inc. (OCCA) also requests an extension of this deadline.[24] OCCA requests clarification that public comments will be sought on the Part A submissions due January 19, 2015.

Clinton notes the proposed time schedule significantly extends the length of these proceedings and that the delays have had adverse negative impacts on residents, including property values. Clinton also seeks additional time to receive intervenor funding and to hire experts to analyze the documents submitted by applicants, the NYISO, and Staff.

The NYTOs suggest that the deadline for providing notification that a System Reliability Impact Study (SRIS) is in progress should be extended to March 2, 2015 to align with the date for Trial Staff's submission of its report and motion.[25] According to the NYTOs, this extension will assist developers in assessing whether to incur SRIS costs, help the NYISO manage resources, and allow project details to remain confidential until after the January 2015 submittal. Further, the NYTOs request that developers be allowed to propose a process to protect the confidentiality of proposals during the project submittals. This would include prohibiting developers from

[22] Dutchess County raises similar concerns with the proposed schedule.

[23] Scenic Hudson comments (filed September 2, 2014), p. 9.

[24] OCCA comments (filed September 3, 2014).

[25] On October 27, 2014, the ALJs issued a ruling indefinitely postponing the deadline for applicants to provide notice that an SRIS was in progress pursuant to the NYISO tariff, pending further guidance from the Commission on the future process.

substantially modifying or submitting alternative proposals beyond the submission due date.

The NYTOs also request clarification as to whom to submit the filings, and suggest that application materials should be submitted only in project-specific cases. Regarding service, the NYTOs maintain that an email filed with the Secretary and served upon all parties and the statutory service list should be sufficient, unless a party requested to be served by mail when they intervened. Further, the NYTOs suggest that the additional intervenor funding required under Article VII should be submitted with the applications for individual projects, which are projected to be submitted in May 2015.

In reply comments, Clinton criticizes the lack of involvement by the ALJs in the proposed comparative evaluation process. Clinton believes that the ALJs would ensure that the interests and concerns of the residents and municipalities most impacted will be acknowledged and responded to in a meaningful manner.

In reply to concerns DEC expressed about when further factual development on the issue of need would be appropriate in the proceedings, the Town of Pleasant Valley and Farmers and Families for Livingston (Pleasant Valley/Livingston) suggest that need should be established first and fully. Pleasant Valley/Livingston argues that there is no reliability need, that congestion has been decreasing annually, that there has been no showing that reduced congestion during peak periods would enable generally off-peak wind energy to reach downstate consumers, that REV will alleviate congestion, that generation attracted by the new capacity zone may render additional transmission unnecessary, and that pursuing energy efficiency is significantly more cost-beneficial than pursuing transmission. Scenic Hudson agrees with DEC that it is necessary for the

Commission to clarify when and how the need issues will be addressed in these proceedings. Boundless requests that all matters decided in these proceedings not be subject to re-litigation in the individual Article VII proceedings.

Pleasant Valley/Livingston also expresses concern that, since the NYISO would be doing electric system studies as part of the winnowing process, demand side management and energy efficiency solutions will be given short shrift because of the heavy influence of the transmission and generation owners in the NYISO governance structure, and because most parties do not understand the modeling used by the NYISO. Pleasant Valley/Livingston requests that the Commission establish a process to enable the parties to verify that the NYISO analyses are robust, independent, and produce reasonable results. Clinton raises similar concerns about the transparency of the NYISO study process.

Pleasant Valley/Livingston suggests that these proceedings are operating outside the confines of the FERC-approved and mandated NYISO transmission planning process, and as such, should be suspended until both the NYISO process and the REV proceeding have been completed. Clinton takes a similar position that these proceedings should be suspended. Scenic Hudson also believes that the proceedings should be suspended until the NYISO Public Policy Planning Process is complete. Scenic Hudson argues that proceeding with project evaluations would be inefficient because it does not believe that congestion relief meets the public policy standard and that non-transmission alternatives need to be given equal treatment with transmission. According to Scenic Hudson, congestion relief should not be designated as a public policy since it is not required by a law or regulation as required by the NYISO tariff.

In reply to the requests for suspension, NextEra asserts that no basis has been provided to conclude that an incremental increase in distributed generation will resolve the persistent congestion in the transmission system that resulted in the initiation of these proceedings, and that, in any event, the Commission will not issue an Article VII certificate without determining that there is a need for the facility.

In reply to the parties questioning need, Boundless submits that FERC established the lower Hudson Valley New Capacity Zone based on the existing limitation on the transfer capability across the UPNY/SENY interface due to a constraint across this interface of approximately 849 MW, and therefore these proceedings should be continued by the Commission without the extensive delay called for by certain parties.

NextEra agrees with the suggestion by the NYTOs that applicants be prohibited from substantially modifying their proposals or submitting alternative proposals for consideration in the comparative stage of the proceeding after the deadline for the revised submissions. In reply to a request for clarification made by the NYISO, NextEra argues that the Commission has made it clear that developers should be allowed to submit multiple alternative project designs/routes as part of their applications.

In response to the NYTOs' suggestion that the deadline for applicants to have a System Reliability Impact Study in progress for each preferred and alternate project design be extended to March 2, 2015, NextEra recommends that it be extended to May 31, 2015, to accommodate the cumulative time necessary to complete all of the steps leading from the filing of an interconnection request to the start of an SRIS.

Evaluation Criteria

Regarding the criteria to be used in ranking the proposals, several parties request that specific weights be assigned to each criterion.[26] Scenic Hudson suggests eliminating any project from consideration that would result in construction outside of an existing transmission line footprint, in terms of length, height, and width. Clinton similarly interprets the February 2014 Order as requiring all proposals to stay within existing ROWs.[27] OCCA recommends that minimizing further ROW impacts should be a primary factor. Dutchess Land Conservancy maintains that visual impacts should be ranked as a top consideration.

New York State Senator Gipson supports the comparative evaluation process using the criteria proposed by Advisory Staff, but suggests the most important criteria should be public impacts from the physical footprint and environmental compatibility, including visual impacts.[28] Senator Gipson suggests that the cost to ratepayers should include the impact on property values.

DEC seeks clarification of the criteria that would be used in performing an initial environmental assessment. The Department of Agriculture and Markets (Ag & Mkts) maintains that it should be involved in the ranking of the proposals and the identification of mitigation steps related to agricultural resources.[29]

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[26] Scenic Hudson comments (filed September 2, 2014), p. 10; Farmers and Families for Claverack comments (filed August 26, 2014); OCCA comments (filed September 3, 2014); Town of Milan comments (filed August 27, 2014); NAT comments (filed September 2, 2014).

[27] Clinton comments (filed August 28, 2014), p 3.

[28] Senator Gipson comments (filed August 26, 2014).

[29] Ag & Mkts comments (filed September 2, 2014).

The NYISO requests clarification as to: 1) the scope of the studies (i.e., the number of projects and studies for each project); 2) the timing of the studies, which may require more than three months to complete depending on the scope; and, 3) how the costs of the analyses would be recovered. The NYISO asks the Commission to provide for the NYISO's recovery of its actual costs in performing the requested studies.

The NYTOs note that the Transmission Owner Transmission Solutions (TOTS) proposed in these proceedings were previously selected as part of the Indian Point Contingency Plan approved by the Commission.[30] Accordingly, the NYTOs propose that the TOTS should not participate in the comparative evaluation process or be required to provide additional information.[31]

The NYTOs propose four additional criteria beyond the six criteria proposed by Advisory Staff for use in the comparative analysis phase. These include: 1) the project's resiliency and its impact on the total transmission system resiliency (i.e., storm hardening); 2) the project's impact on system reliability; 3) the project's robustness and expandability to provide the transmission system the long-term flexibility to respond to future load and generation needs; and, 4) economic benefits to the State (i.e., job growth, tax base expansion, more efficient use of existing generating resources, development of efficient and lower-cost new generating resources

[30] Case 12-E-0503, Generation retirement Contingency Plans, Order Accepting IPEC Reliability Contingency Plans, Establishing Cost Allocation And Recovery, And Denying Requests For Rehearing (issued November 4, 2013).

[31] NYTO comments (filed September 2, 2014), p. 8. On November 17, 2014, NYPA and NYSEG withdrew their respective portions of the Marcy South Series Compensation Project from further consideration in these proceedings.

in upstate areas, and fewer reliability issues resulting from retirement of existing upstate generators).

The NYTOs request that the NYISO perform a complete transfer analysis, including thermal and voltage impacts, on the interfaces subject to the original scope of study and on any additional interfaces affected by the proposals. The NYTOs also suggest additional information requirements to improve the quality of the cost estimates. In particular, they recommend that each estimate should include, by discrete transmission element (i.e., each transmission line, each substation addition), information regarding: 1) material cost; 2) labor cost broken out by engineering, construction, and survey; 3) regulatory permitting and legal fees; 4) property acquisition; 5) taxes; 6) program/project management; 7) Allowance for Funds Used During Construction (AFUDC); and, 8) risk and contingency. The NYTOs indicate these estimates should be provided in current year dollars and as-spent dollars.

NAT suggests a list of information requirements that include items identified by the NYTOs. NAT requests that estimates of this information be represented in total capital cost by year-of-occurrence dollars. In order to minimize risk premiums, NAT suggests allowing bids to be indexed to inflation and the costs of labor, steel, aluminum, and other construction materials.

NAT asks the Commission to identify the methodology and assumptions that will be used to identify the transfer capability under the first criterion. NAT suggests that the second criterion (cost) should be evaluated based on total cost, cost per MW of transfer capability, and cost relative to benefits. The third criterion (electric system impacts), according to NAT, should evaluate production cost energy savings, load energy savings, and load capacity market savings.

NAT also suggests that emissions reductions calculated under the third criterion should instead be considered as part of the sixth criterion (environmental compatibility).

Regarding the analysis of ROWs under the fourth criterion, NAT seeks clarification that some additional private ROWs would be acceptable, and that the analysis of additional ROWs would relate to private ROWs. NAT suggests that the fourth and sixth criterion (additional ROWs and environmental compatibility, respectively) be combined since additional ROW is one aspect of environmental compatibility. NAT further contends that the fifth criterion (innovative technologies) should be eliminated because innovative technology was not an original goal, or alternatively it should be reflected in the first and fourth criterion (transfer capability and additional ROWs, respectively).

Boundless argues that the appropriate studies should be performed under normal dispatch conditions. Boundless also contends that the NYISO should perform studies using the same approach the NYISO took in justifying the lower Hudson Valley capacity zone, which would provide a basis for seeking relief at FERC from the costs associated with the new zone. Boundless requests a technical conference to discuss modeling protocols and assumptions before the NYISO performs any additional analysis. Boundless maintains that the ALJs should rank the projects, rather than Trial Staff.

NextEra does not object to the proposals by the NYTOs and NAT that cost estimates be provided using certain categories, but does not believe that the NYTOs' suggestion to use the Association for the Advancement of Cost Engineering International Recommended Practice as a reference point is appropriate because that practice is relevant to process plants and is not used as an industry standard for estimating costs of

transmission facilities. In addition, NextEra recommends that the parties be required to provide estimates escalated to the year in which the project will be built, as recommended by NAT, rather than current dollars, to allow a relevant comparison of the projects.

Boundless supports the suggestion that the project cost estimates should be of high quality, but opposes the detailed requirements proposed by the NYTOs because they would significantly raise the cost of preparing the estimates and the cost to Boundless and the other non-incumbent generators would outweigh the purported advantages of the more detailed information, unless reimbursement of the cost to prepare the estimates is provided to all parties.

In response to DEC's comments, Pleasant Valley/Livingston states that it agrees that the Part A evaluation needs to include environmental criteria. Pleasant Valley/Livingston also agrees with NAT that the relative weights assigned to evaluation criteria should be stated. Boundless also agrees with the comments of NAT and others on the criteria and with a request by Otsego County Conservation Association, Inc. that ROW impacts be given greater emphasis than other criteria.

In response to a proposal by the NYTOs that four additional criteria be added (resiliency, system reliability, robustness and expandability, and economic benefits to New York), NextEra believes them to be unnecessary, as the originally stated criteria appropriately reflect the key goals of the Energy Highway Blueprint and that supplementing the review process with these additional criteria, many of which are difficult or impossible to quantify, may make the comparison process unduly burdensome without a corresponding increase in the likelihood of identifying the project that best addresses

the key goals of the Energy Highway Blueprint. In contrast, Boundless supports the additional criteria proposed by the NYTOs.

Boundless questions the proposal by Ag & Mkts that other State agencies participate in the ranking of proposals over concerns that such participation not be done in secret, but does not appear to oppose written input to DPS Staff by other State agencies in the form of comments.

In reply to comments filed by the NYTOs asserting that the Ramapo to Rock Tavern project and the Marcy South series compensation project (MSSC) have already been selected for construction by the Commission and therefore do not need to be comparatively evaluated in these proceedings, Entergy argues that the MSSC project (which had not yet been withdrawn from the AC Transmission proceedings at the time Entergy's comments were filed) should participate in the comparative evaluation portion of this proceeding. Boundless submits that the MSSC project should be voluntarily withdrawn or the Commission should remove the project from further consideration as a simplifying measure. Boundless also seeks a clarification as to how the withdrawn projects will be treated for system modeling purposes.

Cost Recovery and Cost Allocation

Dutchess County supports cost recovery through FERC authorized tariffs, but opposes allowing a developer, which is ultimately not selected to build a project, to recover its costs in proposing a solution to the NYISO. Dutchess County seeks an evaluation of cost impacts on ratepayers by utility franchise, broken down for residential, commercial, and industrial customers.

Multiple Intervenors (MI) opposes Advisory Staff's recommended cost recovery approach and maintains that the

proposal is not consistent with cost causation principles and fails to ensure customer rate impacts are adequately minimized. According to MI, recovering costs on a volumetric MWh basis is contrary to cost causation principles and the Commission's precedence, and is inequitable to high-load-factor customers.

MI supports the July 2013 Staff Proposal to allocate costs among utility service classes based on class contribution to peak demand, and then recovered on a per kW basis from demand-metered customers. MI further supports recovery of costs over the projected service life of the transmission facility in order to minimize rate impacts on customers.

The NYTOs support cost recovery through FERC-approved tariffs, but suggest that they should be allowed to propose a State-based cost recovery mechanism where it may be reasonable, such as where an upgraded project replaces pre-existing facilities.

Entergy supports adoption of the proposal to file a cost recovery and allocation methodology with FERC as the entity with jurisdiction over such matters.

Dutchess County argues that there is no basis to include it within the downstate region that is expected to be the primary beneficiary. Accordingly, if a transmission project moves forward, Dutchess County seeks to ensure Zone G would be considered in the upstate region.[32] Senator Gipson supports a 90% allocation of costs to downstate customers, and proffers to define downstate to include Nassau, Suffolk, Westchester, and New York City.

MI supports Advisory Staff's allocation of approximately 90% of the costs to SENY customers and 10% to UPNY customers. This approach, MI asserts, is consistent with the

[32] Dutchess County comments (File August 20, 2014).

beneficiaries pay principle given that the primary benefits of the transmission project would be reduced congestion and economic benefits for downstate load areas.

The NYTOs maintain that their rights under the Federal Power Act allow them to propose their own cost allocation methods, and ask the Commission to clarify that such alternative cost allocation methods are acceptable.

In response to comments that oppose cost recovery for projects that are not ultimately selected, NextEra argues that the competition provided by non-winning bidders is what keeps the ultimate project costs at a level that reflects effective competition, and that new entrants/non-incumbents will not be attracted to add to the competition if incumbent transmission owners can likely recovery their prudent development costs but new entrants/non-incumbents cannot. NextEra believes that the financial and other benefits that will accrue to ratepayers from preserving a competitive dynamic in these proceedings will far outweigh the expense to consumers of the cost recovery mechanism recommended by Advisory Staff.

In response to the NYISO's comments as to what development costs may be recoverable under its tariff, Boundless submits that the language of the tariff provision is better read as covering cost recovery for the development of the project which was selected by the Commission for submission to the NYISO. According to Boundless, even if the cost directly associated with participation in these proceedings before the Commission are excluded, as presumably would meet the NYISO's interpretation, the tariff section would provide for more extensive cost recovery than suggested by the NYISO.

In reply to the NYISO's request for compensation for studies it would perform at the request of the Commission, Boundless challenges the NYISO's authority to charge the

Commission for such study work, argues that transferring such costs to applicants is contrary to the policy and goals of FERC which has encouraged the regional independent system operators to undertake such a planning function, and notes that the NYISO has a tariff which permits it to collect all of its planning expenses at no risk. Boundless notes that the NYISO submitted the Screening-Level Analysis on February 14, 2014 in these proceedings, without reimbursement. Boundless also argues that nothing in Article VII of the PSL authorizes the Commission to assess charges on developer-applicants for the processing of their applications. According to Boundless, the Commission cannot simply accept the submission of certain charges from the NYISO and then impose them on the current parties as a condition of continuing in these proceedings. In addition, Boundless cautions that if the Commission were to allow these costs to be charged to applicants, such charges would unfairly and greatly exacerbate the distinction between incumbent and non-incumbent developers because incumbents may be able to recover their prudently incurred development costs from ratepayers, whereas no vehicle has been established for non-incumbents to recover such development costs.

Boundless states its understanding is that a successful developer will be able to recover its development costs under a FERC cost recovery order. Therefore, Boundless suggests that the NYISO prepare cost records of its studies for developers in these proceedings in sufficient detail so that a developer which seeks a cost recovery order from FERC will be able to include the NYISO's study costs in its presentation to FERC as an element of cost to be recovered.

Pleasant Valley/Livingston believes that developers should pay for the NYISO study costs based on their opportunity to gain; unsuccessful developers should not be allowed to shift

their business risk of participating to ratepayers. Clinton echoes those concerns, finding it completely unacceptable to allow developers to proceed without any significant financial risk. Scenic Hudson also believes that developers, not ratepayers, should pay for NYISO study costs given that developers stand to gain if successful, and therefore have also assumed the risk of not being selected.

Pleasant Valley/Livingston also believes that DPS Staff needs to tightly define the study work scope of the NYISO to ensure the process is manageable and not unduly burdensome, and that such continuing and open-ended incremental costs can be avoided by placing the proceeding on hold until the REV proceeding concludes and the need for more overhead AC transmission is established.

The NYTOs agree with the NYISO that the NYISO should be compensated for its study costs, but urges that mechanisms be adopted to reduce those costs by eliminating redundant studies and allowing developers to self-perform some of the studies. NAT believes that the NYISO study costs should be paid proportionally by the developers selected by the Commission at the conclusion of the comparative evaluation phase of the proceedings, with payment due within 30 days of the Commission order. NextEra suggests that following completion of studies by NYISO, the developers/applicants participating in that stage of the proceedings should reimburse NYISO for its study costs on an equal per capita basis.

The New York Municipal Power Agency (NYMPA) supports Advisory Staff's proposed 75%/25% CARIS/Load Ratio Share cost allocation as more closely based on the quantifiable economic benefits of congestion relief than the initial Straw Proposal, even though NYMPA believes that Advisory Staff failed to satisfactorily quantify how generic (non-congestion reduction)

benefits would benefit upstate when most such dispatch cost savings would likely accrue to downstate loads. In response to the NYTOs' comments regarding alternate, case-specific cost allocation methodologies, NYMPA states that it favors a pre-determined single cost allocation methodology rather than a flexible method as proposed by the NYTOs because the pre-determined method has been fully vetted and is consistent with FERC's policy that there be transparency in determining the chosen methodology. Alternately, NYMPA supports imposing a high burden of proof, including a precise quantification of benefits, for any other individually proposed cost allocation methodology.

Risk-Sharing

Pleasant Valley and Scenic Hudson object to the Advisory Staff Recommendation to adopt an 80%/20% risk allocation because it incentivizes cost overruns and makes ratepayers responsible for 80% of cost overruns. Farmers and Families for Claverack take the same position. Dutchess County similarly maintains that the Advisory Staff Recommendations allow too much of a return on cost overruns for developers, and thus expresses a preference for a fixed price bid, without sharing, but the possibility of a tightly controlled verifiable price true-up if "material" or above 5%.

MI supports the Advisory Staff Recommendations with respect to risk-sharing as a reasonable approach.

The NYTOs argue that Advisory Staff's recommendation to deny cost recovery for certain cost over-runs contradicts with FERC's approach, which provides full cost recovery of prudently incurred investments. The NYTOs contend that assuming the risks of cost overruns will lead to higher capital costs. The NYTOs advocate that any risk-sharing mechanism should be consistent with FERC's policies and subject to FERC's approval.

In reply to comments that seek to shift more risk onto the developers, the NYTOs reiterate that any risk-sharing which does not allow full recovery of prudently incurred costs would be inconsistent with FERC policy. According to the NYTOs, FERC already includes risk-sharing by making projects with cost overruns subject to loss of transmission return equity adders. The NYTOs oppose the risk-sharing proposal made by Advisory Staff as being inconsistent with FERC policy and also believe that it would result in higher capital costs. Boundless agrees with the Indicated NYTOs on this point.

NextEra, responding to the NYTOs, argues that FERC did not intend to preclude innovative risk and reward-sharing arrangements that might be proposed pursuant to FERC Order No. 1000, and has explicitly approved transmission provider proposals to allow participants in competitive transmission proceedings to include binding cost containment measures to enhance the attractiveness of their bids, which could preclude some degree of cost recovery.[33] In reply to other comments suggesting that the risk-sharing model will incentivize cost overruns because a developer's penalty in the event of an overrun would be limited to 20%, NextEra argues that a 20% overrun penalty eliminates the possibility of cost recovery for a significant portion of overages and will therefore operate as an incentive for developers to avoid cost overruns.

The NYTOs opposes NextEra's proposal that the Part A project estimates be binding for the purposes of comparison evaluations and for allocating risk-sharing. The NYTOs caution that these cost estimates are necessarily preliminary and should not be accorded great weight because of uncertainties as to interconnection costs, detailed construction costs, local

[33] NextEra cites California Independent System Operator Corporation, 143 FERC ¶ 61,057, at P 233 (2013).

government compliance costs, and necessary environmental mitigation measures, all of which cannot be accurately determined at this stage in the development process. Boundless similarly opposes the concept of binding bids given the potential of unforeseen contingencies at this early stage of development and the potential for fluctuations in commodity prices. Boundless is also concerned that developers that are large corporations can likely assume more cost risk than developers like Boundless, such that the risk-sharing provision may drive Boundless out of the competition.

DISCUSSION

The various comments provided by interested parties, stakeholders, and State agencies have significantly contributed to the development of the record in these proceedings. This input is truly appreciated and serves to better inform the Commission's decision-making. Upon considering these comments, the Commission adopts a comparative evaluation process and schedule for these proceedings that is to be coordinated with the process and schedule for the Commission's determination as to whether transmission congestion at the Central East and UPNY/SENY interfaces creates a transmission need driven by Public Policy Requirements.

In response to the substantial number of comments that question the need for a transmission solution to the identified congestion, the Commission is supplementing the process to address the basis of the need in the comparative evaluation phase of these proceedings. The Commission is requiring that Trial Staff prepare a report addressing the need question and present its findings in a technical conference open to all the parties so that there can be a full airing and discussion among the stakeholders of the basis of the need for transmission

facilities and the viability of potential alternatives. The Commission expects all the parties to cooperate and assist Trial Staff in the creation of a record on these issues for the Commission's consideration.

The Commission also adopts methodologies for cost recovery, cost allocation, and risk-sharing. As also discussed below, the Commission clarifies several matters raised in the comments.

Procedural Matters

A comparative evaluation of the proposed projects is necessary to determine which project, or combination of projects, will best achieve the Commission's objectives. The Commission also notes that the question of whether any projects should be evaluated under the NYISO's tariff is presently before the Commission in Case 14-E-0454, where the Commission will consider whether Central East and UPNY/SENY congestion relief should be designated as a Public Policy Requirement driving a need for transmission within the meaning of the NYISO's public policy planning process.[34] The Commission's determination on that issue should be informed by the analyses being conducted in the comparative evaluation phase of the AC Transmission proceedings, and conversely analyses made in the AC Transmission proceedings should inform the decision in the Public Policy Requirements process. Therefore, the Commission will direct Trial Staff to consider comments in Case 14-E-0454 and provide an overall assessment of the benefits and costs of congestion relief as part of the Trial Staff report. The Table of Milestones and Deadlines, attached as Appendix A, identifies the

[34] The procedures to be followed in Case 14-E-0454 comport with the Policy Statement on Transmission Planning for Public Policy Purposes (Policy Statement). Case 14-E-0068, Policies and Procedures Regarding Transmission Planning for Public Policy Purposes, Policy Statement (issued August 15, 2014).

key deliverables and the timing to help guide the completion of the comparative process. These steps, which supplant the procedures previously adopted, are also discussed below.

The milestones and deadlines proposed in the Advisory Staff Recommendations have been revised to accommodate certain additional procedural steps and to reflect an updated time schedule. The four developers shall therefore submit, by January 7, 2015, the information identified in Appendices B and C, which is needed to commence the comparative evaluation, including the powerflow analyses. No substantial modifications of the proposals will be allowed after the submissions due January 7, 2015 until the comparative evaluation process is completed. The additional information identified in Appendix D, which is needed to complete the evaluation, will be due on January 19, 2015. The Commission notes that the information to be submitted in both instances has been augmented to require more specific information from the developers and to place a greater portion of the burden of developing the record on them rather than on Trial Staff. The deadline to provide notification that an SRIS is in progress will be February 27, 2015. That date preserves the confidentiality of the revised proposals prior to their submittal deadlines, but also requires submission of the notification prior to the deadline for parties to comment, and substantially before Trial Staff has to complete its comparative evaluation. The Commission adopts the suggestion to allow comments on these submissions, and establishes deadlines for parties to submit such comments, and for replies. Parties that have information to contribute to the record on these issues should avail themselves of the comment opportunity provided.

The Commission anticipates that the powerflow analyses will be completed by May 13, 2015, and that the production

simulations will be completed by May 20, 2015. Trial Staff should thereafter rank the proposals according to the criteria and present a Report and Motion[35] by June 10, 2015, for the Commission's consideration. In addition, to be responsive to the comments received about transparency and the basis of the need for any facilities, Trial Staff should plan to host a technical conference on or about June 17-18, 2015, in order to explain the results in the Report and Motion and answer questions about the modeling and analyses that went into the results. The NYISO, and any other entity that assisted, should also participate in the technical conference. The technical conference will also serve the dual purpose of informing the Public Policy Requirements process. It is anticipated that the information available at the time of the technical conference will also inform parties of the potential need for congestion relief. After the technical conference, interested parties will be afforded an opportunity to submit comments on the Trial Staff Report and Motion in these proceedings, and supplemental comments in the Public Policy Transmission Planning Process proceeding. The schedule also provides for replies to the comments submitted.

This schedule will allow the Commission to consider the Trial Staff Motion in August or September 2015, including determining which project(s) best meets the overall objectives of these proceedings such that they should continue in the Article VII process following our decision. The Commission recognizes the concerns raised in comments that the mere

[35] The Report and Motion should contribute towards a winnowing process to identify the most beneficial project or projects of the group, and provide Trial Staff's recommendations regarding whether transmission facilities are needed to address the identified congestion as compared to other non-transmission solutions that might be available as an alternative.

pendency of these proceedings may adversely affect property values and real estate transactions. By reducing the projects for consideration in as timely a manner as possible given the necessity of making an informed decision, the Commission intends to provide some level of certainty to the potentially affected communities and landowners.

Consideration of the Trial Staff Report and Motion will enable the Commission to consider whether to request the developers of any of the proposals submitted in the comparative process to propose their solution(s) to the NYISO for further evaluation.[36] In the event such request is made by the Commission, the costs incurred by a developer in preparing its proposed transmission solution would be recoverable under the NYISO tariff.[37] The Commission finds that allowing the recovery of these preparation costs would be reasonable under the circumstances because it encourages competition among the proposals that is ultimately more beneficial to ratepayers than the costs to be recovered, and therefore rejects the arguments to the contrary.

Following the comparative evaluation phase and the Commission's determination as to Public Policy Requirements, it is expected that if the Commission determines projects should proceed, the developer(s) of the preferred projects will pursue the completion of the Article VII process, while the NYISO completes its analysis required under the Public Policy Transmission Planning Process.[38] The Public Policy Transmission

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[36] The results of those studies may also further inform the record in the certification proceedings.

[37] NYISO Open Access Transmission Tariff, Attachment Y, §31.4.3.2.

[38] Any projects that are ultimately selected by the NYISO as more efficient or cost-effective would require siting approvals from the Commission before they could be constructed.

Planning Process also provides an additional mechanism for studying generation and demand response alternatives to the AC transmission upgrades.[39]

In pursuing a comparative evaluation of projects to relieve congestion, the Commission is cognizant of other related proceedings. While many comments refer to the REV initiative, the Commission views this proceeding as complementary to the goals of REV. Achieving the objectives of the REV proceeding will not, at any time in the foreseeable future, eliminate the need for more robust and flexible transmission infrastructure linking the upstate regions to downstate through the Mohawk and Hudson Valleys. At the same time, improving the existing infrastructure will support some of the REV goals. It will allow for more efficient dispatch of bulk system resources to complement the activation of distribution-level resources, and it will facilitate the development of new renewable resources, such as wind, most of which will be sited upstate on the constrained side of the congested interfaces. The Commission therefore declines to hold these proceedings in abeyance until the completion of the REV initiative.

As requested by DEC, the Commission notes that the investigation of transmission solutions through a comparative evaluation process, and in the public policy planning process, is not the full equivalent to the statutory findings required under the PSL for granting an Article VII certificate. These investigations however will contribute to the record that informs the Commission in making the Article VII statutory findings for issuance of an Article VII certificate, which include, among other matters, the basis of the need for a

[39] NYISO Open Access Transmission Tariff, Attachment Y, §31.4.6.2.

particular facility and the degree of environmental compatibility.

The concept of environmental compatibility and public need requires the Commission to "protect environmental values, and take into account the total cost to society of such facilities."[40] The relevant considerations include, without limitation, the electric system requirements, the cost, the environmental impact, the availability and impact of alternatives, undergrounding considerations, conformance to long-range plans, State laws and local laws, and the public interest, convenience, and necessity. These Article VII findings can only be made after considering the totality of all relevant factors related to the environmental compatibility and public need for a particular facility.

The Commission finds that the comparative evaluation should proceed because there is sufficient evidence of significant constraints at the Central East and UPNY-SENY interfaces to support the decision to investigate possible transmission solutions, and because resolving that congestion could produce significant benefits for ratepayers. But the Commission has heard the concerns of the many parties that question the need for a transmission solution. As noted above, Commission is requiring that the need question be addressed beginning with a Trial Staff report and a technical conference. The parties remain free to develop arguments that alternative non-transmission congestion solutions rebut the need for designating the congestion relief as a Public Policy Requirement, or for the granting of an Article VII certification

[40] Chapter 272 of the Laws of 1970, Section 1, Legislative Findings.

to a proposed AC transmission project.[41] The Commission also invites those commentators who question whether any such solutions are necessary, to also participate and offer their views in Case 14-E-0454, as that proceeding is an appropriate

forum for comments[42] relating to the scope and significance of the Central East and UPNY/SENY congestion problem and to the necessity and effectiveness of a transmission solution.

Evaluation Criteria

As noted above, Trial Staff will be tasked with ranking the proposals. The ranking should take into account the six criteria identified in the Advisory Staff Recommendations, including: 1) the relative contribution to transfer capability; 2) the costs to ratepayers; 3) electric system impacts, emissions reductions, and impacts on production costs, measured in terms of overall changes to generation dispatch; 4) the extent of any additional right-of-ways that may be needed; 5) the integration of innovative technologies to enhance transfer capability or reduce the physical footprint of the project; and, 6) an initial assessment of environmental compatibility, including visual impacts. The four additional criteria proposed by the NYTOs are not adopted because they are largely redundant with the concept of electric system impacts and would remove focus from the key issue of increasing transfer capability in a manner that is cost efficient and environmentally compatible.

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[41] In addition, the NYISO may be requested to evaluate alternative options to address the transmission needs. NYISO Open Access Transmission Tariff, Attachment Y, §31.4.2.1.

[42] Initial comments in that proceeding are due on December 29, 2014, but the schedule set forth in Appendix A attached to this order anticipates another round of comments at a later date.

The Commission declines to assign weights to the criteria at this time, as suggested by various parties. While each criterion should be given due consideration, Trial Staff will be given latitude in the first instance to look at the completeness, quality and verifiability of the information that is received and thereafter shall consider the feasibility of assigning weights to the criteria as part of its Report and Motion. Trial Staff, after reviewing the information received, will also devise what units of measurement will be used for the comparative evaluation in the first instance. The Commission appreciates the offer of Ag & Mkts to assist in the ranking, and expects Trial Staff will carefully consider any comments it receives from other State agencies and interested parties and explain its considerations for our review.

Regarding right-of-ways, the Commission clarifies that its objective is to encourage innovation and the use of existing rights-of-way so that the State experiences smart growth of the electric grid with the least impact to the environment and our communities. Therefore, the Commission desires, to the degree possible consistent with other policy objectives, to minimize the acquisition of additional lands for right-of-ways and the construction of major electric transmission facilities that are out of scale or character with existing facilities already in the landscape. While it is unfortunately impractical and would be unduly restrictive to impose an outright ban on all new right-of-way acquisition, the degree of necessity for such acquisition will be a key distinguishing factor affecting the viability of project proposals. The Commission recognizes that some additional private lands may be needed, but encourages developers to limit such requirements to the degree possible.

The NYTO's TOTS projects have been withdrawn from these proceedings, so they will not be considered in the

comparative evaluation process. The TOTS projects have already been accepted as part of the Indian Point Reliability Contingency Plan and their contribution toward the 1,000 MW target of congestion relief should be identified by Trial Staff and reflected in the baseline used to evaluate the incremental contribution of the remaining projects.

Regarding the NYISO's request for clarification as to the scope of the studies (i.e., the number of projects and studies for each project), the Commission recognizes that if too many variations are received, it may be necessary to limit each applicant to a single preferred proposal for full study purposes so as to not unreasonably delay the comparative evaluation process. The timing of the studies has been revised in the adopted schedule along with the insertion of intermediate milestones that reflect the need to obtain information from the powerflow analysis to use as modeling inputs in the analysis of production cost savings using General Electric's Multi-Area Production Simulation (GE MAPS). The Commission expects the NYISO to work cooperatively with DPS Staff and provide whatever assistance is necessary.

Cost Recovery and Cost Allocation

The comments are generally supportive of ensuring cost recovery through FERC-approved tariffs. Coordinating the comparative evaluation phase with the NYISO's public policy planning process would establish a mechanism for such cost recovery. The Commission adopts this approach.[43]

The Commission declines to address requests for an evaluation of ratepayer impacts by customer classifications

[43] This approach does not foreclose the possible consideration of an alternate method for cost recovery under State-approved mechanisms in the event recovery through FERC rates proves to be infeasible.

within each utility franchise, or to ensure cost allocation based on the contribution of each customer class to peak load, since these are matters best addressed in a ratemaking proceeding. Similarly, it is not appropriate to address at this time whether the period for cost recovery should extend over the projected service life of a project or a shorter period.

The Commission supports a "beneficiaries pay" approach for allocating costs, whereby those that derive the benefits of a project should bear the costs. Although a precise calculation of the projected benefits has not been completed, the cost allocation proposed in the Advisory Staff Recommendations is roughly commensurate with the anticipated beneficiaries. The Commission therefore adopts an approach whereby 75% of project costs are allocated to the economic beneficiaries of reduced congestion, while the other 25% of the costs are allocated to all customers on a load-ratio share. This would result in approximately 90% of the project costs being allocated to customers in the downstate region, and about 10% to upstate customers. This allocation reflects that the primary benefit of the projects will be reduced congestion into downstate load areas, but also recognizes that some benefits accrue to upstate customers in the form of increased reliability and reduced operational costs.

In the event the Commission designates Central East and UPNY/SENY congestion relief as a transmission need driven by a Public Policy Requirement under the NYISO's planning process, the Commission intends to prescribe the above-described cost allocation methodology in connection with such public policy determination. Parties that dispute they are beneficiaries, or that they are assigned a reasonable portion of the costs, would then be able to raise their objections before FERC.

The Commission notes that under the NYISO tariff, the NYISO would file with FERC any cost allocation prescribed under the Public Policy Requirement.[44] The NYISO tariff further provides that nothing therein "shall deprive a Transmission Owner or Other Developer of any rights it may have under Section 205 of the Federal Power Act to submit filings proposing any other cost allocation methodology to [FERC]…"[45] While the Commission does not take a position on the NYTOs' rights under the Federal Power Act, it appears the clarification requested by the NYTOs is already contained in this provision of the NYISO tariff.

Cost Estimates and Risk-sharing

Because the costs to ratepayers will be one of the criteria that Trial Staff will utilize in preparing its Report and Motion during the comparative evaluation process, the developers are expected to provide reliable and binding cost estimates or bids. All costs shall be stated in nominal (year of occurrence) dollars.

Upon considering the various requests to require additional information in the developer's cost estimates, the Commission adopts the following items, consistent with what would similarly be required to satisfy the provisions in the NYISO tariff.[46] In particular, each developer should provide credible capital cost estimates for its proposed project, with itemized supporting work sheets that identify all material and labor cost assumptions. The work sheets should include an estimated quantification of cost variance, providing an assumed plus/minus range around the capital cost estimate. Each

[44] NYISO Open Access Transmission Tariff, Attachment Y, §31.5.5.4.1.

[45] Id.

[46] NYISO OATT, Attachment Y, §31.4.8.1.

developer should itemize: material and labor cost by equipment, engineering and design work, permitting, site acquisition, procurement and construction work, and commissioning needed for the proposed solution, all in accordance with Good Utility Practice.

For each of the above cost categories, the developer should specify the nature and estimated cost of all major project components, and estimate the cost of the work to be done at each substation and/or on each feeder to physically and electrically connect each facility to the existing system. The work sheets should itemize, to the extent applicable, all equipment for: (i) the proposed project, (ii) interconnection facilities (including Attachment Facilities and Direct Assignment Facilities), and (iii) System Upgrade Facilities, System Deliverability Upgrades, Network Upgrades, and Distribution Upgrades.

To help ensure the quality and comparability of the bids, and that ratepayers retain the benefit of this comparative evaluation process, the Commission finds that a risk-sharing mechanism is appropriate. The Commission anticipates that the successful developer or developers will seek cost recovery from FERC. Therefore, the Commission's policy approach to risk-sharing necessarily considers FERC policies and balances ratepayer interests with a developer’s expectation that it will earn a regulated rate-of-return on an approved transmission project.

The Commission believes a transmission developer who intends to seek regulated rates should be incented to produce accurate cost estimates in the Article VII process, and then to meet them, particularly since cost is one of the criteria by which projects will be selected or rejected. The developer should be entitled to a reasonable base rate-of-return up to the

amount of its estimates, but should not receive compensation at the same level for the actual costs that exceed those estimates. The Advisory Staff recommendation, which recognizes this principle, is a reasonable approach for risk-sharing and is therefore adopted. Accordingly, if actual costs come in above a bid, the developer should bear 20% of the cost over-runs, while ratepayers should bear 80% of those costs. If actual costs come in below a bid, then the developer should retain 20% of the savings. Furthermore, if the developer seeks incentives from FERC above the base return-on-equity otherwise approved by FERC, then the developer should not receive any incentives above the base return-on-equity on any cost overruns over the bid price. The bid price would therefore cap the costs that may be proposed to FERC for incentives. The Commission believes this approach to be consistent with FERC policies and reflects FERC's underlying objectives of balancing customer and utility interests, and FERC's policies encouraging innovative risk and reward sharing arrangements.

Regarding comments that suggest a risk-sharing approach is inconsistent with FERC policies and should be modified to ensure consistency (i.e., to allow cost over-runs and full recovery of prudently incurred investment), the Commission notes that FERC has accepted "specific, binding cost control measures that the transmission developer agrees to accept, including any binding agreement by the transmission developer and its team to accept a cost cap that would preclude project costs above the cap from being recovered...."[47] The Commission finds that the risk-sharing approach proposed in the Advisory Staff Recommendations is reasonable and appropriate,

[47] Docket Nos. ER13-103-000 et al., California Independent System Operator Corporation, Order on Compliance Filing (issued April 18, 2013), 143 FERC ¶61,057, ¶233.

and is generally consistent with FERC precedent. Accordingly, the Commission will expect any developer submitting a project for consideration in the comparative evaluation process to be willing to accept the risk-sharing proposal adopted herein. The Commission expects this approach will ultimately be subject to FERC's approval.

The Commission also acknowledges that a developer may incur additional, identifiable, and verifiable costs necessary to comply with Commission-imposed modifications and mandates that could not have been reasonably anticipated in formulating the initial bid price. These additional qualifying costs would need to exceed a materiality threshold of 5% above the initial bid price to be recoverable. To encourage further creativity, developers will be allowed to propose alternative risk-sharing proposals if they are submitted in addition to the developer's bid prepared on the above-described partial pass-through model. Developers are also free to propose methods to index their bid prices to changes in the cost of key elements so long as the indexes chosen are governmental in origin and not subject to influence or manipulation by developers.

CONCLUSION

As discussed above, the Commission adopts a comparative evaluation process and expanded procedural schedule contained in Appendix A. The Commission also adopts the Advisory Staff Recommendations with respect to cost recovery, cost allocation, and risk-sharing. Any developer that may be selected should file with FERC the cost allocation and risk-sharing methodologies we adopt herein. In the event we designate the congestion relief being investigated in these proceedings as a Public Policy Requirement under the NYISO's planning process and our Policy Statement, the Commission

expects that the NYISO will file these methodologies with FERC on behalf of any selected developer(s).

The Commission orders:

1. The Commission adopts the cost allocation and risk-sharing mechanisms, and cost recovery approach, as discussed in the body of this order.

2. The Commission adopts the procedural processes and schedule set forth in Appendix A. North America Transmission, LLC and North America Transmission Corporation (NAT), the New York Transmission Owners (NYTOs); NextEra Energy Resources, LLC (NextEra) and, Boundless Energy NE, LLC (Boundless) shall file with the Secretary in the application-specific docket to which the filing pertains (Cases 13-T-0454, 13-T-0455, 13-T-0456, 13-M-0457 and 13-T-0461), the information identified in Appendices B and C by January 7, 2015, and the information identified in Appendix D by January 19, 2015. Any information filed in any one of these cases shall be part of the common-record of all of these cases as well as of Cases 12-T-0502 and 13-E-0488. NAT, NextEra and Boundless shall file with the Secretary on or before February 27, 2015, in the application-specific docket to which the filing pertains, a notice that a System Reliability Impact Study (SRIS) was in progress pursuant to the tariff requirements of the New York Independent System Operator, Inc. (NYISO).

3. Trial Staff shall be designated prior to the January 7, 2015 deadline set forth above.

4. The Secretary, in sole discretion, may extend the deadlines set forth in this order relating to the AC Transmission Process. Any request for an extension must be in writing, include a justification for the extension, and be filed at least one day prior to any affected deadline. The deadlines in Appendix A for the "NYISO PPR Process" are merely anticipated

at this time and will be subject to further notification in that proceeding.

5. All intervenor funding matters shall be addressed directly to the Administrative Law Judges.

6. These proceedings are continued.

By the Commission,

(SIGNED) KATHLEEN H. BURGESS
Secretary

APPENDIX A

Table of Milestones and Deadlines

AC Transmission Process		**NYISO PPR Process**	
Milestone	**Deadline**	**Milestone**	**Deadline**
		NYISO Receives Public Policy Requirements Proposals	September 30, 2014
		NYISO Submits any Proposed Public Policy Requirements to the Commission	October 3, 2014
		SAPA Notice Published in State Register	November 12, 2014
Commission Decision on Advisory Staff Process Proposal	December 2014 Session*		
Deadline for Applicants to Submit Part A Data Required for NYISO Analysis at Request of DPS	January 7, 2015		
		Deadline for SAPA Comments	December 29, 2014
Deadline for Applicants to Submit Remainder of Part A Proposals Offered for Comparative Evaluation	January 19, 2015		
Deadline for Applicants to give notice that their SRIS is underway	February 27, 2015		
Deadline for Parties to Submit Written Comments on the Part A Submittals	March 4, 2015		
Deadline for Replies	March 19, 2015		
Part A MAPS Inputs Completed	April 15, 2015		
Part A Power Flow Analyses Completed	May 13, 2015		

* Note: The date for any action intended to occur at a Commission Session is to be established at the discretion of the Chair.

Table of Milestones and Deadlines
(Continued)

AC Transmission Process		**NYISO PPR Process**	
Milestone	**Deadline**	**Milestone**	**Deadline**
Part A MAPS Runs Completed	May 20, 2015		
Deadline for DPS Trial Staff Report and Motion	June 10, 2015		
Technical Conference	June 17-18, 2015	Technical Conference	June 17-18, 2015
Deadline for Responses to DPS Trial Staff Report and Motion	July 15, 2015	Deadline for Supplemental Comments on Proposed Public Policy Requirements	July 15, 2015
Deadline for Replies	July 30, 2015	Deadline for Replies	July 30, 2015
Commission Decision on DPS Motion	August or September 2015 Session*	Commission Decision on Public Policy Requirements; Commission Requests Winning Developers to Propose Transmission Solutions	August or September 2015 Session*
Comparative Phase Ends; Individual Article VII Cases Resume; Part B Scoping Process Commences	September 2015	NYISO Solicits Transmission Solutions	September 2015
		NYISO Receives Transmission Solutions Proposals	November 2015
Part B Applications Submitted	To Be Determined by ALJs	NYISO Begins Review of Solutions	To Be Determined by NYISO

* Note: The date for any action intended to occur at a Commission Session is to be established at the discretion of the Chair.

APPENDIX B

Part A Data to be filed by Applicants on January 7, 2015

(1) Modeling data that has been identified (see Appendix C).

(2) Provide the information identified in the New York Independent System Operators Open Access Transmission Tariff Attachment Y Sections 31.4.4.1 Developer Qualification and Timing and 31.4.5.1 Project Information Requirements, as follows:

31.4.4.1 Developer Qualification and Timing

The ISO shall provide each Developer with an opportunity to demonstrate that it has or can draw upon the financial resources, technical expertise, and experience needed to develop, construct, operate, and maintain a transmission solution to a Public Policy Transmission Need. The ISO shall consider the qualification of each Developer in an evenhanded and non-discriminatory manner, treating Transmission Owners and Other Developers alike.

The ISO shall make a determination on the qualification of a Developer to propose to develop a transmission project as a transmission solution to a Public Policy Transmission Need based on the following criteria:

31.4.4.1.1 The technical and engineering qualifications and experience of the Developer relevant to the development, construction, operation and maintenance of a transmission facility, including evidence of the Developer's demonstrated capability to adhere to standardized construction, maintenance, and operating practices and to contract with third parties to develop, construct, maintain, and/or operate transmission facilities;

31.4.4.1.2 The current and expected capabilities of the Developer to finance, develop and construct a transmission facility and to operate and maintain it for the life of the facility. For purposes of this criteria, the Developer shall provide the ISO a description of transmission facilities (not to exceed ten) that the Developer has previously developed, constructed, maintained or operated and the status of those facilities, including whether the construction was completed, whether the facility entered into commercial operations, whether the facility has been suspended or terminated for any reason, and evidence demonstrating the ability of the Developer to address and timely remedy any operational failure of the facilities; and

31.4.4.1.3 The Developer's current and expected capability to finance, or its experience in arranging financing for, transmission facilities. For purposes of the ISO's determination, the Developer shall provide the ISO:

(1) evidence of its demonstrated experience financing or arranging financing for transmission facilities, including a description of such projects (not to exceed ten) over the previous ten years, the capital costs and financial structure of such projects, a description of any financing obtained for these projects through rates approved by the Commission or a state regulatory agency, the financing closing date of such projects, and whether any of the projects are in default;

(2) its audited annual financial statements from the most recent three years and its most recent quarterly financial statement or equivalent information, if available;

(3) its credit rating from Moody's Investor Services, Standard & Poor's, or Fitch or equivalent information, if available;

(4) a description of any prior bankruptcy declarations, material defaults, dissolution, merger or acquisition by the Developer or its predecessors or subsidiaries occurring within the previous five years; and

(5) such other evidence that demonstrates its current and expected capability to finance a project to solve a Public Policy Transmission Need.

Any Developer seeking to be qualified may submit the required information, or update any previously submitted information, at any time. The ISO shall treat on a confidential basis in accordance with the requirements of its Code of Conduct in Attachment F of the ISO OATT any non-public financial qualification information that is submitted to the ISO by the Developer under Section 31.4.4.1.3 and is designated by the Developer as "Confidential Information." The ISO shall within 15 days of a Developer's submittal, notify the Developer if the information is incomplete. If the submittal is deemed incomplete, the Developer shall submit the additional information within 30 days of the ISO's request. The ISO shall notify the Developer of its qualification status within 30 days of receiving all necessary information. A Developer shall retain its qualification status for a three-year period following the notification date; provided, however, that the ISO may revoke this status if it determines

that there has been a material change in the Developer's qualifications and the Developer no longer meets the qualification requirements. A Developer that has been qualified shall inform the ISO within thirty days of any material change to the information it provided regarding its qualifications and shall submit to the ISO each year its most recent audited annual financial statement when available. At the conclusion of the three-year period or following the ISO's revocation of a Developer's qualification status, the Developer may re-apply for a qualification status under this section.

Any Developer determined by the ISO to be qualified under this section shall be eligible to propose a regulated transmission project as a transmission solution to a Public Policy Transmission Need and shall be eligible to use the cost allocation and cost recovery mechanism for regulated transmission projects set forth in Section 31.5 of this Attachment Y and the appropriate rate schedule for any approved project.

31.4.5.1 Project Information Requirements

Any Developer seeking to offer a transmission solution for Public Policy Transmission Needs must provide, at a minimum, the following details: (1) contact information; (2) the lead time necessary to complete the project, including, if available, the construction windows in which the Developer can perform construction and what, if any, outages may be required during these periods; (3) a description of the project, including type, size, and geographic and electrical location, as well as planning and engineering specifications as appropriate; (4) evidence of a commercially viable technology; (5) a major milestone schedule; (6) a schedule for obtaining any required permits and other certifications; (7) a demonstration of Site Control or a schedule for obtaining such control; (8) status of any contracts (other than an Interconnection Agreement) that are under negotiations or in place; (9) status of ISO interconnection studies and interconnection agreement; (10) status of equipment availability and procurement; (11) evidence of financing or ability to finance the project; (12) capital cost estimates for the project; (13) a description of permitting or other risks facing the project at the stage of project development, including evidence of the reasonableness of project cost estimates all based on the information available at the time

of the submission; and (14) any other information requested by the ISO.

A Developer shall submit the following information to indicate the status of any contracts: (i) copies of all final contracts the ISO determines are relevant to its consideration, or (ii) where one or more contracts are pending, a timeline on the status of discussions and negotiations with the relevant documents and when the negotiations are expected to be completed. The final contracts shall be submitted to the ISO when available. The ISO shall treat on a confidential basis in accordance with the requirements of its Code of Conduct in Attachment F of the ISO OATT any contract that is submitted to the ISO and is designated by the Developer as "Confidential Information."

A Developer shall submit the following information to indicate the status of any required permits: (i) copies of all final permits received that the ISO determines are relevant to its consideration, or (ii) where one or more permits are pending, the completed permit application(s) with information on what additional actions must be taken to meet the permit requirements and a timeline providing the expected timing for finalization and receipt of the final permit(s). The final permits shall be submitted to the ISO when available.

A Developer shall submit the following information, as appropriate, to indicate evidence of financing by it or any Affiliate upon which it is relying for financing: (i) evidence of self-financing or project financing through approved rates or the ability to do so, (ii) copies of all loan commitment letter(s) and signed financing contract(s), or (iii) where such financing is pending, the status of the application for any relevant financing, including a timeline providing the status of discussions and negotiations of relevant documents and when the negotiations are expected to be completed. The final contracts or approved rates shall be submitted to the ISO when available.

Failure to provide any data requested by the ISO within the timeframe provided in Section 31.4.4.3 of this Attachment Y will result in the rejection of the proposed solution from further consideration during that planning cycle.

APPENDIX C

IDENTIFIED DATA REQUIRED FOR POWERFLOW MODELING
(To be filed by Applicants on January 7, 2015)

The following data is required to model each portfolio. Additional data may be requested as necessary to accurately model the proposed projects.

AC Transmission

For each new or modified circuit, provide:

- From Bus, To Bus: Substations at which the circuit terminates
- Base kV: Nominal operating voltage in kV
- R, X: Line impedance in per unit on 100 MVA system base
- B: Total line charging susceptance in per unit on 100 MVA system base
- Normal rating: Summer peak 24 hour thermal rating in MVA
- LTE rating: Summer peak 4 hour long term emergency thermal rating in MVA
- STE rating: Summer peak 15 minute short term emergency thermal rating in MVA
- Common tower: Identify all other circuits that will share common towers with the circuit

Series Compensation

For each new series capacitor, provide:

- Circuit: Identify circuit to be compensated
- Location: Specify location of series compensation (e.g., which end of the circuit)
- X: Percentage compensation of the line
- Normal rating: Summer peak 24 hour thermal rating in MVA
- LTE rating: Summer peak 4 hour long term emergency thermal rating in MVA
- STE rating: Summer peak 15 minute short term emergency thermal rating in MVA

Transformers

For each new or modified transformer, provide:

- From Bus, To Bus: Substations at which the transformer terminates
- Voltage ratio: Nominal operating high side and low side voltages in kV
- R, X: Transformer impedance in per unit on 100 MVA system base
- Control Type: Fixed tap or voltage control
- Fixed Taps: Tap positions available

- Vmax, Vmin: Upper and lower voltage limits at the controlled bus
- Normal rating: Summer peak 24 hour thermal rating in MVA
- LTE rating: Summer peak 4 hour long term emergency thermal rating in MVA
- STE rating: Summer peak 15 minute short term emergency thermal rating in MVA

Substations

For each new substation, provide a breaker diagram depicting the connection of each element to the substation and corresponding breaker locations.

For each modified substation (e.g., new line connecting to existing substation) provide a breaker diagram depicting the connection of each element to the substation and corresponding breaker locations, OR provide a detailed description as to the modifications to the substation. Specifically identify other circuits in breaker positions adjacent to new or modified circuits.

APPENDIX D

Part A Materials to be filed by Applicants on January 19, 2015
(Remainder of proposals offered for comparative evaluation)

Part A Article VII application must include:

a. Payment for Intervenor Fund (85-2.4):
b. Application content (85-2.8(a), (b), (d) and (f)):
    i. Proposed Facility (85-2.8)
        1. a description of the proposed facility,
        2. location of proposed facility or right-of-way,
        3. explanation of need for the proposed facility, and
    ii. such other information as the applicant deems necessary or desirable.
c. Notice of Application, newspaper publication and proof of service (85-2.10)
d. General requirements for each exhibit (86.1)
e. Exhibit 1: General Information Regarding Application (86.2): Two additional requirements:
    i. applicant must include an e-mail address with applicant's contact information.
    ii. corporate applicant must identify whether it is incorporated under the Transportation Corporation Law.
f. Exhibit 2: Location of Facilities (86.3)(a)(1): Detailed maps, drawings and explanations showing the ROW,[1] including GIS shapefiles of facility locations and:
    i. NYSDOT 1:24,000 topographic edition showing:
        1. proposed ROW (indicating control points) covering an area of at least 5 miles on either side of the proposed centerline.
        2. Cross Sections of typical ROW depicting location and configuration of proposed and all existing overhead and underground facilities with typical design detail including height of structures and configuration of circuits for overhead facilities and diameter of pipe or conduit for underground facilities. geologic, historic resources listed on the state or national register of historic places, or scenic area, park, or wilderness within three miles on either side of the proposed

[1] Aerial photo requirement (86.3(b)) shifts to Part B as long as applicant uses 2010 or newer USGS topo for 1:24,000 mapping required by 86.3(a)(1).

centerline for an overhead facility; or within one mile of the proposed centerline for an underground or sub-aquatic segment.

ii. (86.3)(a)(2) – NYSDOT 1:250,000 scale or other recent edition topographic maps showing the relationship of the proposed facility to the applicant's overall system, with respect to:
   1. the location, length and capacity of the proposed facility, and of any existing appurtenances related to the proposed facility.
   2. the location and function of any structure to be built on, or adjacent to, the right-of-way (including switchyards; substations; series compensation station facilities; microwave towers or other major system communications facilities; etc.)
   3. the location and designation of each point of connection between an existing and proposed facility, and
   4. nearby, crossing or connecting rights-of-way or facilities of other utilities.

g. Exhibit 5: Design Drawings (86.6(a) and (b)): design, profile and architectural drawings and descriptions of proposed facility, including:
   i. the length, width and height of any structure, and
   ii. the material of construction, color and finish

h. Exhibit 7: Local Ordinances (86.8(4)):[2] Recent edition 1:24,000 topos with overlays showing:
   i. zoning; and
   ii. flood zones (include 100 year (1%) and 500 year (0.2%) flood hazard areas, and floodway locations, as available)

i. Exhibit E-1: Description of Proposed Transmission Line (88.1(a)-(d)): detailed description of proposed line, including:
   i. design voltage and voltage of initial operation
   ii. type, size, number and materials of conductors
   iii. insulator design
   iv. length of the transmission line

[2] Applicants are encouraged to show zoning districts as overlays on 1:24,000 scale topo maps, but may use other appropriate mapping that clearly relates the proposed facilities locations to zoning district maps.

j. Exhibit E-4: Engineering Justification (88.4)and new section of 85-2.8 addressing compatibility of the facility with the goals and benefits to New York's ratepayers identified in the Blueprint:
   i. summary of engineering justification for proposed line, showing its relation to applicant's existing facilities and the interconnected network, with full justification to be submitted in Part B;
   ii. summary of anticipated benefits with respect to reliability and economy to applicant and interconnected network. Specific benefits to be submitted in Part B;
   iii. proposed completion date, and impact on applicant's systems and of others' of failure to complete on such date;
   iv. appropriate system studies (see SIS notice requirement below);
   v. a general demonstration of how, and to what extent, the proposed transmission project meets the congestion relief, system reliability, reduction in regional air pollution and greenhouse gas emissions and the other benefits and objectives identified by the Commission in Case 12-T-0502; details of this demonstration shall be provided with Part B filing, along with the results of the NYISO studies required by 16 NYCRR 88.4 (a)(4);

k. Pre-Filed direct testimony of applicant's witnesses supporting Part A exhibits

2. Factual evidence showing how the project utilizes existing ROW and what additional land rights will need to be acquired.

3. Information on the use of any advanced technologies that are proposed to apply to facility design, construction or operations.

4. Notice that the SIS/SRIS studies are in progress (study scope accepted and work underway pursuant to a Study Agreement with the NYISO); and

5. Scoping statement and schedule: Describing how and when the applicant will produce the exhibits required for the Part B filing:

i. Exhibit 3 (86.4): Alternatives: applicant may use recent edition topographic maps (1:24,000). If any alternative is sub aquatic, applicant should use recent edition nautical charts to show any alternative route considered.(86.4)
ii. Exhibit 4 (86.5): Environmental Impact must include: assessment of impacts on ecological, land use, cultural and visual resources; noise analysis; coastal zone consistency (including local waterfront revitalization programs and designated inland waterway areas); efforts, if any, to minimize the emissions of greenhouse gases during the construction, operation and maintenance of the proposed facility; plans to ensure facility resilience to rising water tables, flooding, ice storms, coastal storm surges, and extreme heat.
iii. Exhibit 6 (86.7): Economic Effects of Proposed Facility
iv. Exhibit 7(86.8 (1),(3),(5) and (6): Local Ordinances where Facility modifications being made, including statement of consultations with municipalities and local agencies, summary table of all substantive requirements, zoning designation or classification, and list of regulatory approvals.
v. Exhibit 8(86.9): Other Pending Filings
vi. Exhibit 9(86.10): Cost of Proposed Facility modifications.
vii. Exhibit E-1 (88.1(e)(f)): Facility Description
viii. Exhibit E-2 (88.2): Other Facilities
ix. Exhibit E-3 (88.3): Underground Construction
x. Exhibit E-5 (88.5): Effect on Communications
xi. Exhibit E-6 (88.6): Effect on Transportation

a. Notice of Application and proof of notice and service (85-2.10)

Part A Initial Applications for projects that are not subject to Article VII must include:

1. Links to the full text and figures of all applications submitted to any state, local or federal agency related to the proposed project.
2. A list of the permits and approvals that the project sponsor is required to obtain for the construction and operation of the project, and a schedule for the submission of any applications or other filings not provided under item 1.
3. Where a lead agency has been identified and has made a determination of significance pursuant to SEQRA, a copy of the lead agency's determination.
4. A copy of the EAF reviewed by the lead agency in making its determination, or, if a determination has not been made, a copy of the Part 1 EAF submitted to the involved agency or agencies.
5. If the lead agency's determination of significance was positive, a schedule for the preparation and submission of a DEIS or a copy of the DEIS submitted to the lead agency.
6. If an applicant has yet to receive the lead agency's determination, a description of the status of the SEQRA review (including a proposed schedule for preparation and submission of a DEIS, assuming the determination will be positive).
7. A demonstration of how and to what extent the proposed project meets the congestion relief objectives identified by the PSC in Case 12-T-0502.
8. Factual evidence showing how the project utilizes existing ROW and what additional land rights they will need to acquire.
9. Information on the use of any advanced technologies that they propose to apply.

Additional information to be included in the Part A Materials to be filed by Applicants on January 19, 2015 (as a result of comments received):

Provide tables and summary information, and narrative description of facility impacts and compatibility with existing environmental conditions and land uses in the various project locations. Tables should address project total as well as segments individually (e.g., individual terminal facilities, and transmission line right-of-way from substation to substation).

Land Cover and Land Use

Land Cover Type Categories – Provide a table listing standard classifications (USGS NLCD 2011 mapping) and identify by classification the distance crossed, acres of areas included (a) in affected ROW and (b) within 500 feet of ROW limits.

Land Use Categories – Provide a table listing real property classifications codes based on NYS ORPS Land Use Classifications, identify by classification the distance crossed in miles, acres of areas included (a) in affected ROW and (b) within 500 feet of ROW limits.

Agricultural Lands – Provide a table indicating ROW Distance, area, acres of disturbance as either permanent or temporary impacts (include facility footprint for: transmission structures (indicating temporary and permanent installations); associated facilities (substations, etc.); access roads; staging or laydown areas; identify impacted lands using criteria above for the following categories:

Agricultural Lands crossed – identify specific categories including:

Use categories: croplands, haylands, pasture lands, reserve lands;

Agricultural Districts: including 'use categories' above and Farm Woodlands;

Orchards and Vineyards;

'Sugar Bush' woodland (managed for maple syrup production); and

Prime Soils; Soils of Statewide Significance.

Residential Areas – Provide a table listing by Towns crossed (and Cities or Villages as appropriate) the number of existing residences within 500 feet of the proposed facility by distance zones: 1 to 100 feet; 101 to 250 feet; 251 to 500 feet. Specify the location, number and type of any buildings and structures (residences, barns, garages, swimming pools) that may need to be acquired to accommodate facility construction and operation.

Population Densities: provide mapping of project location showing population density by municipality, using US Census Bureau, Census 2010 Demographic Profile Data.

Natural and Ecosystem Resources

Wetlands – Identify potential impact areas for facility footprints including structures and access roads for total mapped wetlands areas (using NYSDEC mapping for NYS-regulated wetlands; and USDI-NWI for federally identified wetlands; supplemented by ground survey information or remote-sensing techniques as applicable); provide tables listing individual wetlands distances crossed by facility ROW in feet; and total in miles; ROW in wetland area crossed in acres; anticipated number of structures within wetlands (based on site survey or typical design criteria based on structure type, height and span lengths anticipated); expected areas of wetland cover type conversions, specifying temporary and permanent impacts (e.g. wetland forest clearing and conversion to scrub-shrub or emergent marsh, etc.); and a characterization of probable impacts to significant wetlands benefits.

Rivers and streams: Provide a table identifying NYS Water Quality classification, number and distance crossed for river and stream crossings; number, length and acreage of proposed access road construction or improvements within river and streams crossed (bed and banks disturbance); provide a narrative discussion and tabular summary of cumulative effects on watershed areas for stream impacts within a common watershed.

Significant Coastal Habitats & Significant Natural Ecological Communities: Provide a table listing NYS DOS Significant Coastal Habitats and NYS DEC Significant Natural Ecological Communities within proposed facility ROW limits, indicating the distance of crossing; an estimate of the extent of disturbance anticipated due to facility construction including acres of clearing, length and acreage of access road improvements, number of transmission structures to be installed, and extent of excavation within the communities, if any.

Rare, Threatened or Endangered Species Habitats: Provide a table identifying and listing RT&E species locations and habitats for listed State and Federal Plants and Animals potentially crossed by or affected by transmission facilities and associated access roads and related facilities; indicate the distance of crossing; an estimate of the extent of disturbance anticipated due to facility construction including acres of clearing, length and acreage of access road improvements, number of transmission structures to be installed, and extent of excavation within the habitats, if any. Provide a confidential report addressing the nature of locations and habitats identified, potential impacts to RT&E species, feasible mitigation measures and the nature of probable impacts and avoidance strategies and mitigation measures.

Cultural Resources

For each designated or pre-determined eligible NRHP historic property and district in the project area, indicate:

(a) the distance and acreage directly crossed by the proposed facility ROW or permanent associated facilities (separately addressing any permanent or temporary access roads);

(b) distance to historic properties and districts not directly crossed by the facilities; and

(c) potential for visibility from the resource to the facilities.

Provide assessment of project visual impact on NRHP listed and eligible properties as per the Visual Assessment criteria below.

Visual Resources

Identify Visual resources within 3 miles study area; provide map of preliminary viewshed area based on assumed structure heights and screening by vegetation (specifying assumptions and applicable criteria); for facility locations within 5 miles of Dept. of State designated Scenic Areas of Statewide Significance (SASS), extend study area to 5 miles; list number of visual resources by category within projected areas of project visibility; and assess the degree of project visibility and probable extent of visual contrast change from existing conditions based on classes listed below. Provide

narrative assessment of visual contrast including rating of photosimulation depictions of facility appearance from representative visual receptor locations. Describe mitigation measures appropriate to minimize adverse visual impacts.

Areas in Visibility classes:

A. no change in extent of visibility – new structures at same height as existing or shorter than existing;
B. minor change - structures height increase by 10 feet or less;
C. structure height increase by more than 10 feet.

Areas in Qualitative Change classes:

A. no significant change in structure design (e.g., re-conductoring; lattice tower replaced by similar lattice tower);
B. structure change potentially significant (e.g. lattice replaced by monopoles with other lattice facilities remaining on ROW).

Sound Environment and Noise Assessment

For projects proposing the upgrade of existing or construction of new terminal or associated facilities such as substations, provide a preliminary assessment of the existing sound environment identifying the characteristics of the facility area and surrounding setting, distances from noise sources to surrounding critical noise sensitive receptors and site boundary lines. Report existing daytime and nighttime residual ambient (L90) sound levels based on field noise surveys performed during a representative period of time in line with applicable and relevant ANSI standards. Indicate potential for noise producing equipment (transformers, reactors, emergency generators, etc.) to increase existing residual ambient sound levels; and specify design goals and criteria for minimizing adverse environmental noise impacts on identified noise sensitive receptor locations (residences, property lines, public use areas, etc.). Provide a preliminary assessment of potential annoyance or community noise response associated with design goals and/or expected noise levels including the effect of any prominent tones as well as any limitations on future use of adjacent properties caused by noise emissions. Identify any local laws, noise ordinances or regulations applicable to noise levels due to operation or construction of the proposed terminal or associated facilities.

Storm Resiliency & Climate Change

Provide a table identifying the number and distance of river and stream flood hazard areas crossed (specify Floodways, Flood Hazard Zone A through E, etc.); and estimated number of permanent structures within river or stream flood hazard areas (specify estimates for transmission facility structures, access roads, culverts, and fill areas).

Provide a narrative description for each major flood hazard area (e.g., Mohawk River – Erie Barge Canal; Hudson River; Susquehanna River; Schoharie Creek) crossed by proposed facility, indicating characteristics of setting and proposed facility design measures to avoid or minimize potential impacts on facility reliability due to flooding and severe storm events.

Appendix F

STATE OF NEW YORK
PUBLIC SERVICE COMMISSION

At a session of the Public Service Commission held in the City of Albany on December 17, 2015

COMMISSIONERS PRESENT:

Audrey Zibelman, Chair
Patricia L. Acampora
Gregg C. Sayre
Diane X. Burman

CASE 12-T-0502 - Proceeding on Motion of the Commission to Examine Alternating Current Transmission Upgrades.

CASE 13-E-0488 - In the Matter of Alternating Current Transmission Upgrades - Comparative Proceeding.

CASE 13-T-0454 - Application of North America Transmission Corporation and North America Transmission, LLC for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII of the Public Service Law for an Alternating Current Transmission Upgrade Project Consisting of an Edic to Fraser 345 kV Transmission Line and a New Scotland to Leeds to Pleasant Valley 345 kV Transmission Line.

CASE 13-T-0455 - Part A Application of NextEra Energy Transmission New York, Inc. for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII of the Public Service Law for the Marcy to Pleasant Valley Project.

CASE 13-T-0456 - The Part A Application of NextEra Energy Transmission New York, Inc. for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII for the Oakdale to Fraser Project.

CASE 13-M-0457 - Application of New York Transmission Owners Pursuant to Article VII for Authority to Construct and Operate Electric Transmission Facilities in Multiple Counties in New York State.

CASE 12-T-0502, et al.

CASE 13-T-0461 - Application of Boundless Energy NE, LLC for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII for Leeds Path West Project.

CASE 14-E-0454 - In the Matter of New York Independent System Operator, Inc.'s Proposed Public Policy Transmission Needs for Consideration.

ORDER FINDING TRANSMISSION NEEDS DRIVEN BY PUBLIC POLICY REQUIREMENTS

(Issued and Effective December 17, 2015)

BY THE COMMISSION:

INTRODUCTION

The first seven above-captioned proceedings constitute the "AC Transmission" proceedings, a number of proceedings initiated for the Public Service Commission (Commission) to consider potential actions to address long-standing concerns that there is insufficient transmission capacity between upstate power generation sources and downstate consumers on New York's alternating current (AC) bulk electric transmission system. The eighth above-captioned proceeding was initiated for the Commission to fulfill its role on behalf of the State of New York pursuant to the Public Policy Transmission Planning Process regulated by the Federal Energy Regulatory Commission (FERC) to identify transmission needs driven by public policy requirements. As these matters are interrelated, they are being heard and considered by the Commission on a common record.

In this order, the Commission finds and determines that there is a transmission need driven by Public Policy Requirements for new 345 kV major electric transmission facilities to cross the Central East and UPNY/SENY interfaces to provide additional transmission capacity to move power from upstate to downstate. Those transmission interfaces have been

persistently congested and such congestion contributes significantly to higher energy costs and reliability concerns, whereas increasing the transfer capability of those sections of the transmission system could produce a number of valuable benefits for New York.

This finding will trigger a solicitation and review of transmission and other solutions by the New York Independent System Operator (NYISO) with the potential for selected transmission developers to obtain cost recovery for their development and construction costs from the beneficiaries of the transmission upgrades through the NYISO tariff mechanism regulated by FERC. As part of the NYISO Public Policy Transmission Planning Process, the Commission will be required to take future action to decide, after the NYISO has completed its viability and sufficiency analysis, whether a transmission solution should continue to be analyzed by the NYISO. Ultimately, if transmission solutions are selected in the NYISO/FERC process, the Commission will also have to decide, after further process including public statement hearings, whether to grant Public Service Law, Article VII major electric transmission facility siting certificates for the selected solutions.

LEGAL AUTHORITY AND BACKGROUND

Pursuant to the federalism principles of our system of government, the Federal Energy Regulatory Commission (FERC) and the States share the power to regulate bulk electric transmission facilities. FERC regulates the rates that can be charged for the use of the interstate bulk electric transmission system (Federal power to regulate interstate commerce), which includes deciding issues of cost allowance and cost allocation. The States generally regulate the siting of new major electric

transmission facilities in their jurisdictions, and the States and not FERC establish public policies. This Federal-State interplay means that for a new major transmission facility to be built or operated, it may require both a Federal approval as to cost recovery, and State approvals as to siting and public policy.

The New York Independent System Operator (NYISO) periodically conducts a four-part Comprehensive System Planning Process (CSPP) pursuant to the regulatory authority of FERC. The requirements of each part of the planning process are contained in Attachment Y of the NYISO's Open Access Transmission Tariff (NYISO Tariff) approved by FERC. The four components of the planning process are as follows: (1) Local Transmission Planning Process (LTPP); (2) Reliability Planning Process (RPP); (3) Congestion Assessment and Resource Integration Study (CARIS); and (4) Public Policy Transmission Planning Process.[1] This order involves the fourth component of the Comprehensive System Planning Process, the Public Policy Transmission Planning Process.

The Public Policy Transmission Planning Process (PPTPP) supports the FERC Order No. 1000 directive requiring public utility transmission providers to consider transmission needs driven by public policy requirements established by state or federal laws or regulations. Its main importance is that it provides a vehicle for cost recovery for the entity that

[1] The LTPP includes identification and evaluation of solutions to local transmission needs identified by local Transmission Owners (TOs). The RPP includes an assessment of the reliability of the New York bulk power system through a Reliability Needs Assessment (RNA) and a Comprehensive Reliability Plan (CRP) to satisfy any identified reliability needs. The CARIS process is an economic assessment of congestion on the New York bulk power system, the costs and benefits of generic alternatives to alleviate that congestion, and of specific transmission project proposals.

constructs and operates a needed transmission solution. The PPTPP consists of four main steps: (1) the identification of Public Policy Transmission Needs; (2) the proposal of solutions to identified Public Policy Transmission Needs; (3) the evaluation of the viability and sufficiency of proposed transmission and non-transmission solutions to a Public Policy Transmission Need; and (4) the evaluation and selection of the more efficient or cost effective Public Policy Transmission Project to satisfy a Public Policy Transmission Need.

A Public Policy Requirement is defined in the tariff as a federal or state law or regulation, including a Public Service Commission rulemaking order adopted after public notice and comment under state law,[2] which drives the need for transmission.[3] Under New York State law, such a rulemaking order by the Public Service Commission can be either of general or particular applicability.[4]

In the first main step, regarding identification, the NYISO solicits proposals for Public Policy Transmission Needs, and the Public Service Commission role is to consider the proposals in order to identify the Public Policy Transmission Needs and also to determine for which of those the NYISO should solicit solutions. The NYISO Tariff provides that:

> [the Commission] shall issue a written statement that identifies the relevant Public Policy Requirements driving transmission needs and explains why it has identified the Public Policy Transmission Needs for which transmission solutions will be requested by the ISO. The statement shall also explain why transmission solutions to other suggested transmission needs should not be requested. The [Commission's]

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[2] New York Independent System Operator, Inc., 143 FERC ¶ 61,059 (2013), p.60 [See Docket No. ER13-102-000, Order on Compliance Filing (issued April 18, 2013)].

[3] NYISO OATT, Attachment Y, §31.1.1.

[4] N.Y.S.A.P.A. § 102(2)(a)(ii)(McKinney 2015).

> statement may also provide additional criteria for the evaluation of transmission solutions and non-transmission projects, and the type of analyses that it will request from the ISO.[5]

This order is part of that first main step. It constitutes the preliminary State public policy approval called for in the NYISO Tariff by the Commission identifying a Public Policy Transmission Need for which the NYISO should solicit solutions.

Subsequent to the identification of a Public Policy Transmission Need, the NYISO solicits proposed solutions, and Developers submit Public Policy Transmission Projects and Other Public Policy Projects to satisfy the identified Public Policy Transmission Needs. All submissions, regardless of project type, are evaluated for their viability and sufficiency to meet the Public Policy Transmission Needs. Upon a confirmation by the Public Service Commission that a need for a transmission solution still exists, the NYISO then evaluates the proposed regulated Public Policy Transmission Projects that have satisfied the viability and sufficiency requirements and ranks them based on the quality of their satisfaction of numerous metrics. Based on this evaluation, the NYISO may select the more efficient or cost effective regulated Public Policy Transmission Project to satisfy any Public Policy Transmission Need. A selected project is eligible for cost recovery and cost allocation under the NYISO Tariff, in a manner to be determined by FERC. As described above, any selected Public Policy Transmission Project will likely also need separate State approvals as to siting before it may be built or operated.

[5] NYISO OATT, Attachment Y, §31.4.2.1.

NOTICE OF PROPOSED RULE MAKING

Pursuant to the State Administrative Procedure Act (SAPA) §202(1), a Notice of Proposed Rulemaking was published in the State Register on October 7, 2015 [SAPA No. 12-T-0502SP5] regarding whether a need for new 345 kV major electric transmission facilities to cross the Central East and UPNY/SENY interfaces to provide additional transmission capacity to move power from upstate to downstate New York is driven by Public Policy Requirements. The time for submission of comments pursuant to the Notice expired on November 23, 2015. Moreover, the Secretary issued an additional notice on September 23, 2015 soliciting comments and establishing a deadline of November 6, 2015 for initial comments, and November 23, 2015 for reply comments. The SAPA notice described above was issued subsequent to an earlier SAPA notice that was published in the State Register on November 12, 2014.[6] While the earlier SAPA notice covered the topic of the October 7, 2015 SAPA notice on a broader basis, it also covered two other categories of potential Public Policy Transmission Needs (i.e., Western New York congestion relief, and various other environmental and system-related needs), all of which were submitted to the Commission by the NYISO on October 3, 2014, in response to a NYISO Public Policy Transmission Planning Process solicitation. By an order issued on July 20, 2015, the Commission decided to defer consideration of whether to identify the transmission congestion that exists at the Central East and UPNY/SENY electrical interfaces as a Public Policy Requirement until certain analyses in the AC Transmission proceedings were complete and could be

[6] Comments under that notice were due December 29, 2014.

considered.[7] Those analyses resulted in the more specific definition of the transmission need now described in the October 7, 2015 SAPA notice. The relevant comments received pursuant to all of the notices described above are addressed below. In addition, a significant number of public comments have been received throughout the course of these proceedings. The public comments are generally reflected in the party comments and the Commission is greatly appreciative of the efforts taken to inform the Commission.

PROCEDURAL BACKGROUND

On August 1, 2014, the NYISO commenced its Public Policy Transmission Planning Process specified under the NYISO Tariff by requesting interested entities to identify any potential transmission needs that may be driven by a Public Policy Requirement (Public Policy Transmission Needs). On October 3, 2014, the NYISO filed, for the Commission's consideration, the proposed Public Policy Transmission Needs it received from eight entities. The proposals cover three broad categories, including those related to (a) the Commission's AC Transmission proceedings; (b) Western New York congestion relief; and (c) various other environmental and system-related needs. As mentioned above, by an order issued on July 20, 2015, the Commission decided to defer consideration of whether to identify the transmission congestion that exists at the Central East and UPNY/SENY electrical interfaces as a Public Policy Requirement until certain analyses in the AC Transmission proceedings were complete and could be considered.

[7] Case 14-E-0454, New York Independent System Operator, Inc. - Public Policy Transmission Needs, Order Addressing Public Policy Requirements for Transmission Planning Purposes (issued July 20, 2015), p.30 [Commissioner Burman concurring].

The Commission had previously initiated the AC Transmission proceedings to consider whether to address the persistent transmission congestion that exists at the Central East and Upstate New York/Southeast New York (UPNY/SENY) electrical interfaces. The Commission sought proposals from transmission owners and other developers proposing projects to increase transmission transfer capacity by approximately 1,000 MW as recommended by the Governor's Energy Highway Task Force. After an initial round of proposals were received that raised environmental siting concerns, the Commission called for revised proposals that would better utilize existing rights-of-way and better match the scale of proposed transmission structures to be in keeping with existing facilities already in the landscape. The Commission's directive was consistent with Governor Cuomo's declaration in the 2014 State of the State Address that the State must encourage utilities and transmission developers to build wholly within existing transmission corridors, where possible, in order to minimize impacts and responsibly site projects in a way that is responsive to the concerns of local communities.

Twenty two revised proposals were received from four entities: North America Transmission LLC and North America Transmission Corporation (NAT), the New York Transmission Owners (NYTOs),[8] NextEra Energy Transmission New York, Inc. (NextEra), and Boundless Energy NE, LLC (Boundless) (collectively, the Applicants). Many of the revised proposals included significant revisions to address environmental compatibility issues. Thereafter, the Commission directed Trial Staff, with the

[8] The NYTOs include Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., New York Power Authority, New York State Electric & Gas Corporation, Niagara Mohawk Power Corporation, Orange and Rockland Utilities, Inc., and Rochester Gas and Electric Corporation respectively.

assistance of the NYISO, to undertake a comparative evaluation of the project proposals. The comparative evaluation study required significant computer modeling of power flows, electric generation production cost benefits, and electric generation capacity cost benefits and resulted in benefit cost analyses. In addition, each project was analyzed as to its specific environmental impacts. At the request of the Hudson Valley Smart Energy Coalition (HVSEC) and others, the study also included an analysis of alternatives to a transmission facility to address the issue of whether there is sufficient public need for a transmission solution as a matter of public policy.

An initial result of that analysis was the Trial Staff Interim Report dated July 6, 2015, which addressed primarily the issues of environmental compatibility and beneficial electric system impacts on the Central East and Upstate New York/Southeast New York (UPNY/SENY) electrical interfaces. On June 12, 2015, it had been announced in the press that the planned 720 MW CPV Valley generation facility had obtained its financing and would be proceeding to construction. This significant change in the New York bulk electric system required Trial Staff to update its power flow, production cost benefit, and capacity cost benefit studies to reflect the change. Therefore, it was necessary for the projects to be further studied considering the effects of the planned 720 MW CPV Valley generating facility.

Pending that revised analysis, Trial Staff issued the Interim Report of its findings, and the parties to the AC Transmission proceedings met in a Technical Conference to review the findings and exchange further information. The initial Technical Conference focused primarily on issues of environmental compatibility and cost. HVSEC also presented its

environmental compatibility findings at the Technical Conference.

On September 22, 2015, Trial Staff issued its Final Report and a companion Motion recommending that the Commission find that there is a transmission need driven by Public Policy Requirements for new 345 kV major electric transmission facilities to cross the Central East and UPNY/SENY interfaces to provide additional transmission capacity to move power from upstate to downstate. The Trial Staff report included a comprehensive comparative analysis of the twenty-two project proposals which was used to identify the best proposals in a winnowing process using relative environmental impact, electric system impact (including modeling by the NYISO), and benefit and cost data and analysis (provided in the "Brattle Report" produced for the NYISO and Trial Staff attached to the Final Report).

Again the parties to the AC Transmission proceedings met in a Technical Conference to review the findings and exchange further information. The second Technical Conference focused primarily on issues of benefits, costs, and overall need. HVSEC also presented its peak load and congestion forecast findings at the Technical Conference.

TRANSMISSION NEED DRIVEN BY PUBLIC POLICY REQUIREMENTS

In the order instituting Case 12-T-0502, the Commission explained that the transmission corridors that include the Central East and UPNY/SENY electrical interfaces were persistently congested and contributing to higher energy costs and reliability concerns. The Commission recognized that upgrades to those sections of the transmission system could produce various benefits for New York, including: 1) enhancing system reliability, flexibility, and efficiency; 2) reducing

environmental and health impacts; 3) increasing diversity in supply; 4) promoting job growth and the development of new efficient generation resources upstate; and, 5) mitigating reliability problems that may arise with expected generator retirements.[9]

Trial Staff in its Motion recommends that the Commission should find and determine that there is a transmission need driven by Public Policy Requirements as described in the Trial Staff Final Report for a portfolio of 345 kV transmission projects to reconfigure and upgrade transmission facilities from the Edic or Marcy substations to the New Scotland substation with a tie-in to the Rotterdam substation, and from a new Knickerbocker substation to the Pleasant Valley substation (with upgrades at the Greenbush substation). This portfolio included the concept most succinctly defined by Project P11 in the Trial Staff Interim and Final Reports. Three developers identified portfolios of projects and alternatives that are readily comparable (NYTOs P6 and P11; NAT P5; and NextEra P17 and 19c), and that Staff recommended advance to the next levels of review. Trial Staff recommends that these comparable facilities, locations and routes are most promising from an electric system benefit perspective, and are significantly more environmentally compatible primarily because they are designed to use existing rights-of-way, and generally replace existing facilities with new facilities while largely avoiding significant new intrusions into existing communities, landscapes and important farmland resources. Trial Staff concluded that the identified portfolio of projects beneficially balance the issues of transfer

[9] Case 12-T-0502, Alternating Current Transmission Upgrades, Order Instituting Proceeding (issued November 30, 2012), pp. 1-2.

capability; cost; electric system impacts; emissions and production cost impacts; need to acquire additional rights-of-way; the application of innovative technologies; environmental compatibility; and visual impacts. Trial Staff asserts that its analysis demonstrates that the identified portfolio of projects will reduce transmission congestion so that large amounts of power can be transmitted to regions of New York where it is most needed; reduce production costs through congestion relief; reduce capacity resource costs; improve market competition and liquidity; enhance system reliability, flexibility, and efficiency; improve preparedness for and mitigation of impacts of generator retirements; enhance resiliency/storm hardening; avoid refurbishment costs of aging transmission; take better advantage of existing fuel diversity; increase diversity in supply, including additional renewable resources; promote job growth and the development of new efficient generation resources Upstate; reduce environmental and health impacts through reductions in less efficient electric generation; reduce costs of meeting renewable resource standards; increase tax receipts from increased infrastructure investment; enhance planning and operational flexibility; obtain synergies with other future transmission projects; and relieve gas transportation constraints.

Trial Staff also reviewed non-transmission alternatives including the alternatives of constructing a new generation facility and the possibility of promoting a targeted level of customer-driven energy efficiency and demand reduction benefits associated with the Reforming the Energy Vision (REV) initiative. The results of Trial Staff's generation alternative analysis shows that adding a 1,320-MW combined cycle natural gas facility where the plant could be dispatched to meet the needs in SENY would not be cost-effective or a better alternative for

ratepayers. The results of Trial Staff's REV alternative analysis shows that adding 1,200 MW of Distributed REV resources among Zones G-J (SENY area) would cost approximately $2.63 billion with measure lives between 10 and 25 years and would have an approximate benefit/cost ratio of 1.2 that is nearly identical to the benefit/cost ratio for the portfolio of transmission projects identified by Trial Staff as the preferred solution. Trial Staff concluded that REV type measures complement the transmission solutions proposed, but do not address many of the transmission specific benefits that have been identified for the transmission solutions.

The NYISO points to the annual publication of *Power Trends 2014*, which it asserts highlights the need to update the transmission system. The NYISO maintains that New York's transmission infrastructure is aging and needs to be upgraded and replaced, and that transmission upgrades would bring many necessary and important benefits.

The NYTOs provide support for their proposal to designate the Commission's AC Transmission Upgrades proceedings as a Public Policy Requirement that is driving the need for transmission improvements. Their comments point to existing studies and findings which they believe show a clear need for AC transmission improvements to address the public policy goals established by the Commission's AC Transmission Upgrades proceedings and the Governor's Energy Highway Blueprint. The NYTOs point to multiple benefits of AC transmission upgrades across the UPNY/SENY and Central East interfaces, including congestion relief, improved reliability through replacement of aging infrastructure, environmental benefits through the ability to dispatch cleaner resources, a more flexible transmission system capable of withstanding various contingencies,

transmission system resiliency, fuel resource diversity, and economic development benefits.

The NYTOs focus on system efficiency and congestion relief and point to the NYISO's 2013 Congestion Assessment and Resource Integration Study (CARIS), which shows that system congestion can cost ratepayers between $500 million and $2.5 billion annually. Even with the recent downtrend in congestion cost over the past few years due to a slow economy and an abundance of natural gas resources, the NYTOs note that the NYISO is projecting that congestion costs will increase to over $900 million by 2020.[10]

Further, the NYTOs argue that a robust transmission system allows the flexibility to address contingencies that may occur as a result of generation retirements, and could avoid costly and uneconomic gap solutions and reliability contracts. With adequate transmission, the NYTOs contend, generators that have become uneconomic or obsolete would be permitted to retire without adverse reliability or economic impacts.

Boundless Energy NE, LLC (Boundless) points to several statements and determinations made by the Energy Highway Initiative Task Force, and by the Commission, which they maintain supports the need for additional transmission capacity in the State. Boundless notes the difference between transmission and non-transmission solutions, suggesting that allowing non-transmission solution options to supplant the transmission solutions under consideration in the AC Transmission Upgrades proceedings would introduce regulatory issues.

West Point Partners, LLC (West Point Partners) endorses Public Policy Requirements to relieve congestion between upstate and downstate New York, ease limitations on

[10] NYISO 2013 CARIS, p.49.

developing upstate renewable resources, provide access to lower cost and cleaner energy for downstate energy users, improve resource diversity, and enhance the flexibility of the system to address major contingencies such as the possible retirement of Indian Point. It points to the Commission's proceedings addressing the AC Transmission Upgrades and Indian Point Reliability Contingency Plan, and the 2014 Draft State Energy Plan as establishing Public Policy Requirements. It also notes that the NYISO has urged new investment in transmission and generation to maintain system reliability and reduce costs, which in turn would provide access to renewable resources, upgrade aging infrastructure, and provide greater operational flexibility.

Entergy[11] opposes proposals related to the New York Energy Highway Blueprint. Entergy maintains that the Blueprint has not been adopted as a rule of general applicability by any New York State agency, and thus cannot constitute a regulation promulgated under SAPA in the form of a Commission order, and therefore does not meet the definition of a Public Policy Requirement under the NYISO Tariff.

Scenic Hudson, Inc. (Scenic Hudson) opposes the designation of the AC Transmission proceedings as a Public Policy Requirement for three main reasons. First, Scenic Hudson contends that there is no established law, regulation, or order establishing relief of congestion on the UPNY/SENY and Central East interfaces. They suggest that the only apparent source identifying congestion relief as a policy goal is the New York Energy Highway Blueprint, which recommends transmission upgrades capable of providing approximately 1,000 MW of additional transfer capacity between upstate and downstate. However,

[11] Entergy Nuclear Fitzpatrick, LLC, Entergy Nuclear Indian Point 2, LLC, Entergy Nuclear Indian Point 3, LLC, and Entergy Nuclear Operations, Inc. (collectively, "Entergy ').

Scenic Hudson does not believe the Energy Highway Blueprint qualifies as a law or regulation and therefore cannot be the basis for designating a Public Policy Requirement. Second, Scenic Hudson argues that transmission projects which increase transfer capability across UPNY/SENY and Central East will not produce congestion reduction benefits that justify their costs. Scenic Hudson points to the NYISO's 2013 CARIS, which projects congestion across the UPNY/SENY and Central East interfaces will decline over the 10-year planning horizon, and that the costs of a generic transmission solution will not be economically beneficial. Lastly, Scenic Hudson points to countervailing public policies that would be negatively impacted by construction of transmission projects to relieve congestion in the Hudson River and Hudson Valley region. Scenic Hudson notes several federal and State policies which promote environmental protection and conservation of this region, including the Hudson River Estuary Management Plan, the New York State Open Space Plan, the Mid-Hudson Regional Economic Development Council Strategic Plan, and the New York State Department of State Coastal Management Plan. The Town of Milan/Farmers and Friends for Livingston/Town of Pleasant Valley (Milan/Pleasant Valley) and Farmers and Families for Claverack supports the comments submitted by Scenic Hudson. Columbia Land Conservancy similarly supports Scenic Hudson's comments and also notes its involvement in the New York State Open Space Conservation Plan, the Hudson River Estuary Action Agenda, and the Capital Region Economic Development Council's Strategic Plan, as public policy agendas whose activities would be jeopardized by building new transmission projects in the proposed corridors.

According to Hudson Valley Smart Energy Coalition (HVSEC), the NYISO's Final Report on the 2014 Comprehensive Reliability Plan, dated July 21, 2015, demonstrates that there

is no reliability concern over the next ten years; consequently, it argues there is no reliability justification for new transmission lines in the Hudson Valley. HVSEC argues that the degree of congestion has been coming down (except for the last two winters due to the Polar Vortex) and that Staff's analysis failed to address this. It also claims the congestion analysis in the Brattle Report is flawed because it fails to assume an increase in the gas supply network leading to predicted congestion rents in 2019 and 2024 along the Central East and New Scotland-Pleasant Valley constrained paths of over $300 million, which is twice as high as the historical average. It further argues that the Brattle Report, the 2013 Congestion Assessment and Resource Integration Study, and draft 2015 CARIS predict declining congestion. In addition, it notes that the 2013 CARIS report indicates congestion costs are declining. Based on these reports, HVSEC argues that transmission and generation solutions do not come close to a benefit/cost of greater than 1.0, and so are ineligible for regulated cost recovery.

Trial Staff reported that there has historically been significant congestion across the Central East interface (between western New York and the Hudson Valley), and Brattle and the NYISO forecast this congestion to continue. London Economics International, LLC (LEI), on behalf of HVSEC, prepared a forward-looking market study of energy and capacity prices, for the years 2016-2034. LEI used its proprietary simulation model, POOLMod, to project regional electric energy prices, Locational Based Market Prices (LBMPs) and zonal Installed Capacity (ICAP) prices. LEI's forecast analysis relied on NYISO's 2015 Gold Book demand forecasts; considered how the generation fleet would evolve based on modeled market dynamics; derived three future price paths for delivered natural gas prices. Two of these futures assume pipeline expansions and

capacity to occur due to market forces. LEI states that the focus on natural gas is because of the large percentage of generators within the NYCA that rely on natural gas as their fuel, and the price of natural gas has a strong impact on electricity price levels and the market value of transmission congestion. LEI did not directly assess or otherwise evaluate the potential market impacts of any of the proposed AC transmission projects under review. Given its assumptions and inputs and resulting computer simulations, LEI concluded that under all three of its gas scenarios, congestion across Central East and UPNY/SENY interfaces is forecast to decline as a result of a lower difference in locational gas prices between eastern and western New York. According to LEI, the declining trend is stronger in those scenarios where the natural gas price difference between eastern and western New York is smallest. Other drivers for the decline in congestion include the entry of new generating resources in eastern New York, especially the lower Hudson Valley and New York City. Retirements of western New York generation also contribute to the lower congestion level when compared to recent years.

In reply, Trial Staff notes that the contrary forecast by LEI is based on LEI's assumption of new gas pipeline construction in the Hudson Valley and Trial Staff observes that LEI fails to explain who would pay for all the new gas pipelines LEI assumes.

NYTOs urge that no weight be given to the LEI analysis. NYTOs assert that several areas of LEI’s study are questionable, and understate the level of congestion and associated congestion cost. These include:

1 LEI analyzed infrastructure using speculative expansion of infrastructure that causes the problem to appear solved when it is not solved;

2. LEI presented a few cases and failed to provide an expected or probability weighted case. This is a variance with previous LEI analysis and is a fatal flaw in its approach;

3. LEI presented unrealistic gas price differentials. Not even the warmest winter ever had this low a price differential;

4. LEI failed to sufficiently document long term pipeline expansion and hence the assumptions regarding pipelines are unrealistic;

5. LEI's new power plant builds are another example of speculative infrastructure projects; and

6. LEI's CO2 assumptions are unreasonably low. They give no weight to the recently finalized Environmental Protection Agency *Clean Power Plan*.

NAT urges that the LEI Report is based on flawed assumptions regarding new downstate generation supply and natural gas supply in the state. In fact, the assumptions on which the LEI Report are based contradict assumptions used by LEI in other analyses conducted with respect to the New York markets. Because the LEI Report is based on flawed assumptions, NAT argues that its conclusions should not be relied upon by the Commission. According to NAT, among the flawed assumptions is the unrealistic assumption of 1,250 MW for new generation capacity in NYISO zones J and K before 2021. NAT goes on to state that it is highly speculative to assume that a new generation facility will enter service in this relatively short time period given the many constraints and challenges of siting generation within the downstate load pocket, such as limited real estate, air quality issues and lengthy permitting processes. Another flawed assumption in the LEI Report identified by NAT is that there will be an equalization of natural gas prices between eastern and western New York. NAT believes it is highly speculative that the persistent difference

in gas prices between eastern and western New York will simply just disappear. A conclusion that the delivered natural gas price would equalize assumes both significant new natural gas pipeline capacity and that the incremental shipping cost on this new natural gas pipeline capacity would be zero. Moreover, LEI does not appear to have used the same assumptions in at least one other study it conducted with respect to New York markets. The assumptions in the LEI Report prepared on behalf of HVSEC are not consistent with the report completed by LEI on behalf the Champlain Hudson Power Express (CHPE) project. The CHPE project, similar to the goals of this proceeding to increase the UPNY/SENY interface, proposes to add approximately 1,000 MW of new capacity to NYISO Zone J. The LEI report prepared on behalf of the CHPE project identified an average of over $800 million per year in energy savings from an additional 1,000 MW of new transmission capacity which is in stark contrast to the report LEI prepared in this proceeding. In addition, the LEI report on behalf of CHPE identifies many other benefits of new transmission capacity such as impacts on capacity markets, reduction in market power, renewable policy benefits, decreased system losses, and improved system reliability.

HVSEC argues that new transmission will not facilitate additional renewable resources, including wind, but rather will increase emissions and increase generation from coal-burning plants. HVSEC also claims the greatest demand in New York is closest to the area with the greatest capacity for offshore wind power. Because the federal government has identified an area off Long Island for development of offshore wind farms as an area to increase the amount of renewable energy in the next decade, HVSEC claims new transmission is not needed to meet the State’s renewable energy goals. In addition, HVSEC argues that the transmission projects will not help increase existing or

proposed upstate wind resources because the constraints on these resources are a result of constraints on the local 115 kV transmission system, not the UPNY/SENY or Central East interfaces.

HVSEC cites the 2015 Gold Book to show that historic trends in peak demand and peak load growth for the downstate region (Zones G to K) are declining. HVSEC also cites a report prepared for it by Gidon Eshel, Ph.D., a geophysicist and applied mathematician by training, a Senior Scientist at Northwest Research Associates and a Bard College environmental physics research professor, entitled "Hudson Valley Transmission Line Plan: Updated Analysis of Need & Alternatives," which criticizes the NYISO for projections that systematically overestimate future downstate peak load, and concludes that no additional transmission capacity into the downstate region is needed. According to Dr. Eshel, there are more than sufficient transmission and generation projects available, even assuming Indian Point retires, to serve in the unlikely event demand increases. Therefore, HVSEC argues, building unnecessary transmission infrastructure makes no sense. Dr. Eshel goes on to state that reducing congestion is not wise and asserts that it is fundamental that congestion is an asset, not a liability. He further asserts that congestion raises power prices for a few hours on a few afternoons a year.

In its comments NYISO maintains that its forecasting methodologies are consistent with well-established industry practices that have been proven effective and appropriate through widespread application. According to the NYISO, Dr. Eshel’s arguments to the contrary provide no sound basis to change the proven methods employed by the NYISO and the utility industry as a whole.

Dr. Eshel argues that because of the amount of projects listed in NYISO's interconnection queue for new generation projects no need exists for the proposed transmission upgrades even after discounting by 45%-50% for completion rates of projects. NAT in its comments points out that Dr. Eshel's generation supply forecast assumes an unrealistic completion rate of generation in the NYISO queue. Significantly, the analysis contained in the Eshel Report, according to NAT, is based on the flawed assumption that completion rates of proposed queued generation is in the range of 45% to 50%. NAT asserts the best available information regarding completion rates of queued generation proves the assumed completion rates to be extremely optimistic. In the Eshel Report, the assumed completion rates of resources in the queue are approximately four times greater than the historic completion rate of 11.6%. The NYISO queue indicates fifteen (15) different values for status progressing from scoping meeting, various impact studies, interconnection agreement, construction, and completion. NAT also points out how generation interconnection requests progress through the PJM queue, similar to that of the NYISO, for a large number of requests (289,742 MW) with a completion rate of 11%.

HVSEC also argues that the Brattle Report included more benefits than are typically considered in evaluating transmission projects in order to calculate a benefit/cost ratio of over 1.0 for the P11 Project. According to HVSEC, the REV alternative provides all the benefits relied upon by the Brattle Report other than avoided refurbishment costs, which is the largest benefit metric for the P11 Project. It argues that the Brattle Report overstates this benefit category and fails to provide evidence that the new AC transmission would provide any deferral of refurbishment. Consequently, HVSEC claims the

refurbishment benefit should not be given anywhere near equal weight as production cost savings in the Benefit/Cost analysis.

HVSEC argues the REV solution is superior to the AC transmission solutions in almost every metric and has an identical benefit/cost ratio – 1.2 to the P11 Project. HVSEC also claims that REV performs comparably, if not better than, the transmission projects in the category of non-quantified benefits, including: job creation; system reliability and offsetting potential retirements in SENY; the need for future transmission projects; market benefits; and storm resiliency. The only non-quantified benefits the transmission projects have that differ from REV's benefits are synergies with other future transmission projects and maximizing future capacity options on existing ROW, which HVSEC claims are tenuous benefits.

According to HVSEC, REV has significantly more environmental benefits than any of the transmission projects. It claims the REV alternative reduces emissions more than ten times more than the highest-reducing transmission project and reduces New York's carbon footprint more than any of the transmission projects. Furthermore, HVSEC argues the P11 Project will cause NOX emissions from coal to increase from the base case by approximately 118 tons in 2019 and by approximately 52 tons in 2024, resulting in a direct conflict with New York's energy goals and policies. In addition, HVSEC claims that, in contrast to the Staff's recommendation to proceed with a transmission project that would increase emissions, REV is more consistent with the 2015 State Energy Plan's goal to reduce greenhouse gas emissions and generate 50 percent of its electricity from renewable energy sources by 2030.

Discussion

Electricity prices depend in part on the ability of generating facilities to delivery their energy into the NYISO

location-based market zones that have the greatest demand. Congestion results when there is a lack of sufficient electric transmission capacity to deliver all available power and historically has resulted in higher prices in New York City and the Hudson Valley because available upstate generators have not had a sufficient path to deliver the additional power. According to Trial Staff, NYISO, the Brattle Group, the electric utility companies, the other potential developers and others, if transmission is not built, the trend and costs of congestion will continue. Alternatively, HVSEC and others assert that a transmission solution is not needed and is not the only or best option to pursue.

The positions of the parties reveal two very different approaches to the future energy system in New York. The transmission approach looks to a system that uses existing resources in the western and northern part of the State, new wind resources, and a larger transmission backbone to supply power to the downstate region. The less populous northern and western parts of the State have traditionally been home to central station power plants that are less expensive to build upstate than downstate, and now wind generation facilities that are relied on to meet power needs. However, the lack of transmission infrastructure means that for too many hours throughout the year, and not just during the summer peaks, this power cannot reach downstate customers, which means they must continue to rely on older, less efficient and dirtier units to meet their power needs. In the alternative, the downstate customers would need to build new downstate generating facilities that are significantly more expensive than upstate facilities. As these parties point out, the result is higher prices and less ability to take advantage of new wind resources and promote fuel diversity, including reducing GHG emissions.

The alternative posited by LEI (including Dr. Eshel's assertions) presents a much different approach to development of the electric system, and one that the Commission finds to be inconsistent with New York public policy. Under this alternative view, the future electric needs of New Yorkers in the downstate region can be met by extensive build out of significant additional gas infrastructure (new gas pipelines and generating facilities) along with actions to manage demand (demand reduction being a key objective of REV). According to LEI, the combination of new gas plant fueled by low cost natural gas and load reductions through extensive deployment of distributed energy resources (DER) will reduce prices through the region and consequently, with less need for imports from the west and north, will reduce congestion. While new gas facilities will undoubtedly be part of the future energy landscape, the holistic view offered by LEI is unrealistic, and is therefore rejected.

REV is intended to achieve State policy goals of fostering a reliable, cost effective and environmentally sound power sector through actions that drive system wide efficiency at the supply, bulk power and demand sides of the power system. The future envisioned by REV is that distributed energy resources deployed locally will help customers become efficient and dynamic electric users. These new customer resources will also be able to be used to more effectively balance increased investments in wind and solar resources that are deployed remotely. Additionally, the Commission recognizes that large scale central generation, including our safe upstate nuclear facilities that are in their licensed periods, can continue to be operated and new investments can be made to compliment the distributed resources. Stated another way, while there is no doubt that we can all become better environmental and economic

stewards by becoming more efficient energy consumers and using energy more efficiently, the Commission also recognizes that in its entirety the optimal system design will be met by a balance of central station and distributed resources and that this balance will be found by markets that accurately value resources and public policies that stress the importance of building an electric system that reduces waste and decreases rather than increases reliance on fossil fuels.

Without question, having a strong transmission backbone that can respond to and balance a much more diverse and dynamic fuel and usage mix is core to this vision. Consequently the Commission rejects as inapposite to the State's policy a view of the system where the downstate region is denied the benefits of lower cost and renewable generation from upstate and is asked to rely only on fossil fueled electric infrastructure.

The LEI view suffers from a number of other weaknesses that were pointed out in the record. LEI asserts that investments in new infrastructure will be made, but its assertion is based on speculation and not on identified actors that have either specific plans or financial backing to make such investments. LEI's view also fails to account for local opposition and siting issues that might defeat the plans of such an investor. In contrast, the electric transmission facilities under consideration here have already passed through an initial vetting for environmental compatibility, are proposed by known entities that will be vetted by the NYISO for their viability and capability to follow through on their plans, and the NYISO Tariff provides a certain path for recovery of costs by any investor. LEI's view also fails to give sufficient recognition to the value of fuel diversity. While natural gas is an important component of New York's energy future, the current market structure which focuses almost exclusively on price will

drive all market decisions towards that one fuel type unless measures are taken to also recognize the real long-term values of fuel diversity and fuel types with fewer negative air emissions. LEI also fails to give account for the need to replace aging transmission infrastructure and the value to the State of maximizing the use of existing assets. It would not be very efficient or sensible to open new rights-of-way for new infrastructure when you are already going to be rebuilding existing infrastructure in place and could have avoided the new infrastructure and rights-of-way by merely upgrading the capacity of the existing infrastructure as part of the rebuild.

VISUAL IMPACT ON THE HUDSON VALLEY

The Commission has gone to great lengths in these proceedings to ensure that land use impacts and visual impacts will be minimized, not just in the Hudson Valley, but throughout the project areas. When the initial submittals appeared to cause more of such impacts than necessary, the Commission took an unprecedented approach and sent all of the developers back to the drawing board to improve their submissions. In addition, after the revised projects were submitted, Trial Staff was directed by the Commission to do a comprehensive comparative evaluation of the projects which resulted in a substantial winnowing out of all the projects that proposed establishing new or widening existing transmission rights-of-way. These measures have significantly lessened the impact of the remaining projects on the visual landscape of the Hudson Valley.

HVSEC is concerned that the proposed Segment B facilities will cause negative visual impacts in the Segment B corridor in the Hudson Valley, which could be avoided if Trial Staff’s proposal is rejected. HVSEC urges that the Hudson River and its valley have nationally important historical, cultural,

ecological and aesthetic values that deserve special protection. Assemblywoman Didi Barrett raises similar concerns that the proposed towers would put Dutchess County's tourism and Columbia County's agricultural industries at risk. The Town of Pleasant Valley, host of the key regional transmission hub/substation, calls the existing substation a visual blight in its community and believes that Pleasant Valley residents have already endured too much.

Discussion

The Commission agrees that the Hudson River and the broader Hudson River Valley region have nationally important historical, cultural, ecological and aesthetic values that should be protected. The location of Segment B of Staff's recommended solution is no closer to the banks of the Hudson River than one and one half miles at any point, and for half of its length it is no closer than five miles. The topography is such that the facilities in question here would not present significant visual impacts at locations on the Hudson River. In addition, the facilities in question would not approach or cross the Hudson River. The Commission is fully satisfied that the proposed Segment B facilities would have absolutely no negative visual impact whatsoever on users of the Hudson River itself. Furthermore, visual impacts on resources within the Hudson Valley region will be minimized by utilizing existing electric transmission corridors to replace existing facilities with new facilities.

Many proposals have been put forth in these proceedings. Some would require the opening of new rights-of-way for overhead transmission lines. Some would require the widening of existing rights-of-way for new overhead transmission lines. One developer, Boundless, proposed some underground segments, including an underground crossing of the Hudson River,

but even the Boundless projects would have required reconductoring construction work along many miles of existing transmission rights-of-way in the Hudson Valley, many of those miles through the same communities that have raised concerns. The Boundless proposals ultimately proved to be inefficient and therefore infeasible in relation to the remaining proposals. The Segment B facilities proposed by Trial Staff would not require either the opening of new rights-of-way or the widening of existing rights-of-way for new overhead transmission lines. Clearly the opening of new rights-of-way would have a more significant visual impact than the reuse of existing rights-of-way.

The greater Hudson Valley is not an undisturbed wilderness. It is a working landscape that includes homes, farms and forests, but it also includes major industrial and commercial facilities, villages, cities, and infrastructure including highways, railroads, and some very significant electric substations and overhead transmission lines. The Segment B transmission corridor already contains a substantial number of overhead electric transmission lines that serve an important function and will have to remain in place for the foreseeable future. Some of the facilities are aging and will shortly need to be rebuilt in place. Accordingly, the Segment B corridor is going to be disturbed by new construction in the near future. One of the questions here is whether the existing facilities should be rebuilt in kind, or whether they should be upgraded in capacity as part of the rebuilding process so as to avoid having to build even more powerlines through the Hudson Valley.

The following sample cross section diagrams taken from the record simulate the visual difference between the existing

conditions and the proposed conditions.[12] The locations of the cross sections provide a fair representation of all of the conditions in Columbia and Dutchess counties. The first four compare the NYTOs projects where existing 80 to 85 foot lattice structures would be replaced by 90 to 100 foot steel monopole structures. For the sake of brevity, the fifth diagram is a single sample of the NextEra projects where existing 80 to 85 foot lattice structures would be replaced by 105 foot concrete monopole structures. The sixth diagram shows only the 80 foot two-pole horizontal structure proposed by NAT. NAT unfortunately did not provide comprehensive cross sections for all conditions. NAT has not committed to whether its structures would be made of steel, concrete, or a combination of the two. It should also be noted that in many locations some of the visual clutter would be reduced as two existing structures would be removed and replaced by a single, but possibly taller, structure.

[12] Note: the grayed out structures shown are to be removed.

Diagram One - NYTOs
Rensselaer and Northern Columbia Counties

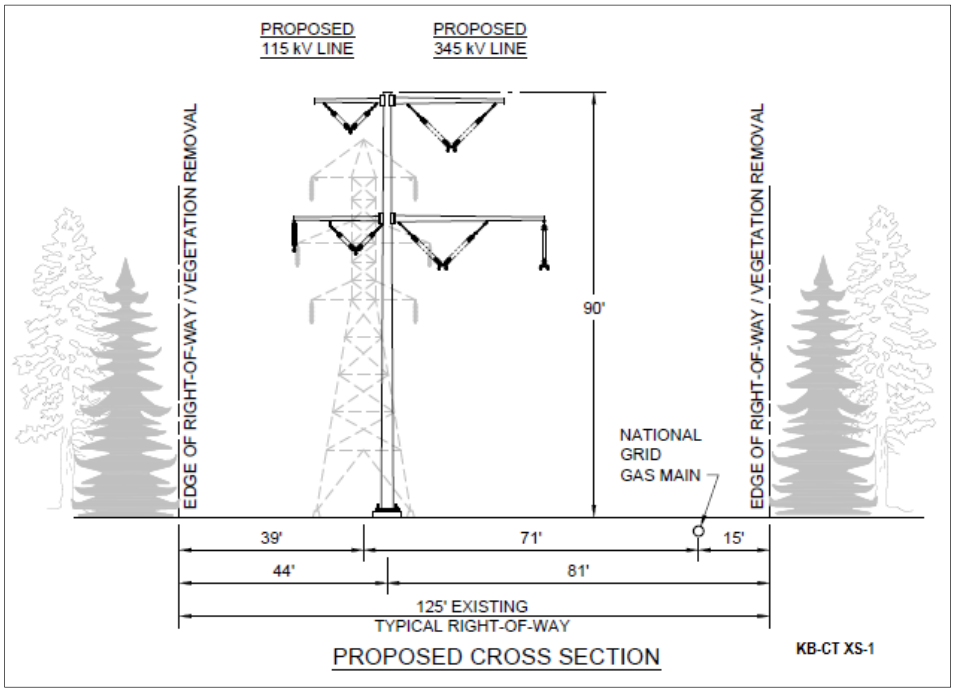


Diagram Two - NYTOs
Central Columbia County

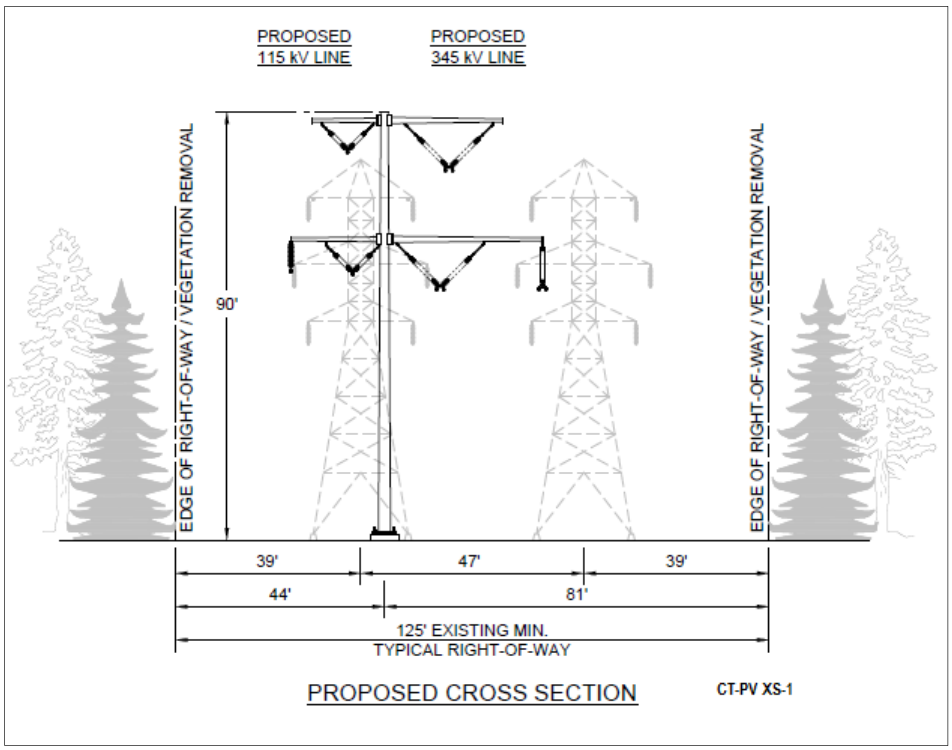
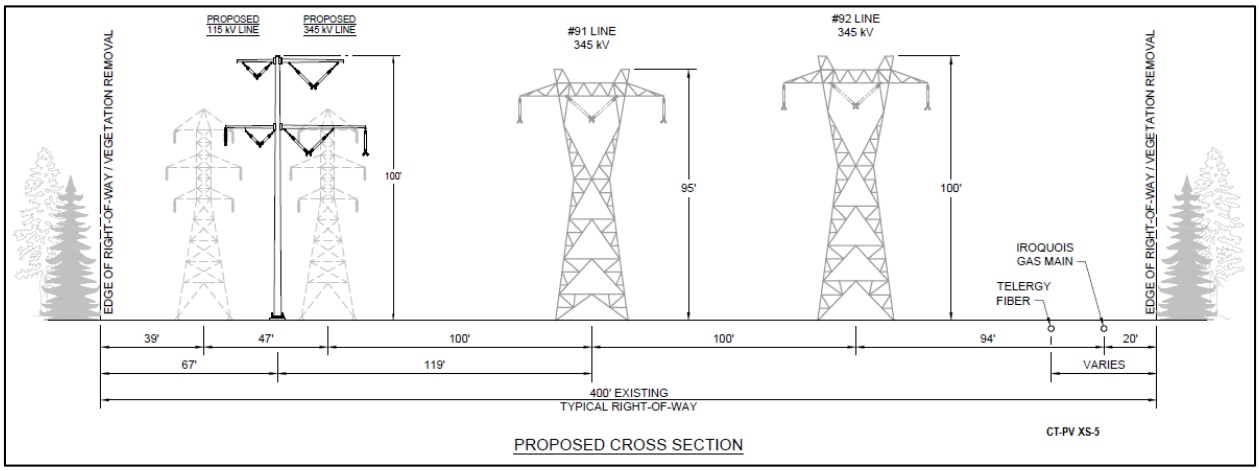
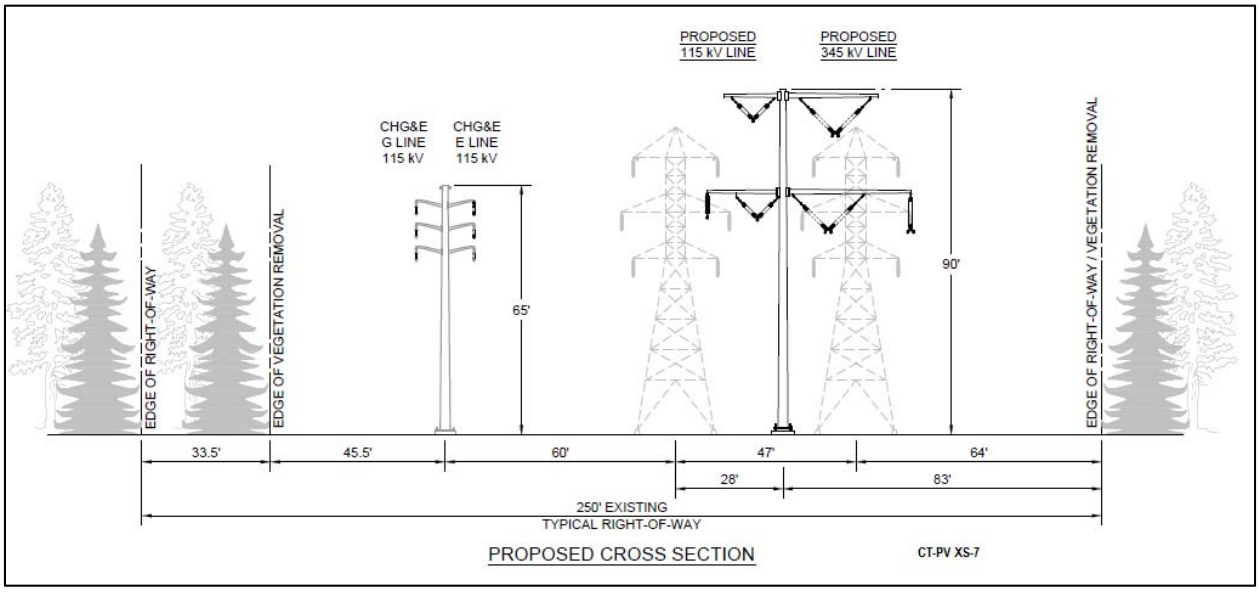


Diagram Three - NYTOs
Town of Milan, Dutchess County



PROPOSED CROSS SECTION

Diagram Four - NYTOs
Pleasant Valley, Dutchess County



PROPOSED CROSS SECTION

Diagram Five - NextEra
Columbia County

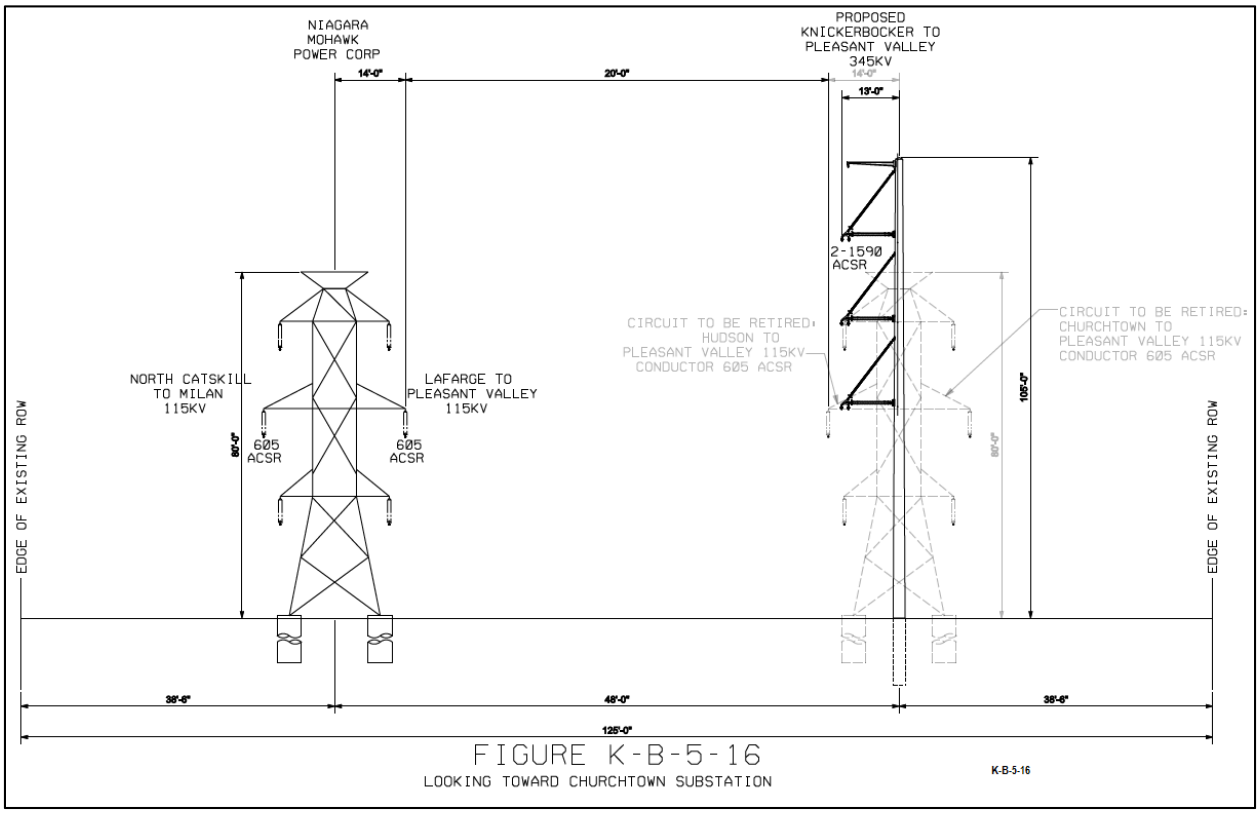
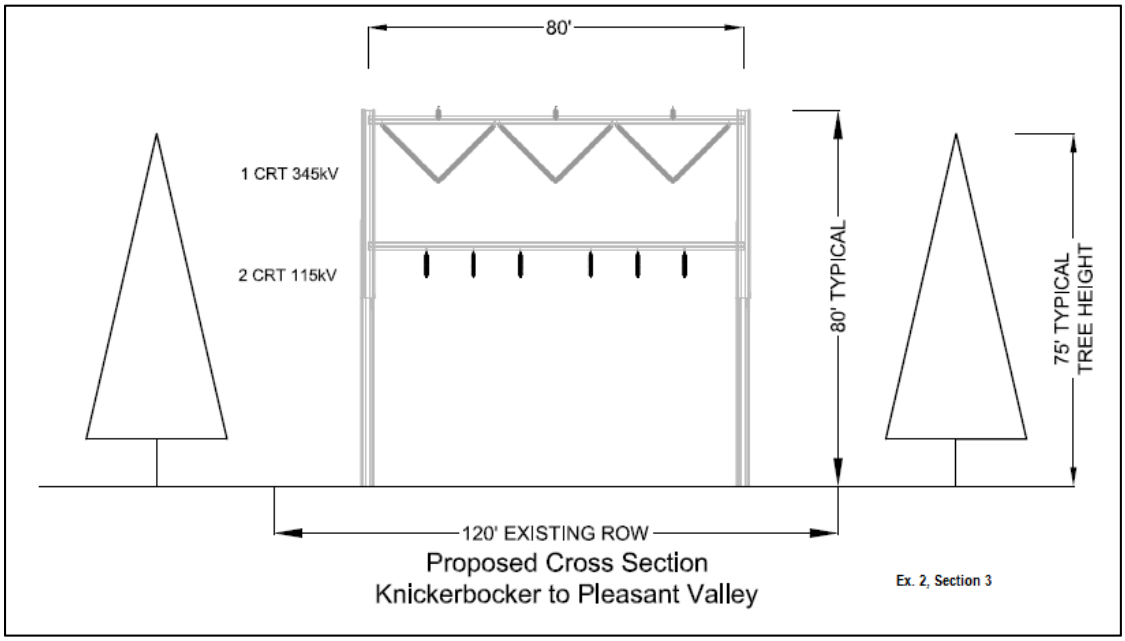


Diagram Six - NAT
Columbia County



The Commission has seriously considered all the concerns that were raised and has examined the cross section diagrams. It is the Commission's conclusion that the potential for increased height of tower structures as presented here will result in a deqree of increased visibility, but that the potential increment of increase (between zero and twenty five feet) will not create an adverse impact of a regional nature that would significantly impair the physical visual character of the Hudson Valley and its communities.

A change in structure types and structure heights of the types contemplated may have local, site specific visual impacts. During the Part B Article VII process where it will be possible to look at details including individual structure locations and heights, alternative designs, and mitigation opportunities, the Commission and Staff will assess the degree to which any of the necessary changes result in visible changes in the landscape. The Commission and Staff will work with the developers, local farmers, landowners and other stakeholders to minimize the visual and other impacts of structures, and the Commission throughout these proceedings will continue to encourage the applicants to further minimize the heights of their proposed structures to the degree possible consistent with safety regulations as to conductor clearances.

The Commission also notes that it finds it understandable that the Town of Pleasant Valley would feel challenged by the plethora of transmission proposals seeking to connect into the Pleasant Valley substation in both these and other proceedings. In these proceedings alone there were 19 such proposals in five different corridors. The Commission's action in this order is responsive by reducing the 19 proposals down to three very similar proposals on a single pre-existing corridor. The Commission will also be requesting that the

proposals that in the Commission's view are non-viable be withdrawn, in part to give relief and finality to communities like the Town of Pleasant Valley.

OTHER ENVIRONMENTAL IMPACTS

The minimization of environmental impacts due to construction activities is a key responsibility of the Commission in reviewing proposed major electric transmission facilities. Staff has considerable experience and expertise regarding such issues, and regularly goes to great lengths through on-site surveys, landowner discussions, and resource agency consultations to identify all resource constraints. The Commission regularly imposes numerous specific conditions on construction practices and Staff actively monitors all construction activities.

HVSEC identified a number of "priority sites" of environmental concern along the Segment B corridor that could be potentially adversely affected by construction of the Segment B facilities. Even though no new expansion of the existing rights-of-way are contemplated, HVSEC argues that construction activities can result in temporary and permanent negative environmental impacts along the proposed route that may harm ecological communities and spread invasive species. In addition, HVSEC argues construction along the Segment B corridor could impact a number of historic resources. Trial Staff's environmental analysis was remarkably similar in result to that of HVSEC and similarly identified areas that will be of concern during any construction.

Discussion

The Commission welcomes the additional review conducted by HVSEC and is gratified that the HVSEC and Trial Staff environmental experts made findings that support each

others' analysis, which lends credence to the efficacy of Trial Staff's comparative evaluation. The affected rights-of-way are areas that have already been highly disturbed by past construction activities. None of the resource concerns identified are so extraordinary that they could not be appropriately addressed through implementation of a well-designed Environmental Management and Construction Plan (EM&CP) as the Commission typically requires for major electric transmission facilities. However, the Commission will be looking to improve on past construction methods for these rights-of-way as it is likely that current standards are more protective of the environment than when the existing facilities were constructed. EM&CP issues will be further addressed in the follow-on Part B Article VII siting process.

EVALUATION CRITERIA AND SPECIFIC ANALYSES

The NYISO Open Access Transmission Tariff[13] provides that in issuing a written statement identifying transmission needs driven by Public Policy Requirements, the Commission's statement may also provide additional criteria for the evaluation of transmission solutions and non-transmission solutions, and may also identify the type of analyses that the Commission will request from the NYISO for the NYISO to use in evaluating potential solutions. The NYISO will independently evaluate each solution – transmission, generation, demand response, or a combination of these resource types – to measure the degree to which the proposed solution satisfies the need, including the evaluation criteria provided by the Commission.[14]

[13] NYISO Open Access Transmission Tariff, Attachment Y, §31.4.2.1.

[14] NYISO Open Access Transmission Tariff, Attachment Y, §31.4.6.4.

Trial Staff proposed that the Commission's statement should establish evaluation criteria and specific analyses for the NYISO to undertake in reviewing transmission solutions to ensure that any selected solution avoids the opening of new transmission rights-of-way and also avoids a new crossing of the Hudson River by a power line as is intended by the identification by Trial Staff of a specific portfolio of projects. LIPA proposed evaluation criteria including a minimum 900 MW increase in power transfer capability across the UPNY/SENY interface; avoidance of a decrease in power transfer capability across the Central East interface; core environmental protections including utilization of existing right-of-ways or paralleling existing infrastructure as important avoidance or minimization measures; and a minimum 1.0 benefit/cost ratio. NYTOs also proposed evaluation criteria including that the project should already have begun the Article VII process (affects schedule for completion); not cross the Hudson River; be built entirely within currently existing rights of way; increase transfer capabilities over both the UPNY/SENY and Central East interfaces; enable the avoidance of future transmission refurbishment costs and result in upgrades to aging infrastructure; be built by a developer with significant experience with managing major transmission projects on an interconnected AC transmission system, including outage management capabilities; be able to obtain all necessary permits in the necessary course; and have a positive impact on the community, such as whether the project will reduce the total number of structures in a community from the number that exist today.

NAT proposed evaluation criteria including a recognition that the applicants that filed Article VII, Part A applications in 2013, and amended them in 2015, have a better

ability to meet a required in-service date; that although 80/20 sharing of cost risk should be required of all applicants, that differing risk mitigation options should be allowed and evaluated as part of the cost criteria; and that the different revenue requirements of the applicants be evaluated as part of the cost criteria. NAT requests that the weighting of the different criteria should be identified (weight of environmental factors against other factors), including a clarification of how "innovation and technology" is to be weighted. NAT also requests that when costs are evaluated, that the scope of costs used be identical for all projects including the cost of right-of-way acquisition (which NAT asserts also has a cost for the NYTOs).

NextEra requests that all applicants identify their proposed cost risk mitigation sharing percentages for evaluation. NextEra also requests that the Commission identify the intended in-service year for the facilities.

Boundless raises a concern that Trial Staff did not recognize the contribution of the Transmission Owner Transmission Solutions (TOTS) Projects towards increasing the transfer capability across the UPNY/SENY interface. Boundless cites information that it claims estimates the TOTS contribution at 450 MW therefore Boundless argues that the 1,000 MW target should be reduced to 550 MW. The amount of the target is important to Boundless because its projects are estimated to provide transfer capability increases of 687 MW and 605 MW respectively across the UPNY/SENY interface, whereas the other projects likely under consideration range from 918 MW to 1,136 MW. Boundless claims that any use of Central East transfer capability as a criterion is unfair and illegal. To resolve Central East issues, Boundless suggests that the Commission sequence its review and first separately compare

Central East projects, and then after selecting a Central East project, then compare UPNY/SENY projects as if the Central East project were already in place. Boundless also asserts that its proposal to install a line beneath the Hudson River does not have environmental impacts that are as significant as a new overhead crossing, therefore its Hudson River crossing does not provide a reasoned basis for project selection.

Trial Staff, in its assessment of relative impacts on "Major River Corridors", provided significant analysis and consideration of impacts to these corridors, and the Hudson River corridor in particular. Staff ranked proposals with either no new Hudson River crossing, or river crossings limited to reconductoring on existing towers as "low" in terms of environmental impact; in-kind replacement of existing transmission towers on the Hudson River, and drilled underground crossings of the Hudson River at or near Schodack Island or at Roseton[15] as "medium"; and new crossings of the Hudson River at new locations or where forest clearing is required, or drilled underground crossings of the Hudson River at Athens-Greenport or Lloyd-Poughkeepsie as having relatively "high" impacts. The latter locations were deemed "high" because they may cross important fisheries or habitat areas, or the overhead facility approaches to the underground crossing will be within or directly visible from designated Scenic Areas of Statewide Significance (SASS). Some of these locations would involve potential conflicts with Local Waterfront Revitalization Programs and Coastal Area criteria. Trial Staff noted that impacts to be expected from horizontal directional drilling (HDD) activities include potential drilling fluid leaks or "frac-outs" and clearing for staging areas for construction equipment and HDD drill entrance and exit pits. Additionally,

[15] The Hudson River crossing at Roseton is proposed by Boundless.

Trial Staff noted that noise to the surrounding community can be expected during HDD operations.[16]

Environmental Impact Criteria

Trial Staff's report demonstrates that the transmission need can be met in a cost effective manner without having to resort to the acquisition of new permanent transmission rights-of-way[17] or to any crossing of the Hudson River with a powerline. There remains a need for land acquisition for substations or substation expansions, and although that need will be compact and highly localized, it should also be minimized. There is broad public support for minimizing the impacts of any new powerline by requiring the use of only existing rights-of-way and for avoiding impacts on the Hudson River. Only Boundless takes issue with the idea of avoiding a Hudson River crossing because its proposals rely on a crossing under the bed of the Hudson River. Having considered the record described above, the Commission finds that Boundless is not persuasive in its arguments that its Hudson River

[16] In its reply comments, Trial Staff states that Boundless did not previously indicate any pipe-type, oil-filled, cable with a forced cooling system for its underground proposal and that Boundless now proposes installation of a forced cooling system for the underground cables to improve their capability. Trial Staff asserts that if oil-filled cables had been indicated, it would have requested additional information regarding the cooling system design, nature of coolant material and environmental assessment of impacts related to leakage, spills, or catastrophic system failure; and likely would have recommended consideration of solid dielectric cables as an alternative.

[17] It will not be clear until a later phase whether there will be a need for de minimus exceptions, additional permanent access roads, or temporary construction access roads and lay-down areas for vehicles or equipment, etc. The impacts of such are generally minor, often temporary in nature, and can be managed and minimized through the Commission's Environmental Management and Construction Plan (EM&CP) process.

crossing should have been rated as having a "low" impact in relation to other river crossing methods, particularly since the recommended project portfolios avoid construction of any new or modified Hudson River crossing, either overhead or underground. In addition, the Boundless proposals have other shortcomings that do not hinge on the environmental impacts of its Hudson River crossing such that the exclusion of the Boundless projects as potential solutions would not interfere with obtaining the best overall transmission solution. The Commission has heard the concerns of the many stakeholders that plead that the impacts of any new transmission line be minimized, and is pleased that in this instance it is possible to provide a solution without the acquisition of new permanent transmission rights-of-way or any crossing of the Hudson River with a new transmission line. The comparative evaluation in these proceedings has been generally beneficial, but in this regard it has been invaluable. The Commission will state evaluation criteria to ensure that any transmission solution not include the acquisition of new permanent transmission rights-of-way or any crossing of the Hudson River with a powerline.

The Commission is sympathetic to the suggestion of the NYTOs that projects have a positive impact on the community by reducing the total number of structures in a community from the number that exists today. At this stage, however, the NYISO would not have sufficient information to determine such impacts and the Commission does not want to convert the NYISO process into a siting process. Those matters will be further addressed by the Commission in the Article VII siting cases after the Part B construction information is filed. Similarly, structure heights are often dependant on specific decisions as to structure location and span length which are often influenced by the consideration of site-specific impacts to natural resources,

agricultural practices, and visual impacts. As to structure heights, the Commission will not mandate criteria to be applied by the NYISO, but all proposers of transmission solutions should be aware as they prepare their submissions that minimization of structure heights will be an important issue in the siting review process so applicants should be careful to not lock themselves into designs that could not later be approved. All applicants are encouraged to minimize the heights of the proposed structures while keeping them within the context of their 2015 proposals. In making this statement, the Commission is not in any way suggesting that it would be suitable for applicants to appropriate the structure designs of other applicants.

The NYISO tariff-setting process does not allow for the concept of assigning numerical weights to different categories of factors, as did the Trial Staff report. By establishing threshold environmental and other criteria and a specific definition of the transmission need, the Commission is ensuring that environmental factors and other factors are receiving due weight in the overall evaluation of transmission solutions.

Electric System Impact Criteria

As noted earlier, the Commission had sought project proposals that would increase the transmission transfer capability of the UPNY/SENY interface by approximately 1,000 MW. Boundless overstates the impacts of the TOTS projects on the normal transfer capability of the UPNY/SENY interface. For example, the most significant of the three TOTS projects in terms of scope and cost is designed to improve transfers between Linden, New Jersey, Staten Island and Brooklyn; it is not targeted to improve the UPNY/SENY interface. Also, the Boundless reference to a 450 MW increase attributable to the

TOTS projects is misplaced. The 450 MW increase in the reference is an increase in emergency transfer capability for the purposes of a Reliability Needs Assessment (RNA), not normal transfer capability. RNA transmission topology limits are derived using emergency transfer criteria and not normal transfer criteria.[18] Under emergency transfer criteria higher transfer limits are allowed as compared to normal transfer criteria, as clearly illustrated by Figure 11 of Trial Staff's Report. Further, the RNA emergency limits are used for resource adequacy and installed capacity assessments and not used in the production cost model, the model used for assessing congestion and production costs. In addition, the benefit cost analysis demonstrates that projects that don't create at least 900 MW of increased transfer capability at UPNY/SENY either create very little in the way of increased transfer capability (NYTOs projects: P7 = 352 MW; P12 = 432 MW), or provide only a medium level of capacity increase and are not cost effective (Boundless projects: P20 = 687 MW, BC Ratio = 0.7; P21 = 605 MW, BC Ratio = 0.7). By setting a cutoff at 900 MW, the NYISO will be able to concentrate on solutions that are both highly impactful and cost-effective. The Commission will require that no transmission solution shall be selected for Segment B that provides less than a 900 MW increase in normal transfer capability (NTC) across the UPNY/SENY interface.

Despite the contents of the Order Instituting Proceeding[19] that identified both the Central East and UPNY/SENY

[18] 2014 Reliability Needs Assessment, New York Independent System Operator Final Report (September 16, 2014), at p. D-12.

[19] The corridor [source of persistent congestion] includes . . . two major electrical interfaces (i.e., groups of circuits) that are often referred to as "Central East" and "UPNY/SENY." See, Case 12-T-0502, Alternating Current Transmission Upgrades, Order Instituting Proceeding (issued November 30, 2012), p. 1.

interfaces as being the subject of these proceedings, Boundless appears to have missed the importance of the Central East interface. As a result, the Boundless projects do not attempt to improve transfer capability across the Central East interface.[20] The proposals of the other project applicants all included options that attempted to address congestion at the Central East interface. The Commission is not persuaded by the Boundless fairness or legal arguments. As to fairness, it is obvious from the submissions by the other applicants that the importance of the Central East interface should have been as apparent to Boundless as it was to the other participants. Similarly, the legal argument is fully misplaced.[21] The Boundless suggestion that the Commission sequence its review, select a Central East project, and then compare UPNY/SENY projects as if the Central East project were already in place appears to be an opportunistic attempt to improve the Boundless UPNY/SENY ratings by artificially increasing the congestion at UPNY/SENY, but it fails to accept the reality that it would not make sense to invest in an upstream project without first eliminating downstream congestion. A project that merely moves the congestion point without increasing ultimate downstream power delivery would not be sensible. In fact, given the segmentation approach, the Commission believes it is important to ensure that the evaluation criteria not allow for the implementation of an upstream project without a downstream

[20] They actually degrade the Central East transfer capability by 25 MW.

[21] The Boundless legal argument hinges on the citation of a judicial decision regarding contract law, whereas here the Commission is not entering into any contracts. Any Commission decision in these proceedings will hinge on the statutory requirements of the Public Service Law as to required Article VII findings and determinations and/or on the requirements stated in the NYISO Open Access Transmission Tariff.

project, and has stated criteria accordingly. The Commission will require that no transmission solution shall be selected for Segment A that provides less than a 350 MW increase in normal transfer capability (NTC) across the Central East interface.

Trial Staff was asked to evaluate "innovation and technology" aspects in the comparative evaluation process. Trial Staff's report demonstrates that the innovation claimed by the applicants (except structure types and heights) is already reflected in the powerflow results and environmental rankings. For example, the use of a more efficient conductor technology in a project is reflected in enhanced powerflow results for the project. Nothing in the comments has persuaded the Commission that such innovations should get additional credit. The value of the increased powerflow is the appropriate measure of the value of the innovation because that is the value that will be realized by the beneficiaries of the transmission facility. Assigning additional credit would be inefficient.

Cost Criteria

The NYISO Open Access Transmission Tariff already requires the NYISO to consider cost efficiency issues in its evaluation of solutions. The Commission expects that in evaluating project costs, the NYISO would put all of the proposed transmission solutions on a comparable basis as to the scope of costs, but at NAT's request the Commission will state that criterion so that there is no question as to the matter. In that regard, all parties including NYTOs must provide an estimate of their right-of-way or other real property acquisition costs. The Commission also agrees with the NYTOs that the evaluation should favor projects that avoid future transmission refurbishment costs.

Trial Staff's analysis of the cost estimates submitted to date in these proceedings indicates that most of the

developers omitted essential elements from their estimates. Staff also identified that many applicants did not understand New York's practices as to matting and related practices to protect soils from compaction. These omissions resulted in inaccurate cost estimates and are further exacerbated by the NYISO's recent identification of additional unanticipated upgrades to the Rock Tavern Substation and the Shoemaker to Sugarloaf transmission line that are needed to ensure the full value of the proposed transmission solutions but were not included in the developer's estimates. Given these facts, it is not reasonable to use the developer's original estimates as a base cost. Instead, the NYISO in its evaluation should obtain and use revised cost estimates from the developers that match the comprehensive approach established by Trial Staff. The percentage rates applied to account for contingencies and revenue requirement should all be treated uniformly across all estimates so that those factors are not manipulated by the bidders to confuse or artificially skew the results. Rather, the NYISO should evaluate the costs based on raw construction costs. In calling for revised cost estimates, the Commission is not abandoning the benefits of the estimates that were already made. A criterion will be included that caps future cost bids at the level estimated by Trial Staff for the applicant's project unless the applicant can demonstrate to the NYISO that upward estimates are necessary to correct errors or omissions made by Trial Staff for the components that were added or adjusted by Trial Staff.

The benefit-cost analysis prepared by Trial Staff demonstrates that upgrades to aging infrastructure could contribute significantly to the benefits of any transmission solution. Therefore, the Commission agrees with the NYTOs that

the selection process for transmission solutions should favor solutions that result in upgrades to aging infrastructure.

In the absence of a cost-containment incentive mechanism, FERC practice is to generally allow full recovery through the NYISO Open Access Transmission Tariff of any prudently incurred costs that exceed the developer's original estimate. The Commission already ruled in these proceedings on what incentive would be appropriate to ensure accurate cost estimates.[22] If actual costs come in above a bid, the developer should bear 20% of the cost over-runs, while ratepayers should bear 80% of those costs. If actual costs come in below a bid, then the developer should retain 20% of the savings. Furthermore, if the developer seeks incentives from FERC above the base return-on-equity otherwise approved by FERC, then the developer should not receive any incentives above the base return-on-equity on any cost overruns over the bid price. The bid price would therefore cap the costs that may be proposed to FERC for incentives.

The Commission cannot predict at this time whether FERC will accept the Commission's preference for a cost-containment incentive mechanism. The Commission also is not privy to the bidding strategies of the potential developers. Those facts raise a concern that it may be very difficult to fairly compare bids if the bids are based on different models of risk. For example, if two competing projects appear to offer equivalent value, but one offers a lower bid subject to the recovery of all actual costs, and the other offers a higher bid, but the costs are firm, it may be difficult to choose a winner. The Commission is dedicated to a process that will ensure equity

[22] Case 12-T-0502, et al., Alternating Current Transmission Upgrades, Order Establishing Modified Procedures for Comparative Evaluation (issued December 16, 2014), p. 44.

and a fair comparison. Bids should be sought from all developers in the alternative assuming both the FERC ordinary full recovery regime and the Commission's cost-overrun-sharing incentive regime. The Commission believes that this additional information as to risk assumption will be of assistance and may be crucial to discerning between close bids.

Developer Qualifications

The Commission endorses the view that demonstration of financial and operational experience is crucial for the selection of the developer of this type of project because the transmission facility will become an important integrated component of the backbone AC transmission system. While the developer may be an entrepreneur rather than an incumbent utility company, the project itself is not in the nature of a merchant project because the intended beneficiaries of the project will be relying significantly on its successful completion. The NYISO Open Access Transmission Tariff already requires a robust evaluation of developer qualifications such that adding additional criteria about developer experience or ability to obtain permits is unnecessary. In making this determination, the Commission is not inviting developers that have not already participated in these AC Transmission proceedings to submit "copycat" transmission solutions that opportunistically incorporate the work product of the original participants.

In-service Year

Ideally, the new facilities would be in service prior to the summer capability period of 2019. From the Commission's point of view, it is desirable to realize the in-service year as soon as is practicable. But it is difficult for the Commission to identify the intended in-service year of the facilities because, among other reasons, the Commission does not have

control of the timing of the NYISO Open Access Transmission Tariff process and the congested nature of the existing facilities to be rebuilt is such that any construction needs to be timed pursuant to a careful plan to minimize reliability risk and the cost of outages. In preparing the solicitation of solutions, the NYISO should consider whether it could apply its expertise and knowledge of the bulk electric system, its tariff process and the Commission's Article VII siting process[23] and establish summer 2019 as the intended in-service year, or another intended in-service year upon which the proposed solutions could be evaluated.

Definition of the Need as Two Segments

The City of New York supports the idea that the definition of the transmission need not predetermine the entity that will provide the solution such that the forces of competition will tend to make the solution more cost efficient. NYTOs argue that not selecting the NYTOs Project P11 at this time and allowing other developers to modify their projects to match the two segments of Project P11 is arbitrary and chilling to the idea of competition. NYTOs also raise concerns that creating two segments will increase the costs by increasing the number of system studies needed, could increase contractor costs, and will increase risks that outage avoidance will not be properly coordinated and that developers may make premature requests for outages to gain advantage.

The Commission is not ready to select the NYTOs' Project P11 as the best solution because of the significant disparity in cost between the higher costs estimated by NYTOs

[23] The Article VII proceedings should proceed in an expeditious manner taking full advantage of the robust record that has already been compiled in these proceedings, to be supplemented by the Part B filings which primarily relate to location-specific siting issues.

and the lower costs estimated by the other developers for essentially the same work. In the Commission's view, those costs need to be further tested and the best way to do that, as pointed out by the City of New York, is through competition. The Commission's cost concerns are material, and therefore not arbitrary, whereas the minor project modifications necessary for the developers to put their projects on a comparable basis so as to maximize competition are not material. In furtherance of the principle that competition will lead to the most efficient costs, the Commission adopts the segment approach proposed by Trial Staff so as to maximize competition and cost efficiency.

COST ALLOCATION AND RECOVERY METHODOLOGY

Under the NYISO tariff, if the Public Policy Requirement that results in the construction of a transmission project prescribes the use of a particular cost allocation and recovery methodology, then the NYISO shall file that methodology with the Federal Energy Regulatory Commission (FERC), although, such filing does not deprive the developer of the project of any rights it may have under Section 205 of the Federal Power Act to submit filings proposing any other cost allocation methodology to FERC.[24] The Commission already addressed what cost allocation methodology it would prescribe in these proceedings and adopted a "beneficiaries pay" approach for allocating costs, whereby those that derive the benefits of a project should bear the costs.[25] In application, the Commission adopted an approach whereby 75% of project costs are allocated to the economic beneficiaries of reduced congestion, while the other 25% of the

[24] NYISO Open Access Transmission Tariff, Attachment Y, §31.5.5.4.1.

[25] Case 12-T-0502, et al., AC Transmission Proceedings, Order Establishing Modified Procedures for Comparative Evaluation (issued December 16, 2014) pp. 40-42.

costs are allocated to all customers on a load-ratio share. This will result in approximately 90% of the project costs being allocated to customers in the downstate region, and about 10% to upstate customers. This allocation reflects that the primary benefit of the project will be reduced congestion into downstate load areas, but also recognizes that some benefits accrue to upstate customers in the form of increased reliability and reduced operational costs.

While parties that dispute they are beneficiaries, or that they are assigned a reasonable portion of the costs, would be able to raise their objections before FERC, the Commission notes that the Long Island Power Authority (LIPA) in its comments raised several concerns about the cost allocation methodology. LIPA's major concern is that a one-size-fits-all approach to cost allocation among downstate entities may not be appropriate as LIPA believes that not all downstate entities are similarly situated and that Long Island does not receive benefits in proportion to other downstate areas. LIPA asks that the Commission ensure that the NYISO apply a more granular analysis of the benefits of these proposed projects among downstate entities. Resolution of LIPA's concern will be a FERC matter, but the Commission agrees that a more granular analysis would be beneficial and perhaps more equitable. Therefore, the NYISO will be asked to incorporate such an analysis into the cost allocation methodology. The NYISO should apply its expertise in designing the more granular analysis to be performed.

LIPA also raises a peripheral concern that is not subsumed in the discussion above. LIPA asserts that the benefits of avoided refurbishment costs only accrue to the parties that would otherwise pay for such refurbishment. The Commission takes that to mean that LIPA believes that National

Grid ratepayers are the only ones that benefit from the avoided refurbishment of the transmission lines affected by the instant decisions. The Commission does not agree with LIPA's logic. The existing Edic/Marcy to New Scotland, and North Greenbush/Knickerbocker to Pleasant Valley transmission lines serve primarily the bulk system and as a corridor to transmit power from upstate generators for the benefit of downstate consumers. One of the reasons these lines have not been upgraded to date is because they do not sufficiently benefit National Grid's retail customers such that National Grid could justify the investment. FERC's Order No. 1000 and the AC Transmission proceedings are intended to address such a situation where the entity developing particular infrastructure is not the primary beneficiary. That is why FERC provides for a cost allocation and recovery mechanism whereby the developer of the upgrade can be compensated by the beneficiaries. Accordingly, the benefits of avoided refurbishment costs accrue to all the beneficiaries of the facility, regardless of who owns the lines. Therefore, no adjustment in cost allocation is to be made to the prescribed cost allocation and recovery methodology adopted herein on the basis that the current owner will avoid future refurbishment costs.

MISCELLANEOUS ISSUES

Value of Avoided Refurbishment Costs

Boundless asserts that DPS Trial Staff significantly exaggerated the avoided refurbishment costs for Project P11, while failing to credit any avoided refurbishment costs for the Boundless projects. Boundless asserts that Trial Staff's methodology should have chosen the lowest of available estimates of the cost of refurbishment, and should have applied efficiency factors to significantly reduce the cost estimates when two circuits are adjacent. Boundless estimates that its adjustments

would reduce the benefit/cost ratio for Project P11 from 1.20 to 1.15, or if other lower industry data was used, it would most probably drop below 1.0. Boundless does not provide an estimate of how much additional refurbishment credit to the Boundless projects would be needed to improve the 0.7 benefit cost ratios calculated for the two Boundless Projects P20 and P21.

The Trial Staff methodology, established in consultation with the consultant Brattle, appears to be reasonable and to have been fairly applied across all the projects. Each applicant could propose tweaks in the methodology that would tend to favor their own projects in relation to others, but the Commission is satisfied that Trial Staff followed its charge and has provided an independent and objective comparative evaluation of all the projects using reasonable assumptions. Trial Staff did in fact give Boundless Project P20 $157 million in avoided transmission cost credit, and Boundless Project P21 $76 million in avoided transmission cost credit.[26] Both credits were due to operation and maintenance costs that would be avoided due to the proposed reconductoring of the Leeds to Hurley Avenue, Leeds to Pleasant Valley, and CPV to and Rock Tavern lines, as appropriate to the project.

Boundless' question as to why it did not get refurbishment credit for reconductoring was addressed in the Trial Staff report at Brattle Slide 115. The information Trial Staff had and used as an assumption is that the lines in question were not slated for future reconductoring as a refurbishment, therefore reconductoring does not avoid a planned refurbishment. In any event, Boundless has not persuaded the Commission that the issues raised by Boundless would change the

[26] See Brattle Slide 111 attached to the Trial Staff report.

ultimate result were they to be modeled differently or more favorably to Boundless.

Potential NY-NE Powerflow Upgrade Costs

Boundless raises a concern that construction of a new Knickerbocker substation on a circuit leading to New England may result in what Boundless characterizes as an unexplored system upgrade cost element, possibly a significant cost element, that would not apply to the Boundless project, but would apply to others. As Boundless notes, the topic is expected to be examined in the System Reliability Impact Study (SRIS) for any project proposing such a substation. Boundless seeks a delay for that issue to be investigated.

The NYISO will resolve that issue in due course. At this point the concern raised by Boundless is speculative and the Commission is not persuaded that a process delay is necessary or in the public interest.

Project Modifications

Boundless criticizes project modifications proposed by Trial Staff as being in violation of a Commission directive that no substantial modifications in developers' project would be permitted after January 7, 2015. Yet Boundless was also the beneficiary of some of such modifications and now seeks approval of additional modifications to its projects.

The Commission finds that the modifications identified by Trial Staff were practical responses to the study results made in the interest of keeping the projects functional and cost efficient with as little negative impact as possible on the competitive process. The Commission's ban on modifications was intended to achieve finality and to prevent copycat ideas by developers that add no value. The ban was not directed at Trial Staff. In keeping with the ban, and in the interests of

fairness, the Commission will not entertain other modifications sought at this time by the developers.

Cost Recovery of Development Costs

The NYISO Open Access Tariff provides the developer of any selected transmission solution with full recovery of all costs to develop the transmission facility, assuming they are reasonably incurred.[27] The tariff does not appear to provide any recovery for the cost of developing alternative proposals that are ultimately not selected, with one exception. To ensure that there will be a response to the NYISO's solicitation of transmission solutions, the Commission may identify and request appropriate transmission owners or other developers to propose a transmission solution. Costs incurred by a transmission owner or other developer in preparing a proposed transmission solution in response to a request by the Commission will be recoverable.[28] The scope of costs that will be recoverable pursuant to the tariff will be determined by either the NYISO or FERC as the tariff has been established pursuant to FERC jurisdiction.

NextEra raises a concern that the NYISO's interpretation of the tariff may be unfair and too restrictive to encourage competition given the unusual procedural interplay between the commencement of these proceedings and the finalization of the Public Policy Requirements process when the cost recovery provisions became known. NextEra asks the

[27] Such cost recovery will include reasonable costs incurred, by the Transmission Owner or Other Developer, to provide a more detailed study or cost estimate for such project at the request of the NYPSC, and to prepare the application required to comply with New York Public Service Law Article VII, or any successor statute or any other applicable permits, and to seek other necessary authorizations. NYISO Open Access Transmission Tariff, Attachment Y, §31.5.6.5.

[28] NYISO Open Access Transmission Tariff, Attachment Y, §31.4.3.1. Recovery occurs under §31.5.6 of the tariff.

Commission to recommend to the NYISO that all costs incurred after August 13, 2014 should be eligible for recovery, and that the scope of cost recovery encourage further modifications consistent with the Trial Staff recommendations and any modifications that could be made to further reduce environmental impacts, improve electrical performance, or reduce costs. Boundless believes that its projects meet the goals the Commission initially announced; therefore it requests that Boundless and all developers be permitted to recover all development costs expended to date.

The Commission does not recommend that all developers be permitted to recover development costs expended to date, or that the costs of unsuccessful proposals be recovered except as provided in the tariff when the Commission has requested the developer to prepare a proposed transmission solution for submission to the NYISO. Competition works best when the competitors have a real stake in the results. The Commission does not want to create a cottage industry of entrepreneur-expert application drafters that enter competitions primarily to recoup their expert fees. More to the point, it should be noted that some of the many proposals submitted in these proceedings were not well thought out as to environmental impacts or electric system impacts such that they unnecessarily added to the burden of the review process. The Commission does not want to reward the applicants for submitting proposals that had obvious flaws, were not sufficiently designed, or were overly-redundant of other proposals.

As to the scope of costs that should be recoverable when the Commission has specifically requested the transmission owner or other developer to prepare a proposed transmission solution for submission to the NYISO, the Commission offers the following recommendations to the NYISO. It would be difficult

to establish a cut-off of recovery based on a specific date or event threshold. Each developer could make different arguments in that regard as to fairness as each has had different approaches and timelines as to preparation. What matters is the content, and not when it was prepared. In the Commission's view, the cost of creating any content that is necessary for submission to the NYISO under the tariff in support of the proposed transmission solution should be recoverable. It should not matter whether the content had been pre-prepared to satisfy some other purpose, such as the Part A filings made in these AC Transmission/Article VII cases. If the information is required or permitted by the NYISO tariff, the costs of preparation should be recoverable. Costs incurred for appearing and participating in the AC Transmission/Article VII cases, or in the preparation of alternatives that did not result in Commission requests to the transmission owner or other developer to prepare a proposed transmission solution for submission to the NYISO, may not be recoverable, in FERC's discretion. Finally, if the costs were already recouped in any manner in any other forum, no double-recovery of costs should be permitted.

Use of Utility Rights-of-Way by Non-utility Developers

The NYTOs currently have property rights (through their membership utility companies) to the essential rights-of-way under consideration for redevelopment in these proceedings. Their non-utility competitors in the comparative evaluation process and the future NYISO solicitation do not have such property rights. The NYISO Open Access Transmission Tariff requires the NYISO in evaluating transmission solutions to consider, among other things, the extent to which the developer of a proposed solution has the property rights, or ability to

obtain the property rights, required to implement the solution.[29] Concerns are raised by NAT and NextEra that the Commission's preference for transmission solutions that use existing rights-of-way not be used in the NYISO evaluation to disqualify non-utility applicants because the non-utility applicants do not already have a property interest in the existing utility rights-of-way. They argue that such a disqualification would undermine the concept of a competitive solicitation as only the utility competitor could ever win. The NYTOs for their part note that NAT and NextEra (a) fail to describe their plan with respect to rights-of-way ownership or control in the future (e.g., single ownership, mixed ownership and/or easements, shared use agreement, etc.) and how that plan would affect rights-of-way responsibilities, access and utility use issues going forward; and (b) fail to demonstrate how the need to secure the real property would impact the schedules and cost estimates presented to date.

NAT and NextEra are correct that their outright disqualification based solely on current non-ownership of essential utility rights-of-way would undermine the concept of a competitive solicitation. The selection process should be administered by the NYISO in a way that preserves both of the Commission's policies relevant to this discussion: (1) competition; and (2) minimization of new rights-of-way.

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[29] The [NY]ISO will consider whether the Developer: (i) already possesses the rights of way necessary to implement the solution; (ii) has completed a transmission routing study, which (a) identifies a specific routing plan with alternatives, (b) includes a schedule indicating the timing for obtaining siting and permitting, and (c) provides specific attention to sensitive areas (e.g., wetlands, river crossings, protected areas, and schools); or (iii) has a specified a plan or approach for determining routing and acquiring property rights [NYISO Open Access Transmission Tariff, Attachment Y, §31.4.8.1.6].

However, the issues noted by the NYTOs and described above are also relevant and material. Incumbent utilities should offer competitors the same terms they offer Transco; there should be no bias shown to Transco.

All applicants should present the NYISO with robust information and a plan with respect to rights-of-way ownership or control in the future and how that plan would affect rights-of-way responsibilities, access and utility use issues going forward. All applicants should also address how the need to secure the real property would impact their construction schedules and cost estimates. The Commission does not expect the utility company owner of the rights-of-way to give away its ratepayer-funded property rights for free. Nor does the Commission expect the utility company owner to allow the use of utility rights-of-way without reasonable operating conditions. Instead, the Commission expects the utility company owner to bargain in good faith to reach an agreement with the developer of the transmission solution as to property access and compensation as it would for other linear project developers that seek to co-locate on utility property. The utility company owner is the steward of the property held for the benefit of its ratepayers, and the beneficiaries of the transmission solution should provide just compensation to the utility company ratepayers that funded the asset.

Withdrawal of Projects/Segments

Trial Staff urges the Commission to request the applicants to withdraw their projects and project segments which do not best meet the Commission’s objectives and therefore have no expectation of public policy benefit and cost recovery. Trial Staff believes that withdrawal at this stage is in the public interest so as to not waste further effort on pursuing ideas that have no likelihood of future success; to provide

certainty to affected landowners and municipalities facing potential impacts from transmission upgrades; and to allow for market certainty as the applicants seek cost recovery at the NYISO. NAT has offered that it is willing to comply with such a request by the Commission.[30] The County of Delaware and the Village of Athens both provided comments in support of Staff's proposal and request further that once a proposal is withdrawn, that it not be reinstated without adequate notice.

The Commission finds that Trial Staff's request will further the orderly progress of these proceedings. Ordering clauses will be provided to effectuate the proposal in an appropriate manner including adequate notice provisions.

Segment B Upgrades

In assisting Trial Staff by conducting power flow analyses, the NYISO determined that all projects, with the exception of those proposed by Boundless, trigger a contingency on the existing double circuit 69 kV line from the Shoemaker to Sugarloaf substations in Orange County, which must be resolved for any of the projects to produce a positive benefit. In other words, if the Shoemaker to Sugarloaf line is not upgraded, the transmission solutions would not be allowed to operate at full capacity. Similarly, the NYISO found a need for upgrades to the Rock Tavern Substation, also in Orange County, so that it could handle the higher line currents that will result as a consequence of the new Edic/Marcy to New Scotland; Princetown to Rotterdam and Knickerbocker to Pleasant Valley lines. Trial Staff proposes that any developer of the Knickerbocker-Pleasant Valley segment work with the utility companies that own the affected facilities to ensure that they are upgraded. NAT seeks clarification as to who would perform the additional work and how the costs would be treated for both cost recovery and for

[30] NAT's cooperation is appreciated.

bidding. NextEra similarly requests clarification. Both of them appear to agree that the utility companies should do the work. The New York State Department of Environmental Conservation (DEC) seeks assurances that any work proposed for the Shoemaker to Sugarloaf right-of-way will be carefully planned after conducting habitat surveys and considering the need for avoidance and mitigation measures.

Orange and Rockland Utilities, Inc. (O&R) is the owner of the Shoemaker to Sugarloaf facilities and should do the necessary upgrades to those facilities. Central Hudson Gas & Electric Corporation (Central Hudson) is the owner of the Rock Tavern Substation and should do the necessary upgrades to the substation. O&R and Central Hudson should be reimbursed by the developer of the Segment B transmission solution for their actual reasonable costs in performing the upgrades. The developer in turn should recover those costs as a pass-through from the beneficiaries of the Segment B transmission solution through the NYISO Open Access Transmission Tariff. The developer should not be subject to risk sharing incentives as to those pass-through costs, as the developer has no control over the costs. For the purposes of bids, all developers should include the upgrade costs in their bids at the same level, and the upgrade costs should not be used as a distinguishing factor between bids. The developers should use the estimates provided in the Trial Staff report as a placeholder for the actual costs.

PROCESS OBJECTIONS

Scope of Staff Report

HVSEC claims that the September 22, 2015 Staff Report improperly included analysis that was introduced for the first time in these proceedings, including: reliance on Public Policy Requirements to justify the need for the transmission lines; evaluation of non-transmission alternatives including the

Commission's REV initiative; a new power flow analysis of the impact of the CPV Valley Generating Facility; and the conclusion that the Rock Tavern Substation and the Shoemaker to Sugarloaf line need to be upgraded in the Knickerbocker-Pleasant Valley section of the P11 corridor. HVSEC argues that because this analysis was not introduced sooner in the proceeding, the record is incomplete. It also claims that it and other intervenor parties have been deprived of the opportunity to seek intervenor funding to evaluate Staff's analysis and meaningfully contribute to the record on these issues, and it requests that the Commission withhold a decision on Staff's motion while it seeks leave to apply for additional intervenor funding. HVSEC argues that the Commission did not intend for Staff to rely on Public Policy Requirements to justify its conclusion and that the Commission's December 16, 2014 Order expressly declared a PPR justification was not part of the present proceedings.

Discussion

Earlier in these proceedings, HVSEC requested that the Commission expand the scope of the comparative evaluation to include an overall analysis of need by Trial Staff. The Commission was fully responsive to the request and in the December 16, 2014 Order required Trial Staff to address overall need in its report. The schedule attached to the December 16, 2014 Order also shows that it was clearly intended that the Public Policy Requirements analysis would be done on a parallel path and on a common record. The various notices issued in these proceedings also support these facts. Now that Trial Staff has provided the analysis HVSEC requested, it is raising procedural objections. The Commission rejects these objections as not correct. The objections ring hollow as they appear to be motivated more by the result than the process. The parties have been aware since December 2014 that the overall need issue would

be addressed. And with such knowledge, HVSEC commissioned two studies using intervenor funds[31] which it has argued for months prove that there is no overall need for the facilities. A large portion of HVSEC's efforts in these proceedings have been directed at the overall need issue and its experts, including its need experts, have been accommodated in all processes including the technical conferences. The parties have had ample opportunity to participate and further process is therefore unnecessary.

SAPA Notice

HVSEC argues that the October 7, 2015 SAPA Notice does not comply with the Commission's own procedures because the issuance of the notice did not occur within 45 days of the posting of public policy transmission need on the Commission's website. Rather, that posting occurred over one year before the Notice. HVSEC also argues that neither Staff's motion, nor the SAPA notice reference the Public Policy Transmission Planning Process (PPTPP) in NYISO's OATT.

Discussion

A SAPA notice was issued within 45 days of the posting of public policy transmission need on the Commission's website. After considering the comments submitted in response to that SAPA notice, the Commission decided to proceed to a decision on the Western New York issue, to decline to proceed on other proposals, and to defer a decision on the AC transmission issue until the Trial Staff report was issued. After the Trial Staff report was issued, a second SAPA notice was issued directed solely at the AC transmission issue. It is within the Commission's prerogative to make such pragmatic alterations to

[31] A total of $270,000 in intervenor funds was awarded to HVSEC for it to conduct studies in these proceedings.

the schedule in consideration of all the circumstances. HVSEC is incorrect as to the contents of the SAPA notice.

Process Shift to NYISO

According to HVSEC, if the Commission adopts Staff's recommendations, the process will shift to the NYISO to issue RFPs, to which any developer, not just those in this proceeding, may submit a response. HVSEC argues this would create an entirely new process not contemplated when this comparative proceeding was originally commenced, which would result in confusion and delays.

Discussion

HVSEC's concern about delays appears to be inconsistent with its other positions and process objections. The relationship to the Public Policy Transmission Planning Process has been apparent to all parties for some time. It is difficult to understand how HVSEC could make such a claim at this time.

System Reliability Impact Study (SRIS)

The Commission's desire to ensure that developers are able to demonstrate that they have the ability to proceed with their projects in a timely fashion resulted in the establishment of a deadline for providing notification that a System Reliability Impact Study (SRIS) was in progress pursuant to the tariff requirements of the NYISO. The deadline has been repeatedly extended in the face of practical realities that the sheer number of project proposals has been too large to justify separate studies for every project, and a desire by the Commission that the developers refine their project proposals to minimize environmental and landowner impacts. Issuance of the Trial Staff report approximately one week before the extended deadline further complicates the question because of the recent discovery of the necessary additional system upgrades identified

in the report that were previously unknown to the parties, but may have an impact on the studies. Given these circumstances and the anticipated pending solicitation of transmission solutions by the NYISO, the Commission will suspend the application of the deadline and defer SRIS timing issues to the NYISO processes.

FINDINGS AND CONCLUSION

The Commission finds and determines that there is a transmission need driven by Public Policy Requirements as specifically described in Appendix A attached hereto. This transmission need driven by Public Policy Requirements shall be addressed by the NYISO by the solicitation and review of solutions, with the potential for the developers of any selected transmission solutions to obtain cost recovery for their development and construction costs from the beneficiaries of the new transmission facilities through the NYISO Tariff regulated by FERC. The relevant Public Policy Requirements driving such transmission needs are identified below.

The Commission hereby finds that having considered the extensive record in these proceedings, it is the public policy of the State of New York and the Public Service Commission: to reduce transmission congestion so that large amounts of power can be transmitted to regions of New York where it is most needed; to reduce production costs through congestion relief; reduce capacity resource costs; to improve market competition and liquidity; to enhance system reliability, flexibility, and efficiency; to improve preparedness for and mitigation of impacts of generator retirements; enhance resiliency/storm hardening; to avoid refurbishment costs of aging transmission; to take better advantage of existing fuel diversity; to increase diversity in supply, including additional renewable resources;

to promote job growth and the development of new efficient generation resources Upstate; to reduce environmental and health impacts through reductions in less efficient electric generation; to reduce costs of meeting renewable resource standards; to increase tax receipts from increased infrastructure investment; to enhance planning and operational flexibility; to obtain synergies with other future transmission projects; and to relieve gas transportation constraints, in the balanced and cost-effective manner that would be accomplished by the construction and operation of a portfolio of 345 kV transmission projects to reconfigure and upgrade transmission facilities from the Edic or Marcy substations to the New Scotland substation with a tie-in to the Rotterdam substation, and from a new Knickerbocker substation to the Pleasant Valley substation, with upgrades at the Greenbush substation, including also upgrades to the Rock Tavern substation, and the construction of a new double circuit 138 kV line from the Shoemaker to Sugarloaf substations (and as more specifically described in Appendix A attached hereto), and that such policies constitute Public Policy Requirements driving transmission needs.

The Commission also hereby finds that: the 2015 State Energy Plan, which contains adopted policies and long-range energy planning objectives and strategies, including fulfillment of the action items that constitute New York's Energy Highway Blueprint (implementation of a proposal to upgrade the transmission system being evaluated in the AC Transmission proceedings are one of the action items);[32] Section 6-104(1) of the Energy Law which requires the State Energy Planning Board to

[32] New York State Energy Planning Board, The Energy to Lead: 2015 New York State Energy Plan (June 25, 2015), Volume 1, pp. 93-94.

adopt a State Energy Plan; and Section 6-104(5)(b) of the Energy Law which generally requires the Commission to make energy-related actions or decisions that are reasonably consistent with the policies and long-range energy planning objectives and strategies contained in the State Energy Plan; together constitute Public Policy Requirements driving transmission needs.

The above identification of Public Policy Requirements driving transmission needs are hereby identified both jointly, as both contributing to the same conclusion, and severally, as each finding providing an independent identification of Public Policy Requirements driving transmission needs.

The Commission orders:

1. The Commission finds and determines that there is a transmission need driven by Public Policy Requirements as described in the body of this order and as more specifically described in Appendix A attached hereto. This transmission need driven by Public Policy Requirements shall be addressed by the New York Independent System Operator, Inc. (NYISO) by the solicitation and review of solutions, with the potential for the developers of any selected transmission solutions to obtain cost recovery for their development and construction costs from the beneficiaries of the new transmission facilities through the NYISO Open Access Transmission Tariff regulated by the Federal Energy Regulatory Commission (FERC).

2. In conjunction with the above Public Policy Requirements determination, the Commission establishes evaluation criteria set forth in Appendix B attached hereto. The NYISO shall apply such criteria in evaluating transmission solutions to satisfy the identified transmission need.

3. In conjunction with the above Public Policy Requirements determination, the Commission identifies specific analyses, set forth in Appendix C attached hereto, for the NYISO to undertake in reviewing transmission solutions to satisfy the identified transmission need.

4. In conjunction with the above Public Policy Requirements determination, the Commission prescribes the use of the cost allocation and recovery methodology set forth in Appendix D attached hereto. The NYISO shall file the prescribed cost allocation and recovery methodology with FERC in the manner provided for in the NYISO Open Access Transmission Tariff.

5. In Case 13-T-0454, the applicant, North America Transmission Corporation and North America Transmission, LLC (NAT), is hereby requested to withdraw, effective on or before January 15, 2016, the following routes from further consideration in the proceeding (such withdrawals to be effective concurrently in Cases 12-T-0502 and 13-E-0488):

(a) Edic to Fraser (P1, P2, P3, P4, P5);

(b) New Scotland to Pleasant Valley (P1, P3);

(c) New Scotland to Pleasant Valley (Alt. 1/I-87)(P2); and

(d) New Scotland to Knickerbocker (P4, P5); and

(e) Knickerbocker to Pleasant Valley (P4).

6. NAT is hereby requested to propose to the NYISO NAT's Knickerbocker to Pleasant Valley (P5) transmission solution, coupled with the necessary add-on Rock Tavern Substation terminal upgrades and Shoemaker to Sugarloaf transmission line upgrades, such that NAT's costs incurred in preparing a proposed solution in response to this request will be recoverable under the NYISO tariff.

7. In Case 13-M-0457, the applicant, New York Transmission Owners (NYTOs), is hereby requested to withdraw, effective on or before January 15, 2016, the following

routes/equipment from further consideration in the proceeding (such withdrawals to be effective concurrently in Cases 12-T-0502 and 13-E-0488):

(a) Oakdale to Fraser (P10);

(b) Edic to New Scotland; Princetown to Rotterdam (P10, P12, P13, P14);

(c) New Scotland to Leeds (Reconductor) (P9, P12, P14);

(d) Leeds to Pleasant Valley (P9, P14);

(e) Leeds to Pleasant Valley (Reconductor)(P7, P12);

(f) Knickerbocker to Pleasant Valley (P10); and

(g) Hurley Avenue PARS (P8, P13)

8. NYTOs are hereby requested to propose to the NYISO NYTOs' Edic to New Scotland; Princetown to Rotterdam (P11) transmission solution such that NYTOs' costs incurred in preparing a proposed solution in response to the Commission's request will be recoverable under the NYISO tariff.

9. NYTOs are hereby requested to propose to the NYISO NYTOs' Knickerbocker to Pleasant Valley (P6, P11) transmission solution, coupled with the necessary add-on Rock Tavern Substation terminal upgrades and Shoemaker to Sugarloaf transmission line upgrades, such that NYTOs' costs incurred in preparing a proposed solution in response to the Commission's request will be recoverable under the NYISO tariff.

10. In Case 13-T-0456, the applicant, NextEra Energy Transmission New York (NextEra), is hereby requested to withdraw, effective on or before January 15, 2016, the entire application for the Oakdale to Fraser project (P19b) from further consideration in the proceeding (such withdrawals to be effective concurrently in Cases 12-T-0502 and 13-E-0488).

11. In Case 13-T-0455, the applicant, NextEra, is hereby requested to withdraw, effective on or before January 15, 2016, the following routes from further consideration in the

proceeding (such withdrawals to be effective concurrently in Cases 12-T-0502 and 13-E-0488):

(a) Edic to Pleasant Valley (P15);

(b) Marcy to New Scotland (P18);

(c) Marcy to Rotterdam (P16);

(d) New Scotland to Knickerbocker (P17);

(e) Greenbush to Pleasant Valley (P16, P18, P19a); and

(f) Greenbush to Knickerbocker (P17).

12. NextEra is hereby requested to propose to the NYISO NextEra's Marcy to New Scotland; Princetown to Rotterdam (P17) transmission solution such that NextEra's costs incurred in preparing a proposed solution in response to the Commission's request will be recoverable under the NYISO tariff.

13. NextEra is hereby requested to propose to the NYISO NextEra's Greenbush to Pleasant Valley (P17, P19c) transmission solution, coupled with the necessary add-on Rock Tavern Substation terminal upgrades and Shoemaker to Sugarloaf transmission line upgrades, such that NextEra's costs incurred in preparing a proposed solution in response to the Commission's request will be recoverable under the NYISO tariff.

14. In Case 13-T-0461, the applicant, Boundless Energy NE, LLC (Boundless), is hereby requested to withdraw, effective on or before January 15, 2016, the entire application for all its project segments from further consideration in the proceeding (such withdrawals to be effective concurrently in Cases 12-T-0502 and 13-E-0488). The project segments to be withdrawn include:

(a) Hurley Avenue to Leeds (Reconductor) (P20, P21);

(b) Leeds to Pleasant Valley (Reconductor) (P20);

(c) CPV Tap to Rock Tavern (Reconductor) (P20, P21); and

(d) Roseton to East Fishkill (Underground) (P20, P21).

15. Once an application, route, project segment or equipment is withdrawn from further consideration in a proceeding, it shall not be re-introduced into the proceeding except on notice in the manner provided in Public Service Law Section 122(2) for new applications.

16. The above requests by the Commission to withdraw an application, route, project segment or equipment from further consideration in a proceeding are to be effectuated by filing written withdrawal statements with the Commission.

17. Any applicant that decides not to comply with any of the above requests by the Commission to withdraw an application, route, project segment or equipment from further consideration in a proceeding by the date requested is hereby directed to file with the Commission on or before January 15, 2016, a written (a) explanation as to why the applicant has decided not to comply with any such request; and (b) a statement of the applicant's going-forward intent regarding consideration by the Commission of the affected application, route, project segment or equipment.

18. Unless the NYISO determines that the upgrades are not material to the accomplishment of the purposes of the Segment B transmission solution, Orange and Rockland Utilities, Inc. (O&R) as the owner of the Shoemaker to Sugarloaf facilities shall work with the developer of any selected transmission solution regarding Segment B and shall pursuant to a written agreement to be negotiated between the two, design, obtain approvals and perform the necessary upgrades to those facilities identified in this order and shall be reimbursed by the developer of the Segment B transmission solution for the actual reasonable costs to design, obtain approvals and perform the upgrades. The NYISO and DPS Staff shall be consulted by O&R as part of the design process. Nothing herein waives the need, if

any, for O&R to obtain an Article VII certificate or certificate amendment, or other approvals, prior to constructing such upgrades.

19. Unless the NYISO determines that the upgrades are not material to the accomplishment of the purposes of the Segment B transmission solution, Central Hudson Gas & Electric Corporation (Central Hudson) as the owner of the Rock Tavern Substation shall work with the developer of any selected transmission solution regarding Segment B and shall pursuant to a written agreement to be negotiated between the two, design, obtain approvals and perform the necessary upgrades to the substation identified in this order and shall be reimbursed by the developer of the Segment B transmission solution for the actual reasonable costs to design, obtain approvals and perform the upgrades. The NYISO and DPS Staff shall be consulted by Central Hudson as part of the design process. Nothing herein waives the need, if any, for Central Hudson to obtain an Article VII certificate or certificate amendment, or other approvals, prior to constructing such upgrades.

20. This order constitutes a rule adopted subject to and in accordance with the State Administrative Procedure Act.

21. This order in its entirety shall constitute the written statement of the Commission to be provided to the NYISO during the identification step of the NYISO Public Policy Transmission Planning Process described in the body of this order.

22. In the Secretary’s sole discretion, the deadlines set forth in this order may be extended. Any request for an extension must be in writing, must include a justification for the extension, and must be filed at least one day prior to the affected deadline.

23. These proceedings are continued.

By the Commission,

(SIGNED) KATHLEEN H. BURGESS
Secretary

TRANSMISSION NEED DRIVEN BY PUBLIC POLICY REQUIREMENTS

SEGMENT A

Edic/Marcy to New Scotland; Princetown to Rotterdam
Construction of a new 345 kV line from Edic or Marcy to New Scotland on existing right-of-way (primarily using Edic to Rotterdam right-of-way west of Princetown); construction of two new 345 kV lines or two new 230 kV lines from Princetown to Rotterdam on existing Edic to Rotterdam right-of-way; decommissioning of two 230 kV lines from Edic to Rotterdam; related switching or substation work at Edic or Marcy, Princetown, Rotterdam and New Scotland.

SEGMENT B

Knickerbocker to Pleasant Valley
Construction of a new double circuit 345 kV/115 kV line from Knickerbocker to Churchtown on existing Greenbush to Pleasant Valley right-of-way; construction of a new double circuit 345 kV/115 kV line or triple circuit 345 kV/115 kV/115 kV line from Churchtown to Pleasant Valley on existing Greenbush to Pleasant Valley right-of-way; decommissioning of a double-circuit 115 kV line from Knickerbocker to Churchtown; decommissioning of one or two double-circuit 115 kV lines from Knickerbocker to Pleasant Valley; construction of a new tap of the New Scotland-Alps 345 kV line and new Knickerbocker switching station; related switching or substation work at Greenbush, Knickerbocker, Churchtown and Pleasant Valley substations.

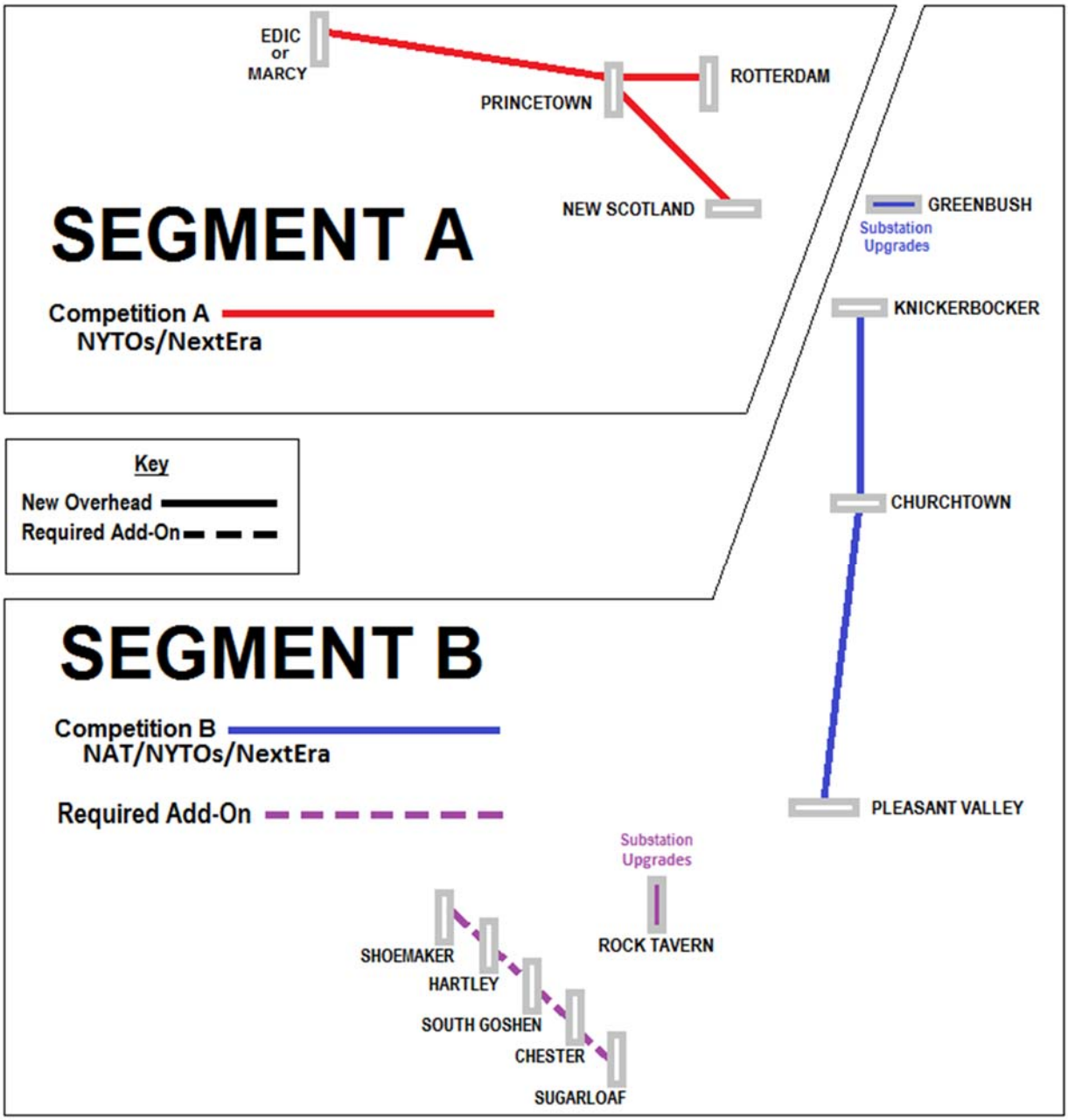
Upgrades to the Rock Tavern Substation
New line traps, relays, potential transformer upgrades, switch upgrades, system control upgrades and the installation of data acquisition measuring equipment and control wire needed to handle higher line currents that will result as a consequence of the new Edic/Marcy to New Scotland; Princetown to Rotterdam and Knickerbocker to Pleasant Valley lines.

Shoemaker to Sugarloaf
Construction of a new double circuit 138 kV line from Shoemaker to Sugarloaf on existing Shoemaker to Sugarloaf right-of-way; decommissioning of a double circuit 69 kV line from Shoemaker to Sugarloaf; related switching or substation work at Shoemaker, Hartley, South Goshen, Chester, and Sugarloaf.

Notes:
The need is for the entire portfolio, but the portfolio lends itself to segmentation such that transmission solutions should be solicited in a manner that allows applicants to propose solutions either by segment or on a combined portfolio basis, or in the alternative on both bases. Segment A depends upon Segment B being in place, so Segment A would not be constructed without certainty that Segment B would be constructed. Segment B depends upon certain specified add-ons being in place, so Segment B would not be constructed without certainty that the specified add-ons would be constructed.

APPENDIX A

SCHEMATIC LAYOUT OF SEGMENTS



EVALUATION CRITERIA

The New York Independent System Operator, Inc. (NYISO) shall apply the following additional criteria for the evaluation of transmission solutions and non-transmission projects:

1. No transmission solution shall be selected that requires the acquisition of new permanent transmission rights-of-way, except for de minimus acquisitions that cannot be avoided due to unique circumstances. For the purposes of this criterion, the transfer or lease of existing transmission right-of-way property or access rights from a current utility company owner to a developer of the transmission solution shall not be considered such an acquisition.

2. The selection process for transmission solutions shall favor transmission solutions that minimize the acquisition of property rights for new substations and substation expansions. For the purposes of this criterion, the transfer or lease of existing property rights from a current utility company owner to a developer of the transmission solution shall not be considered such an acquisition.

3. No transmission solution shall be selected that includes a crossing of the Hudson River, either overhead, underwater, in riverbed, or underground, or in any other way, by any component of the transmission facility.

4. No transmission solution shall be selected for Segment B that provides less than a 900 MW increase in normal transfer capability (NTC) across the UPNY/SENY interface pursuant to the methodology employed by the NYISO for the Trial Staff report in the AC Transmission proceedings.

5. No transmission solution shall be selected for Segment B that does not incorporate certain specified add-ons that would be constructed (i.e., upgrades to the Rock Tavern Substation; upgrades to the Shoemaker to Sugarloaf transmission lines), unless the NYISO determines that such add-ons, jointly or severally, are not material to the accomplishment of the purpose of the transmission solution for Segment B.

6. The selection process for transmission solutions for Segment B shall not use the costs of upgrades to the Rock Tavern Substation and upgrades to the Shoemaker to Sugarloaf transmission lines as a distinguishing factor between bids. The developers shall include the upgrade costs in their bids at the same level using the cost estimates for the upgrades provided in the Trial Staff report as a placeholder for the actual costs.

7. No transmission solution shall be selected for Segment A that provides less than a 350 MW increase in normal transfer capability (NTC) across the Central East interface pursuant to the methodology employed by the NYISO for the Trial Staff report in the AC Transmission proceedings.

8. No transmission solution shall be selected for Segment A unless a transmission solution is selected for Segment B.

9. No transmission solution shall be selected for Segment A except on condition that the transmission solution selected for Segment A shall not be implemented until there is reasonable certainty established in a manner to be determined by the NYISO that the transmission solution selected for Segment B will be implemented.

10. The selection process for transmission solutions shall favor transmission solutions that result in upgrades to aging infrastructure.

11. Project selection shall be competitive by segment, but synergies produced by being selected to provide both segments may be considered.

12. No transmission solution shall be selected unless the developer has submitted a cost estimate or bid that does not exceed the cost estimate at the level estimated by Trial Staff for the applicant's project unless the applicant can demonstrate to the NYISO that upward estimates are necessary to correct errors or omissions made by Trial Staff for the components that were added or adjusted by Trial Staff.

13. The selection process for Segment B shall not use the cost to do the necessary upgrades to the Shoemaker to Sugarloaf facilities and the Rock Tavern Substation as a distinguishing factor between bids. For the purposes of bids, all developers should include the upgrade costs in their bids at the same level, using the estimates provided in the Trial Staff report as a placeholder for the actual costs.

14. The percentage rates applied to account for contingencies and revenue requirement should all be treated uniformly across all estimates so that those factors are not manipulated by the bidders to confuse or artificially skew the results. The selection process shall not use the percentage rates applied to account for contingencies and revenue requirement as a distinguishing factor between bids. For the purposes of bids, all developers should account for contingencies and revenue requirement at the percentage rates provided in the Trial Staff report as a placeholder for the actual rates.

SPECIFIC ANALYSES

The New York Independent System Operator, Inc. (NYISO) shall undertake the following analyses (in addition to those already required by the tariff) for use in the evaluation of transmission solutions and non-transmission projects:

1. The NYISO shall apply its expertise and design a more granular cost allocation among downstate entities.

2. If possible in time for the solicitation of solutions, the NYISO shall apply its expertise and knowledge of the bulk electric system, its tariff process and the Commission's Article VII siting process and establish an intended in-service year against which the project schedules for the proposed solutions shall be evaluated.

3. In evaluating project costs, the NYISO shall identify the necessary project elements of each project and ensure that all of the proposed transmission solutions are evaluated on a comparable basis as to the scope of costs. As to each necessary project element identified by the NYISO, it shall evaluate the costs proposed by each applicant and provide an evaluation of the reasonableness of the costs and the potential for cost overruns.

4. In evaluating project costs, the NYISO shall require each proposer of a transmission solution to submit at least two project cost bids. This requirement shall not preclude the proposer from submitting other additional bids pursuant to other incentive regimes that might be proposed by them. The first required bid shall presume that all prudently incurred costs will be recovered and there will be no sharing of cost overruns by the developer. The second required bid shall reflect the following incentive regime to control costs:

    If actual costs come in above a bid, the developer shall bear 20% of the cost over-runs, while ratepayers shall bear 80% of those costs. If actual costs come in below a bid, then the developer should retain 20% of the savings. Furthermore, if the developer seeks incentives from FERC above the base return-on-equity otherwise approved by FERC, then the developer shall not receive any incentives above the base return-on-equity on any cost overruns over the bid price. The bid price would therefore cap the costs that may be proposed to FERC for incentives.

PRESCRIBED COST ALLOCATION AND RECOVERY METHODOLOGY

The New York Independent System Operator, Inc. (NYISO) shall file the following prescribed cost allocation and recovery methodology with the Federal Energy Regulatory Commission (FERC):

> The cost allocation and recovery methodology shall be based on a "beneficiaries pay" approach for allocating costs, whereby those that derive the benefits of a project shall bear the costs. In that regard, 75% of project costs are to be allocated to the economic beneficiaries of reduced congestion, while the other 25% of the project costs are to be allocated to all customers on a load-ratio share. The benefits of avoided refurbishment costs in this instance accrue to all the beneficiaries of the new transmission facility regardless of who owns the current transmission lines and therefore no adjustment in cost allocation is to be made on the basis that the current owners will avoid future refurbishment costs. To ensure equity based on the overriding principle that "beneficiaries pay", the NYISO shall apply its expertise and design a more granular cost allocation among downstate entities after first applying the methodology described above to determine the respective shares of upstate and downstate entities. For these purposes, upstate is defined as NYISO Locational Based Marginal Pricing (LBMP) Zones A-F, and downstate is defined as LBMP Zones G-K.
>
> For transmission solutions for Segment B, the costs of upgrades to the Rock Tavern Substation and upgrades to the Shoemaker to Sugarloaf transmission line are pass-through costs that shall not be subject to any risk sharing incentives as to those costs.

Note: This will result in approximately 90% of the project costs being allocated to customers in the downstate region, and about 10% to upstate customers. This allocation reflects that the primary benefit of the projects will be reduced congestion into downstate load areas, but also recognizes that some benefits accrue to upstate customers in the form of increased reliability and reduced operational costs.

APPENDIX E

TRIAL STAFF PROJECT COST ESTIMATES
BY DEVELOPER AND SEGMENT

NYTOs	Segment A	Unstated
NYTOs	Segment B	$631,056,714
NYTOs	Segment A + B	$1,188,796,308
NextEra	Segment A	Unstated
NextEra	Segment B	$460,855,417
NextEra	Segment A + B	$1,038,632,316
NAT	Segment B	$712,600,886

Note: No transmission solution shall be selected unless the developer has submitted a cost estimate or bid that does not exceed the cost estimate at the level estimated by Trial Staff for the applicant's project unless the applicant can demonstrate to the NYISO that upward estimates are necessary to correct errors or omissions made by Trial Staff for the components that were added or adjusted by Trial Staff.

Appendix G

STATE OF NEW YORK
PUBLIC SERVICE COMMISSION

At a session of the Public Service Commission held in the City of Albany on January 24, 2017

COMMISSIONERS PRESENT:

Audrey Zibelman, Chair
Patricia L. Acampora
Gregg C. Sayre
Diane X. Burman

CASE 12-T-0502 - Proceeding on Motion of the Commission to Examine Alternating Current Transmission Upgrades.

CASE 13-E-0488 - In the Matter of Alternating Current Transmission Upgrades – Comparative Proceeding.

CASE 13-T-0454 - Application of North America Transmission Corporation and North America Transmission, LLC for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII of the Public Service Law for an Alternating Current Transmission Upgrade Project Consisting of an Edic to Fraser 345 kV Transmission Line and a New Scotland to Leeds to Pleasant Valley 345 kV Transmission Line.

CASE 13-T-0455 - Part A Application of NextEra Energy Transmission New York, Inc. for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII of the Public Service Law for the Marcy to Pleasant Valley Project.

CASE 13-T-0456 - Part A Application of NextEra Energy Transmission New York, Inc. for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII for the Oakdale to Fraser Project.

CASE 13-T-0457 - Application of New York Transmission Owners Pursuant to Article VII for Authority to Construct and Operate Electric Transmission Facilities in Multiple Counties in New York State.

CASES 12-T-0502, et al.

CASE 13-T-0461 - Application of Boundless Energy NE, LLC for a Certificate of Environmental Compatibility and Public Need Pursuant to Article VII for Leeds Path West Project.

CASE 14-E-0454 - In the Matter of New York Independent System Operator, Inc.'s Proposed Public Policy Transmission Needs for Consideration

ORDER ADDRESSING PUBLIC POLICY TRANSMISSION NEED FOR AC TRANSMISSION UPGRADES

(Issued January 24, 2017)

BY THE COMMISSION:

INTRODUCTION

On December 17, 2015, the Commission issued an order finding that the need for certain upgrades across the Central East and Upstate New York (UPNY)/Southeast New York (SENY) portions of the AC transmission system were being driven by a Public Policy Requirement, as defined under the New York Independent System Operator, Inc.'s (NYISO) federally-approved Open Access Transmission Tariff (OATT).[1] Pursuant to the NYISO's OATT, any Public Policy Requirements identified by the Commission that may be driving the need for additional transmission facilities, referred to as Public Policy Transmission Needs (PPTNs), are forwarded to the NYISO to solicit potential solutions and to prepare a Viability and Sufficiency Assessment of the proposed projects.

As directed under the OATT, the NYISO issued a solicitation on February 29, 2016, seeking potential solutions to resolve the Public Policy Requirement identified by the

[1] Case 12-T-0502, Order Finding Transmission Needs driven by Public Policy Requirements (issued December 17, 2015) (December 2015 Order).

Commission. In response to the solicitation, the NYISO received proposals from six developers, which submitted a total of 16 projects. These projects included 15 transmission projects and one non-transmission proposal.

The NYISO filed the results of its Viability and Sufficiency Assessment on October 28, 2016 (Filing). The Filing also included the results of the NYISO's analysis of cost allocation methodologies that comport with the Commission-identified Public Policy Requirement. On November 16, 2016, a Notice of Proposed Rulemaking (Notice) was published regarding the Filing and inviting comments from interested entities.

In this order, the Commission considers the comments received in response to the Notice and finds that a PPTN continues to exist with respect to the Central East and UPNY/SENY AC transmission upgrades. Accordingly, the NYISO should proceed to a full evaluation and selection, as appropriate, of the more efficient or cost-effective transmission solution to meet the PPTN. Further, the Commission adopts the cost allocation methodology outlined in the NYISO's analysis for recovering the costs of the transmission upgrades, which the NYISO should file with the Federal Energy Regulatory Commission (FERC). The Commission will remain responsible for ensuring that any applicant seeking to site, construct, and operate these transmission facilities has obtained the requisite authorizations under the Public Service Law (PSL).

BACKGROUND

The Public Policy Transmission Planning Process

The NYISO's Public Policy Transmission Planning Process (PPTPP) was developed to comply with FERC's Order No. 1000, which required, in part, the development of a planning process for the consideration of public policy-driven

transmission needs.[2] The NYISO's PPTPP consists of four main steps, which include: (1) the identification of Public Policy Requirements/PPTNs; (2) the solicitation of proposed solutions to identified PPTNs; (3) the evaluation of the viability and sufficiency of proposed transmission and non-transmission solutions to the PPTNs; and, (4) upon confirmation of the transmission need by the Commission, the evaluation and selection of the more efficient or cost-effective transmission project to satisfy the PPTN.[3]

The NYISO's PPTPP establishes the Commission's role in identifying any Public Policy Requirements, and confirming that such requirements continue to exist after reviewing the results of the NYISO's Viability and Sufficiency Analysis. The NYISO OATT defines a Public Policy Requirement as:

> [a] federal or New York State statute or regulation, including [an order issued by the Commission] adopting a rule or regulation subject to and in accordance with the State Administrative Procedure Act, any successor statute, or any duly enacted law or regulation passed by a local governmental entity in New York State, that may relate to transmission planning on the [Bulk Power Transmission Facilities].[4]

The Commission established the procedures for identifying any Public Policy Requirements and the process for carrying out its responsibilities in an August 2014 Policy

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[2] See, Docket No. RM10-23-000, Transmission Planning and Cost Allocation by Transmission Owning and Operating Public Utilities, Order No. 1000 (issued July 21, 2011), reh'g denied, Order No. 1000-A (issued May 17, 2012) reh'g denied, Order No. 1000-B (issued October 18, 2012).

[3] NYISO Public Policy Transmission Planning Process Manual; Section 1.2 (July 2015).

[4] NYISO OATT, Attachment Y, §31.1.1.

Statement.[5] Under the final step identified in the August 2014 Policy Statement, the Commission determines, after reviewing the NYISO's Viability and Sufficiency Assessment of any proposed solutions, whether a transmission solution should or should not be pursued further.

Assuming the Commission determines to pursue a transmission solution, the process specified under the NYISO OATT requires the NYISO to prepare fully detailed analyses. The NYISO then provides its full analyses in a Public Policy Transmission Planning Report, in which it may select the more efficient or cost-effective transmission solution to the identified PPTN, based on various metrics specified under its OATT.[6] The NYISO will also include, to the extent it is feasible, any criteria or analyses specified by the Commission or contained within the Public Policy Requirement. Transmission projects selected by the NYISO are eligible for cost allocation and recovery under the NYISO's OATT.

NYISO's Solicitation of Needs

On August 1, 2014, the NYISO initiated the first round of its PPTPP under its OATT by requesting interested entities to identify any potential transmission needs that may be driven by

[5] Case 14-E-0068, Policies and Procedures Regarding Transmission Planning for Public Policy Purposes, Policy Statement on Transmission Planning for Public Policy Purposes (issued August 15, 2014) (August 2014 Policy Statement).

[6] In determining which transmission solution is the more efficient or cost-effective, the NYISO considers several metrics, including: cost estimates, cost per MW ratio, expandability of the project, flexibility in operating the system (such as generation dispatch, access to operating reserves and ancillary services, or ability to remove transmission for maintenance), utilization of the system (such as interface flows or percent loading of facilities), a developer's property rights, potential construction delays, and impacts on NYISO-administered markets.

a Public Policy Requirement. Following its receipt of responses, the NYISO filed the proposed Public Policy Requirements for the Commission's consideration. While the Commission initially identified a PPTN to relieve transmission congestion in Western New York, the Commission noted that it was continuing to address the need for AC transmission upgrades across the Central East and UPNY/SENY interfaces.[7] The Commission's December 2015 Order ultimately found that relieving constraints across the Central East ("Segment A") and UPNY/SENY ("Segment B") portions of the transmission system (collectively, the AC Transmission PPTN) would advance numerous public policies. Accordingly, the AC Transmission PPTN was referred to the NYISO to solicit and evaluate potential solutions.

In referring the AC Transmission PPTN, the Commission described the two segments as:

> SEGMENT A:
> Edic/Marcy to New Scotland; Princetown to Rotterdam
> Construction of new 345 kV line from Edic or Marcy to New Scotland on existing right-of-way (primarily using Edic to Rotterdam right-of-way west of Princetown); construction of two new 345 kV lines or two new 230 kV lines from Princetown to Rotterdam on existing Edic to Rotterdam right-of-way; decommissioning of two 230 kV lines from Edic to Rotterdam; related switching or substation work at Edic or Marcy, Princetown, Rotterdam and New Scotland.
>
> SEGMENT B:
> Knickerbocker to Pleasant Valley
> Construction of a new double circuit 345 kV/115 kV line from Knickerbocker to Churchtown on existing Greenbush to Pleasant Valley right-of-way; construction of a new double circuit 345 kV/115 kV line or triple circuit 345 kV/115 kV/115 kV line from Churchtown to Pleasant Valley on existing Greenbush to Pleasant Valley right-of-way; decommissioning of a

[7] Case 14-E-0454, Order Addressing Public Policy Requirements for Transmission Planning Purposes (issued July 20, 2015), p. 30.

> double-circuit 115 kV line from Knickerbocker to Churchtown; decommissioning of one or two double-circuit 115 kV lines from Knickerbocker to Pleasant Valley; construction of a new tap of the New-Scotland-Alps 345 kV line and new Knickerbocker switching station; related switching or substation work at Greenbush, Knickerbocker, Churchtown and Pleasant Valley substations.
>
> Upgrades to the Rock Tavern Substation
> New line traps, relays, potential transformer upgrades, switch upgrades, system control upgrades and the installation of data acquisition measuring equipment and control wire needed to handle higher line currents that will result as a consequence of the new Edic/Marcy to New Scotland; Princetown to Rotterdam and Knickerbocker to Pleasant Valley lines.
>
> Shoemaker to Sugarloaf
> Construction of a new double circuit 138 kV line from Shoemaker to Sugarloaf on exiting Shoemaker to Sugarloaf right-of-way; decommissioning of a double circuit 69 kV line from Shoemaker to Sugarloaf; related switching or substation work at Shoemaker, Hartley, South Goshen, Chester, and Sugarloaf.

In order to address the AC Transmission PPTN, the Commission established criteria that a sufficient project should meet. At a high level, the criteria established by the Commission required any proposed solution to Segment A (Central East) to provide a minimum 350 MW increase to the Central East interface transfer capability, while proposed solutions to Segment B (UPNY/SENY) must provide a minimum 900 MW increase to the UPNY/SENY interface transfer capability. Additionally, the Commission required the proposed solutions to not include additional acquisitions of new permanent rights-of-way or crossings of the Hudson River. The full details of the evaluation criteria were laid out in Appendix B of the December 2015 Order.

NYISO's Solicitation of Projects and Analysis

Based on the Commission's directives, the NYISO solicited potential solutions to address the identified AC Transmission PPTN on February 29 2016. In response to the solicitation, the NYISO received proposals from six developers, which proposed a total of 15 transmission projects and one non-transmission proposal. Based on the evaluation criteria established by the Commission, the NYISO prepared a Viability and Sufficiency Assessment for each of the proposed solutions and, following stakeholder review and comments, issued a report dated October 25, 2016.

The NYISO's Filing, on October 28, 2016, explains that it performed an analysis of the proposed solutions and concluded that four developers submitted 13 transmission projects that were viable and sufficient to solve the AC Transmission PPTN, including: 1) Niagara Mohawk Power Corporation d/b/a National Grid (National Grid)/New York Transco, LLC (NY Transco); 2) NextEra Energy Transmission New York (NextEra); 3) North America Transmission (NAT)/New York Power Authority (NYPA); and, 4) ITC New York Development. Two transmission projects and one non-transmission proposal submitted on behalf of two other developers were found to not be viable and sufficient (i.e., AvanGrid's two Connect New York high voltage direct current transmission projects, as well as GlidePath's Distributed Generation portfolio).[8]

In addition to conducting its Viability and Sufficiency Assessment, the NYISO also completed an analysis, at the request of the Commission, to consider a prescribed cost allocation methodology for the AC Transmission PPTN. Under the

[8] These three project proposals did not meet the criteria established by the Commission.

NYISO OATT, the Commission may identify a particular methodology for allocating the costs of transmission facilities to load serving entities under the OATT when it adopts a Public Policy Requirement. The OATT directs the NYISO to file any such methodology with FERC within 60 days.[9]

In the December 2015 Order, in conjunction with the identification of the AC Transmission PPTN, the Commission prescribed the following cost allocation methodology:

> The cost allocation and recover methodology shall be based on a "beneficiaries pay" approach for allocating costs, whereby those that derive the benefits of a project shall bear the costs. In that regard, 75% of project costs are to be allocated to the economic beneficiaries of the reduced congestion, while the other 25% of the project costs are to be allocated to all customers on a load ratio basis.[10]

The Commission went on to request that the NYISO take additional steps to refine the prescribed cost allocation methodology to ensure equity based on the "beneficiaries pay" principle and to design a more granular allocation which determines the respective shares of upstate and downstate entities.

Based on the Commission's directive, the NYISO proceeded to analyze the proposed cost allocation methodology. In order to assign 75% of the project costs based on the economic beneficiaries of reduced congestion, the NYISO followed, to a large extent, the same methodology it uses to allocate costs under its economic planning process, known as the Congestion Analysis and Resource Integration Study (CARIS). This methodology has been vetted through the NYISO's stakeholders and approved by FERC as just and reasonable for the allocation of costs for projects resulting in lower system

[9] NYISO OATT, Attachment Y, §§31.1.1 and 31.5.5.4.1.

[10] December 2015 Order, Appendix D.

congestion costs. This approach allocates costs to New York Control Area load zones based on the relative reduction in energy payments resulting from the addition of the proposed project to a production cost analysis model.[11] Utilizing the GE-MAPS database adopted by the Brattle Group in its work for the Commission in the AC Transmission proceedings in 2015, the NYISO conducted an illustrative analysis of the difference in zonal energy payments for each NYISO load zone between the base case and project case with both Segments A and B in service. The results of the illustrative analysis determined that, overall, 89.5% of the costs would be allocated to downstate zones (G-K) and 10.5% to upstate zones (A-F). This allocation is intended to reflect the expectation that the primary benefits of the upgrades will be reduced congestion into downstate load areas, while also recognizing that some benefits would accrue to upstate customers in the form of increased reliability and reduced operational costs.[12]

NOTICE OF PROPOSED RULE MAKING

Pursuant to the State Administrative Procedure Act (SAPA) §202(1), the Notice was published in the State Register on November 16, 2016 [SAPA No. 12-T-0502SP6]. The time for submission of comments pursuant to the Notice expired on January 3, 2017. In response to the Notice, various entities filed comments, including: (i) International Brotherhood of Electrical Workers Local 97 (IBEW Local 97); (ii) Consolidated Edison Company of New York, Inc. (Con Edison); (iii) the City of New

[11] The NYISO's recommended approach is based on relative reduction in energy payments without consideration of load served by generation owned by LSEs or bilateral contracts not linked to NYISO's energy prices.

[12] December 2015 Order, Appendix D

York (the City); (iv) National Grid; (v) NY Transco; (vi) Multiple Interveners; (vii) NYISO; (viii) New York Municipal Power Agency (NYMPA); (ix) NAT/NYPA; (x) the Long Island Power Authority (LIPA); and, (xi) NEET NY. These comments are addressed below.[13]

COMMENTS

IBEW Local 97

IBEW Local 97 supports the Commission continuing to find a PPTN for AC Transmission upgrades to address upstate to downstate transmission congestion, and that the NYISO should be directed to continue its evaluation and selection of the more efficient or cost-effective transmission project. IBEW Local 97 goes on to recommend that transmission projects should be selected based on many of the principles specified in the Commission's December 2015 Order identifying the AC Transmission Need, such as utilizing existing rights of way, as well as reducing the lengthy review period, eliminating need for new capacity zones, and providing additional renewable energy to downstate loads in response to the CES.

Con Edison

Con Edison argues that the Commission's proposed cost allocation methodology fails to meet FERC principles that costs of new transmission projects be allocated in a manner that is "at least roughly commensurate" with their benefits. They argue

[13] On January 17, 2017, late-filed comments were submitted on behalf of Columbia Land Conservancy, Farmers and Families for Claverack, Farmers and Families for Livingston, Town of Claverack, Town of Clinton, Town of Livingston, Town of Milan, and Walnut Grove Farm, LLC. These comments, which were filed after the deadline, are not considered herein. Regardless, these comments raise issues that the Commission has already considered.

that the proposed methodology allocates costs predominately based on projected energy market savings and ignores other key benefits of the AC transmission projects, such as capacity savings and reduction in costs of Renewable Energy Certificates and Zero Emission Certificates. Con Edison believes that energy market savings will constitute a relatively small share of the AC Projects' benefits. Con Edison states that adopting the proposed cost allocation methodology assigns the vast majority of the costs to Con Edison's customers when such costs should be more widely allocated, especially to Long Island. Con Edison requests that the Commission reject the proposed cost allocation methodology and adopt a method that more accurately reflects the benefits of the AC projects, including certain unaddressed benefits. Con Edison points to the NYISO's illustrative analysis (NYISO Electric System Planning Working Group presentation on October 13, 2016) and the benefit-cost analysis prepared by Brattle Group for the AC Proceeding in October 2015, to demonstrate such inequity in the benefits to costs allocated to Con Edison.

The City

The City suggests that persistent congestion continues to exist on the UPNY/SENY transmission interface, contributing to higher energy costs and reliability concerns for downstate consumers, as well as accessibility to renewable resources located upstate and neighboring regions. The City suggests that these conditions are no different than when the Commission instituted the proceeding in 2012. The City further notes that the Commission's adoption of the Clean Energy Standard has increased the public policy need for the AC Transmission projects, as most of the State's renewable capacity is located upstate of the UPNY/SENY interface, with significant load located below the interface. The City also cites policies it

has adopted independently of the rest of the state which support a greater reliance on renewable resources for its energy needs. The City indicates it will require transmission expansion and alleviation of the UPNY/SENY constraint in order to access renewable capacity and achieve its policy goals and targets. For all of these reasons, the City submits that the Commission should find that there continues to be a PPTN for the AC Transmission Upgrades. Additionally, the City believes that the cost allocation methodology proposed by the Commission and the NYISO provides a reasonable and fair approach, which acknowledges that most of the benefits of these projects will flow to downstate customers while additional benefits will be seen statewide.

National Grid

National Grid supports a decision that a PPTN continues to exist for AC Transmission upgrades in the Central-East and UPNY/SENY sections of the New York transmission system and that the NYISO should continue with its evaluation of proposed solutions to address the PPTN. They suggest the bases for the Commission's public policy findings in the December 17, 2015 Order continue to exist and there is a continued need for transmission solutions to address them. National Grid further suggests that relieving the congestion on the interfaces will help to achieve the recently adopted Clean Energy Standard targets.

In regards to the cost allocation methodology, National Grid believes the analysis presented by the NYISO is reasonable and achieves a "beneficiaries pay" result and is consistent with the FERC-approved tariff. National Grid also addresses the issue of cost containment, suggesting that, although cost is a critical factor in the evaluation and ranking of projects, the NYISO should not be directed to evaluate and

rank projects based solely on cost or cost containment proposals. National Grid believes developers should have the opportunity and flexibility to structure cost containment proposals based on specific characteristics of their projects.

NY Transco

New York Transco recommends the Commission continue to find a PPTN for AC Transmission upgrades and that the NYISO should proceed with evaluation and selection of the most efficient and cost-effective transmission solution, indicating that the need to increase transmission capability across the Central East and UPNY/SENY interfaces remains. NY Transco suggests that the PPTN is crucially important to meeting the State's energy policy goals, including the CES. NY Transco goes on to note that no non-transmission alternatives were identified in the NYISO's viability and sufficiency assessment which met the criteria set forth by the Commission.

In regards to cost allocation, Transco suggests that the Commission consider all cost allocation comments received when determining if the methodology proposed to FERC will be appropriate and would result in the greatest possible level of support by participants and in the best interest of customers throughout the state. NY Transco also submitted comments on cost containment indicating that, although the NYISO public policy planning process does not require cost containment measures, NY Transco has submitted bids with cost-containment provisions, and if selected, would address its risk sharing proposals which ultimately need to be approved by FERC.

Multiple Interveners

Multiple Intervenors supports the Commission's adoption of the cost allocation methodology and analysis conducted by the NYISO. They believe that the general cost allocation for transmission projects developed under Case 12-T-

0502 using a "beneficiaries pay" approach has already been decided and adopted by the Commission, and suggests that the NYISO's analysis of the allocation methodology of this methodology is all that is currently before the Commission. Multiple Intervenors also maintains that the NYISO's analysis is in all respects reasonable and should be adopted. Multiple Intervenors continues to believe that certain transmission projects proposed in these proceedings could result in higher energy prices in upstate regions of the state, and that it would be inequitable to require upstate customers to fund a material portion of the costs. Multiple Intervenors asserts that a 25% cost allocation based on statewide load-ratio share is more than sufficient to compensate for any experienced non-economic benefits related to the proposed transmission projects.

NYISO

The NYISO submits that there continues to be a transmission need driven by Public Policy Requirements identified in the AC Transmission proceedings, and that the proposed transmission expansion in the Central East and UPNY/SENY corridors of the State would provide a number of benefits to that State's power grid and New York customers. The NYISO has observed constraints over these interfaces which limit the capability and efficient operation of the Bulk Power Transmission Facilities and believes a transmission solution the AC Transmission Need continues to be necessary and will assist New York in achieving its energy policy objectives. NYISO points to its 2016 Power Trends report which discusses the State's aging infrastructure and the need to update the bulk electric system.

NYISO reiterates its previous comments that the implementation of a solution to the AC transmission Need will improve reliability and resiliency, provide greater operational

flexibility, enhance competitive electric markets, and help to achieve important public policy objectives, such as increasing renewable resource capacity and accessibility. The NYISO also points the Brattle Group Report identifying benefits of electric transmission, which highlights that the "transmission grid is the backbone that supports all future policy changes in the electricity sector." The NYISO also believes that completing transmission upgrades for the Western New York Transmission Need and the AC Transmission Need will significantly increase the ability of the bulk electric system to dispatch and deliver renewable energy resources to loads and is a necessary step for the State in achieving the CES.

NYMPA

NYMPA supports the NYISO's cost allocation methodology. Specifically, NYMPA argues a beneficiary pays model where approximately 90% of the costs of the AC Transmission projects are allocated to downstate ratepayers, based on a 75% economic/25% load share methodology is appropriate because it properly follows Commission precedent in other PPTN cases and should continue to be applied in the instant case.

NAT and NYPA

NAT and NYPA filed joint comments, stating that the need for additional transmission capacity across the UPNY/SENY interface remains a valid public policy goal. NYPA and NAT further state that the need is, in some ways even more pronounced than it was in December 2015, specifically, the need to integrate renewable resources. They also state that the benefits put forward by the Commission in December 2015, namely relieving congestion, replacing aging infrastructure and capacity market benefits will still accrue as a result of continuing the PPTN process. Finally, NYPA and NAT state that

there are no non-transmission alternatives capable of meeting this public policy need because an interface transfer capacity increase of 900 MW, as the Commission identified for UPNY/SENY, cannot be accomplished without the introduction of new transmission system elements.

LIPA

LIPA states in its comments that relieving congestion on the UPNY/SENY interface remains an important public policy goal and that the PPTN process should continue as a result. With respect to the NYISO's proposed cost allocation methodology, LIPA states that it supports the use of an economic benefits test for allocation of costs for the AC Transmission PPTN projects. However, they argue, the NYISO's "Approach 2" calculation fails to consider bilateral contract or generator ownership information. LIPA states that the exclusion of this portion of the CARIS methodology overstates the benefits that a zone may receive through lowering of energy prices because it ignores the extent to which the Load Serving Entities within a zone, such as LIPA, have long-term arrangements in place to limit their actual exposure to congestion. As a result, LIPA requests that the Commission "endorse and seek application of the benefits calculations" in the NYISO's "Approach 1."

NEET NY

NEET NY states that there is a continued public policy need for additional transmission capacity across the UPNY/SENY interface. Specifically, NEET NY argues that the recently adopted Clean Energy Standard will increase the need to move wind power from upstate to downstate New York. In addition, NEETNY states that addressing congestion on that interface remains a viable need and will lower energy costs for New York Customers. With respect to cost containment, NEET NY asks that the NYISO give significant consideration to cost containment

measures contained in various bids to ensure that ratepayers are protected.

DISCUSSION

The Commission's responsibility at this stage in the planning process is to make a determination, based on the NYISO's Viability and Sufficiency Assessment, as to whether a solution to the previously-identified AC Transmission PPTN should continue to be analyzed by the NYISO, or whether a non-transmission solution should be pursued instead. In accordance with the NYISO OATT and the Commission's August 2014 Policy Statement, the Commission has reviewed the results of the NYISO's Viability and Sufficiency Assessment, as well as the comments received in response to the SAPA Notice. As discussed below, the Commission confirms that the record supports the NYISO proceeding to a full evaluation of the viable and sufficient transmission solutions. The Commission expects that the NYISO will select, for purposes of cost allocation and recovery under the OATT, the most cost-effective and efficient solution, and to seek FERC's approval of the cost allocation methodology adopted by the Commission as part of the Public Policy Requirement.

The AC Transmission PPTN

There was a consensus among commenters that the circumstances which led the Commission to identify the AC Transmission PPTN continue to exist. The Commission agrees that persistent congestion on the Central East and UPNY/SENY interfaces continues to contribute to higher energy costs for downstate customers and to limit the accessibility of renewable resources located upstate. As discussed by several commenters, the recently adopted Clean Energy Standard (CES), which will require 50% of the state's load to be served by renewable

resources by 2030, further heightens the public policy need for transmission constraint relief and cross-state power flows.[14] The CES will undoubtedly require significant increases in renewable generation capacity with the majority of that additional capacity likely to be located in the northern and western regions of the state. The increased transmission capacity will allow these resources to deliver their energy to downstate load centers and avoid being curtailed.

Based on the NYISO's Viability and Sufficiency Assessment, there were no non-transmission alternatives available to solve the PPTN identified by the Commission. In accordance with the NYISO's assessment, various commenters urge the Commission to direct the NYISO to move forward with evaluation and selection of a transmission solution to meet this Public Policy Requirement. The Commission agrees that new 345 kV electric transmission upgrades should be fully evaluated by the NYISO for purposes of addressing the persistent congestion across the Central East and UPNY/SENY portions of the transmission system. The additional transmission capacity to move power from upstate to downstate New York should provide various economic and public policy benefits. Therefore, the Commission directs the NYISO to proceed to a full evaluation of the proposed transmission solutions deemed viable and sufficient.

Cost Allocation and Recovery Methodology

With regards to a cost allocation methodology, the Commission disagrees with Con Edison's contention that the NYISO's methodology fails to meet the "beneficiaries pay"

[14] Case 15-E-0302, et al., Proceeding on Motion of the Commission to Implement a Large-Scale Renewable Program and a Clean Energy Standard, Order Adopting a Clean Energy Standard (issued August 1, 2016).

principle. Con Edison offers no evidence that the proposed cost allocation method is unfair or inaccurate, nor any case for what the value of "other benefits" relative to market savings might be, or why a 25% statewide allocation for these benefits is not roughly commensurate with benefits.

The Commission has previously addressed and adopted a cost allocation methodology for using a "beneficiaries pay" approach, whereby those that derive the benefits of a project should bear the costs.[15] The Commission has repeatedly found that there are numerous potential benefits of implementing the AC Transmission upgrades, and has supported an allocation whereby 75% of the costs are allocated to the economic beneficiaries of the projects and 25% of the costs are distributed based on a state-wide load ration share. The Commission continues to find that this 25% allocation compensates for the non-economic benefits that would be realized by all ratepayers.

The Commission also rejects LIPA's suggestion that the calculation of energy price savings as part of any cost allocation for the AC Transmission Need must take into account the effect of bilateral contracts and generation ownership. The NYISO analyzed the allocations that would result from the relative reduction in energy payments, both with and without consideration of bilateral contracts and generation ownership information, and determined that the resulting allocation percentages by NYISO Zone were similar. As can be seen in the NYISO's analysis in which it utilized available bilateral and self-generation data gathered in 2010/2011 to strictly follow the CARIS methodology, the allocation percentages for each

[15] Case 12-T-0502, et al., Order Establishing Modified Procedures for Comparative Evaluation (issued December 16, 2014), pp. 40-42.

approach are very similar. The NYISO further suggests that it would be a more complicated, time consuming approach to utilize the alternative methodology which would require updating confidential contract and owner documentation. Using the relative energy savings approach is less time consuming, equally accurate, and more transparent.

All other commenters support the Commission's proposed cost allocation methodology, as reflected in the NYISO's analysis. Further, as Multiple Intervenors indicates, such a cost allocation methodology for the AC Transmission Need was already established in prior orders, and the only subject open for discussion here is the NYISO's analysis of that methodology. The NYISO's CARIS-based methodology very closely aligns with the Commission's expectation stated in the December 2015 Order that following such a "beneficiaries pay" approach would result in approximately 90% of the project costs being allocated to customers in the downstate region, while roughly 10% would be assigned to upstate customers. The Commission therefore adopts the NYISO's analysis of the recommended cost allocation methodology as part of the AC Transmission Public Policy Requirement/PPTN.

Finally, the Commission reiterates that certain incentives are appropriate to ensure accurate cost estimates. As the Commission stated,

> [i]f actual costs come in above a bid, the developer should bear 20% of the cost over-runs, while ratepayers should bear 80% of those costs. If actual costs come in below a bid, then the developer should retain 20% of the savings. Furthermore, if the developer seeks incentives from FERC above the base return-on-equity otherwise approved by FERC, then the developer should not receive any incentives above the base return-on-equity on any cost overruns over the

> bid price. The bid price would therefore cap the costs that may be proposed to FERC for incentives.[16]

The Commission encourages developers to pursue these cost-containment incentives or comparable mechanisms before FERC to ensure that ratepayers retain the economic benefits of the NYISO's competitive transmission process and that the NYISO can select the most cost-effective or efficient solution.

CONCLUSION

The Commission finds that the NYISO should proceed to a full evaluation of the proposed transmission solutions deemed viable and sufficient for purposes of addressing the persistent congestion across the Central East and UPNY/SENY interfaces. Further, the NYISO should select, as appropriate, the more cost-effective or efficient transmission solution to address this AC Transmission PPTN. In addition, the Commission adopts the refined approach identified by the NYISO and discussed herein as the preferred cost allocation methodology associated with the Public Policy Requirement/AC Transmission PPTN.

The Commission orders:

1. The development of new 345 kV electric transmission facilities to cross the Central East and Upstate New York/Southeast New York interfaces, as described in the body of this order, shall be considered a Public Policy Requirement and Public Policy Transmission Need, as defined in the New York Independent System Operator, Inc.'s Open Access Transmission Tariff, and shall continue to be addressed by the NYISO's Public Policy Transmission Planning Process.

[16] December 2015 Order, p. 48.

2. The Commission prescribes the particular cost allocation and recovery methodology recommended in New York Independent System Operator, Inc.'s October 28, 2016 filing, and discussed in the body of this order, as part of the Commission's identification of the Public Policy Transmission Need.

3. These proceedings shall be continued, with the exception of Case 14-E-0454, which shall be closed.

By the Commission,

(SIGNED) KATHLEEN H. BURGESS
Secretary

Document Content(s)