# VIA ELECTRONIC FILING

The Hon. Kimberly D. Bose Secretary Federal Energy Regulatory Commission 888 First Street, NE Washington, DC 20426

# Re: <u>Standards for Business Practices and Communication Protocols for Public</u> <u>Utilities; Docket No. ER15-517-\_\_\_; Compliance Filing</u>

Dear Secretary Bose:

Pursuant to Rule 205 of the Commission's Rules of Practice and Procedure and in compliance with the Order on Compliance Filing and Request for Waivers ("Compliance Order") in Docket Nos. ER15-517-000 and ER15-517-001, dated May 19, 2015, the PTO Administrative Committee on behalf of the Participating Transmission Owners; the SSP Administrative Committee on behalf of the Schedule 20A Service Providers; Cross-Sound Cable Company, LLC; New England Power Company; Eversource Energy Service Company, as agent for The Connecticut Light and Power Company, Western Massachusetts Electric Company and Public Service Company of New Hampshire; Unitil Energy Systems, Inc.; and Fitchburg Gas and Electric Light Company (collectively, the "Filing Parties"),<sup>1</sup> hereby submit this compliance filing.<sup>2</sup>

# I. DESCRIPTION OF FILING PARTIES; COMMUNICATIONS

# A. Filing Parties

As described in more detail in their December 1, 2014, Order No. 676-H<sup>3</sup> compliance filing in this docket, the Filing Parties are transmission providers providing open access transmission service under Section II of the ISO Tariff ("ISO OATT").<sup>4</sup>

<sup>&</sup>lt;sup>1</sup> The Filing Parties note that they possess certain rights under Section 205 of the Federal Power Act to modify certain terms, conditions and rates in the ISO New England Inc. ("ISO") Transmission, Markets and Services Tariff ("ISO Tariff") in accordance with transmission operating agreements, prior Commission Orders, and/or applicable case law.

 $<sup>^2</sup>$  ISO is submitting this filing through the FERC eTariff system on behalf of the Filing Parties as the administrator of all tariff records within the ISO Tariff.

<sup>&</sup>lt;sup>3</sup> Standards for Business Practices and Communication Protocols for Public Utilities, Order No. 676-H, 79 Fed. Reg. 56,939 (Sept. 24, 2014), FERC Stats. & Regs. ¶ 31,359 (2014) (Order No. 676-H), as modified, errata notice, 149 FERC ¶ 61,014 (2014), order on reh'g, 151 FERC ¶ 61,046 (April 16, 2015) (Order No. 676-H Rehearing Order).

<sup>&</sup>lt;sup>4</sup> See FERC Docket Nos. RT04-2, et al.

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## **B.** Communications

All correspondence and communications in this proceeding should be addressed to the undersigned for the Filing Parties as indicated in Attachment 1 hereto.

# II. Compliance Filing

In Order No. 676-H, the Commission laid out three options with respect to compliance therewith: 1) incorporate the complete set of NAESB Standards into their tariffs without modification by submitting a compliance filing containing a single statement acknowledging their obligation to comply with Version 003 Business Practice Standards as specified in Part 38 of the Commission's regulations as updated and revised; 2) incorporate the complete set of Version 003 Business Practice Standards into their tariffs without modification; or 3) file a request for waivers of specific provisions, along with reasons supporting the request.<sup>5</sup>

Accordingly, on December 1, 2014 as amended on April 14, 2015, the Filing Parties submitted a compliance filing to adopt Version 003 WEQ Standards for which they did not seek waiver and to request waiver of certain WEQ Standards. In the Compliance Order, the Commission conditionally accepted the Filing Parties' Order No. 676-H compliance filing, effective May 15, 2015, denied certain requested waivers, dismissed other requested waivers as unnecessary, and directed a compliance filing to be submitted within 60 days of the date of the Compliance Order. In making these findings, the Commission noted that in its Order No. 676-H Rehearing Order, it had clarified that

[r]equiring a public utility to file (and the Commission to process) a waiver request for standards that on their face specifically state [that they] are only applicable to entity groups that the potential waiver requestor does not belong to is an unnecessary expenditure of time and effort for both the potential waiver requestors and the Commission, since the standard itself makes clear to whom it applies.<sup>6</sup>

Thus, the Commission stated that, going forward, any request for waivers of standards that by their terms do not apply to an entity potentially requesting waivers during the time frame the standards are effective would be dismissed as unnecessary.<sup>7</sup>

As a result, the Compliance Order dismissed as unnecessary the Filing Parties' requests for waiver of WEQ-005, WEQ-006 and WEQ-007 since Applicants are neither Reliability Coordinators nor Balancing Authorities. Similarly, the Commission dismissed the requests for waiver as to WEQ-015 and WEQ-021 because those standards are only applicable to regional transmission organizations and independent system operators.

<sup>&</sup>lt;sup>5</sup> See Order No. 676-H, at P 87-89, 95.

<sup>&</sup>lt;sup>6</sup> Compliance Order, at P 6, quoting from Order No. 676-H Rehearing Order, at P20.

<sup>&</sup>lt;sup>7</sup> Compliance Order, at P 6, citing to Order No. 676-H Rehearing Order, at P19.

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The Commission ordered the Filing Parties to refile their respective tariffs to list each standard within 60 days, stating in relevant part:

"No standard should be excluded.[sic] Because we are denying the waiver requests, Filing Parties must submit revised tariff records that do not include references to waiver requests of the Version 003 NAESB standards."<sup>8</sup>

Consistent with the Compliance Order, the Filing Parties hereby submit revised tariff records that do not include reference to waiver requests sought of the Version 003 NAESB standards, and that incorporate the complete set of Version 003 Business Practice Standards into their tariffs without modification.

The tariff sheets submitted in this filing include:

- ISO OATT, Schedule 18
- ISO OATT, Schedule 20A Common
- ISO OATT, Schedule 20A-NU
- ISO OATT, Schedule 21 Common
- ISO OATT, Schedule 21-FGE
- ISO OATT, Schedule 21-UES
- ISO OATT, Schedule 21-NEP<sup>9</sup>
- ISO OATT, Schedule 21-NU<sup>10</sup>

# III. CONCLUSION

For the reasons set forth above, and for good cause shown, the Filing Parties respectfully request that the Commission accept this compliance filing as in accord with the Compliance Order without modification or condition.

<sup>&</sup>lt;sup>8</sup> See Compliance Order at P. 36.

<sup>&</sup>lt;sup>9</sup> The Filing Parties note that the redlined versions of Schedule 21-NEP and Schedule 21-NU included in this filing have been marked against the tariff sheets recently accepted by the Commission in Docket No. ER15-414-001 in a letter order dated July 8, 2015.

<sup>&</sup>lt;sup>10</sup> *Id*.

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Respectfully submitted,

\_/s/ Mary E. Grover\_

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PTO AC Legal Working Group Chair on behalf of the PTO Administrative Committee and Counsel for Eversource Energy Service Company as agent for: The Connecticut Light and Power Company, Western Massachusetts Electric Company and Public Service Company of New Hampshire

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#### **SCHEDULE 18 - MTF; MTF SERVICE**

This Schedule 18 contains the main substantive provisions regarding the treatment of MTF and MTF Service under the OATT.

#### 1. Definitions

Capitalized terms used and defined in this Schedule 18 shall have the meaning given them under this Schedule. Capitalized terms used and not defined in this Schedule 18 but defined in other provisions of the Tariff shall have the meaning given them under those provisions. Capitalized terms used in this Schedule 18 that are not defined in it or elsewhere in the Tariff shall have the meanings customarily attributed to such terms by the electric utility industry in New England.

**1.1 MTF:** The Cross Sound Cable high voltage, direct current Merchant Transmission Facilities of +/- 150 kV and associated dc/ac converter facilities that are directly interconnected with the 345 kV PTF in Connecticut at the East Shore substation, and the 138kV transmission facilities at the Shoreham substation on Long Island, New York that were subject to the Commission order in TransEnergie U.S., Ltd., 91 FERC 61,230 (2000) (Docket No. ER00-1-000).

**1.2 MTF Provider**: The owner of MTF, or its Designated Agent, that offers transmission service over the MTF to Eligible Customers through the MTF Transmission Provider Page on the OASIS.

**1.3** MTF Service: Point-To-Point Transmission Service over MTF.

**1.4 MTF Service Charge:** The charge applicable to MTF Service, which shall be determined pursuant to arrangements between the MTF Provider and Eligible Customers that take MTF Service under this Schedule 18. The charge applicable to MTF Service shall be in accordance with the Commission's authorization for the MTF Provider to charge negotiated rates (i.e., rates established pursuant to market mechanisms as recognized for merchant transmission projects and not included in other OATT rates) for the use of transmission service over its MTF.

**1.5 MTF Transmission Provider Page:** The transmission provider page for the MTF located on the OASIS. Transmission Service over the MTF to Eligible Customers will be offered through the MTF Transmission Provider Page. Some of the information posted on the MTF Transmission Provider Page shall include: values for Available Transfer Capability (ATC); offerings for MTF Service (including

Firm, Non-Firm and secondary transmission rights); the parameters and results of the Commissionmandated open-season process used to initially allocate transmission rights; a description of the Commission-approved rights allocation process; and procedures for the application for and acquisition of MTF Service.

#### 2. Allocation of Available Transfer Capability Over MTF

**2.1 Commission-Approved Allocation Process:** All available transfer capability over MTF shall be allocated to the owner of the MTF who may assign it under a Commission-approved rights allocation process. The MTF Provider shall post the results of the Commission-approved rights allocation process on the MTF Transmission Provider Page. To the extent that transfer capability over MTF is not fully reserved through the Commission-approved rights allocation process, such excess transfer capability shall be available in accordance with this Schedule 18. In the event that the entire capability of the MTF is reserved under the Commission-approved rights allocation process, secondary rights to use the MTF, to the extent unused by the primary rights holders, shall be offered on the MTF Transmission Provider Page on the OASIS by MTF Providers in accordance with a Commission-approved process for offering such rights.

#### 3. MTF Service

#### 3.1 Nature of MTF Service

- (a) Term of MTF Service:
- (i) Firm MTF Service: The minimum term of Firm MTF Service shall be one day and the maximum term shall be that specified in the MTF Transmission Service Agreement.
- (ii) Non-firm MTF Service: Non-Firm MTF Service will be available for periods ranging from one hour to one month and shall be that specified in the MTF Transmission Service Agreement. However, a Transmission Customer who purchases Non-Firm MTF Service will be entitled to reserve a sequential term of service (such as a sequential monthly term without having to wait for the initial term to expire before requesting another monthly term) so that the total time period for which the reservation applies may be greater than one month, subject to the requirements of this Schedule 18.

#### (b) Reservation, Interruption, and Curtailment Priority for MTF Service:

- (i) The MTF Provider shall post on the MTF Transmission Provider Page, rules setting reservation, interruption and Curtailment priorities for Firm and Non-Firm MTF Service. Such rules shall be non-discriminatory and consistent with the Commission's approval of the rights to charge negotiated rates (i.e., rates established pursuant to market mechanisms as recognized for merchant transmission projects and not included in other OATT rates).
- (ii) If an MTF Provider fails to post such rules, then reservation, interruption and Curtailment priorities for Firm and Non-Firm MTF Service shall be the same as those established under the OATT for transmission service over the PTF.
- (iii) MTF reservation priorities shall be established separately from OTF or PTF reservation priorities.
- (iv) Firm MTF Service: The MTF reservation priority for either Long-Term Firm MTF Service or Short-Term Firm MTF Service (which are based upon an award of rights to transmission service over the MTF pursuant to a Commission-approved rights allocation process) shall be determined by the date of the issuance of such award.
- (v) Non-Firm MTF Service: Non-Firm MTF Service shall be available from transfer capability in excess of that needed for reliable service to Long-Term and Short-Term Firm MTF Service. A higher reservation priority will be assigned to Non-Firm MTF Service reservations with a longer duration of service than those reservations with a shorter duration. Competing requests of equal duration for Non-Firm MTF Service will be prioritized based on the highest price offered by the Eligible Customer for the transmission service, or in the event the price for all Eligible Customers is the same, will be prioritized on a first-come, first-served basis (i.e., in the chronological sequence in which each Transmission Customer has reserved service). Eligible Customers that have already reserved shorter-term service over MTF have the right of first refusal to match any longer-term request before being preempted, provided that such Eligible Customer's advance reservation is consistent with any modified request for Non-Firm MTF Service.

- (c) Use of MTF Service By a Transmission Customer: If a Transmission Customer elects to take MTF Service, it may reserve transmission service to facilitate both the delivery of energy and/or capacity to it over the MTF (to the extent permitted under the Transmission, Markets and Services Tariff) commensurate with the associated MTF transmission reservation designated by it in Completed Applications and the delivery of Energy and/or capacity to or from it over the MTF to the extent permitted under the Transmission, Markets and Services Tariff. In order to fulfill its obligations to serve load or to consummate a transaction, a Transmission Customer that takes MTF Service under this Schedule 18 must also take service under Schedule 8 or 9 of this OATT for use of the PTF and under Schedule 21 of this OATT for use of the Non-PTF, as applicable. Any load-serving entity may use MTF Service to effect transactions in bilateral arrangements.
- (d) MTF Transmission Service Agreements: A standard form MTF Transmission Service Agreement (Attachment A) will be offered to an Eligible Customer when it submits a Completed Application for Long-Term Firm, Short-Term Firm or Non-Firm MTF Service pursuant to this Schedule 18. Executed MTF Transmission Service Agreements that contain the information required under this Schedule 18 will be filed with the Commission in compliance with applicable Commission regulations.

#### (e) Classification of MTF Service:

- (i) Transmission Customers requesting MTF Service for the transmission of capacity and energy do so with the full realization that such service is subject to availability and Curtailment pursuant to Section II.44 of this OATT and that the ISO will redispatch all Resources subject to its control, pursuant to the Transmission, Markets and Services Tariff, in order to meet load and to accommodate External Transactions. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with the Transmission, Markets and Services Tariff.
- (ii) Each Point of Receipt at which firm transmission capacity is reserved for Long-Term Firm MTF Service by the Transmission Customer shall be set forth in the MTF Transmission Service Agreement for such Service along with a corresponding capacity reservation over the MTF associated with each Point of Receipt.

- (iii) Points of Receipt and corresponding capacity reservations shall be as mutually agreed upon by the MTF Provider and the Transmission Customer for Short-Term Firm MTF Service. Each Point of Delivery at which firm transmission capacity is reserved for Short-Term Firm MTF Service by the Transmission Customer shall be set forth in the MTF Transmission Service Agreement for such Service along with a corresponding capacity reservation associated with each Point of Delivery. Points of Delivery and corresponding capacity reservations shall be as mutually agreed upon by the MTF Provider and the Transmission Customer for Short-Term Firm MTF Service.
- (iv) Non-Firm MTF Service shall be offered under applicable terms and conditions contained in this Schedule 18. Non-Firm MTF Service shall include transmission of energy on an hourly basis and transmission of scheduled short-term capacity and energy on a daily, weekly or monthly basis, but not to exceed one month's reservation for any one Application.
- (v) The greater of either (1) the sum of the capacity reservations at the Point(s) of Receipt, or
   (2) the sum of the capacity reservations at the Point(s) of Delivery shall be the
   Transmission Customer's Reserved Capacity over the MTF. The Customer's use may not
   exceed its capacity reserved over the MTF at each Point of Receipt and each Point of
   Delivery except as otherwise specified in this Schedule 18.
- (f) Scheduling Associated with MTF Service: Market External Transactions submitted into the Real-time Market and associated with MTF Service shall be dispatched pursuant to the Transmission, Markets and Services Tariff. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such dispatch in accordance with the Transmission, Markets and Services Tariff.
- (g) Curtailment Associated with MTF Service: When the ISO determines that an electrical emergency exists on the New England Transmission System and implements emergency procedures to effect a Curtailment of MTF Service, the Transmission Customer shall make the required reductions upon the ISO's request. The ISO reserves the right to effect a Curtailment, as necessary, in whole or in part, of any MTF Service provided under this Schedule 18 when, in the ISO's sole discretion, an emergency or other unforeseen

condition impairs or degrades the reliability of the New England Transmission System. The ISO will notify all affected Transmission Customers in a timely manner of any Curtailments. The ISO will redispatch all Resources subject to its control, pursuant to this Tariff, in order to meet load and to accommodate External Transactions. To the extent not otherwise provided for in this Section, External Transactions using MTF Service shall be Curtailed or interrupted in accordance with Section II.44 of this OATT. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with the Transmission, Markets and Services Tariff. Pursuant to such redispatch, in the event that the ISO exercises its right to effect a Curtailment, in whole or part, of Firm MTF Service, no credit or other adjustment shall be provided as a result of the Curtailment with respect to the charge payable by the Transmission Customer, unless provided for by the MTF Provider under arrangements between the MTF Provider and the Transmission Customer.

**3.2 Availability of MTF Service**: To the extent that transfer capability over MTF has not been fully allocated in accordance with Section 2 of this Schedule 18, a Transmission Customer that is an Eligible Customer (except as provided below) may reserve Firm or Non-Firm MTF Service. Such service shall be provided and administered by the MTF Provider(s) and shall be reserved pursuant to the applicable terms and conditions of this Schedule 18. MTF Service shall be reserved through the MTF Provider pursuant to this Schedule 18. Service on the MTF requires advance reservations.

MTF Service is available to any Eligible Customer unless an MTF Provider has informed the ISO that MTF Service shall not be made available to such Eligible Customer due to that Customer's failure to make necessary payments for previously assessed MTF Service Charges or failure to meet the creditworthiness or operational requirements posted by the MTF Provider on the MTF Transmission Provider Page on the OASIS.

**3.3 Reservation of MTF Service:** An Eligible Customer requesting Firm or Non-Firm MTF Service shall comply with the applicable provisions of this Schedule 18.

#### 4. Transmission Customer Responsibilities

**4.1 Conditions Required of Transmission Customers:** MTF Service will be provided by the MTF Provider only if the following conditions are satisfied by the Transmission Customer. Conditions (a) thru (e) apply to both Firm or Non-Firm MTF Service while (f) applies to Firm MTF Service only.

- (a) The Transmission Customer has pending a Completed Application for service;
- (b) The Transmission Customer meets the creditworthiness criteria set forth in the information posted by the MTF Provider on the MTF Transmission Provider Page on the OASIS.
- (c) The Transmission Customer and the MTF Provider have executed a MTF Transmission Service Agreement pursuant to this Schedule 18;
- (d) The Transmission Customer agrees to have arrangements in place for any other transmission service necessary to effect the delivery from the generating source to the Point of Receipt prior to the time service under this OATT commences;
- (e) The Transmission Customer agrees to submit External Transactions into the New England Markets in accordance with the applicable ISO System Rules; and
- (f) The Transmission Customer agrees to pay for any facilities or upgrades constructed or any Congestion Costs or other redispatch costs chargeable to such Transmission Customer under this Schedule 18, and the Transmission, Markets and Services Tariff, whether or not the Transmission Customer takes service for the full term of its MTF reservation.

**4.2 Transmission Customer Responsibility for Third-Party Arrangements:** Any arrangements for transmission service and the scheduling of capacity and energy that may be required by neighboring electric systems shall be the responsibility of the Transmission Customer requesting service. The Transmission Customer shall provide, unless waived by the ISO, notification to the ISO identifying such neighboring electric systems and authorizing them to schedule the capacity and energy to be transmitted pursuant to this OATT on behalf of the Receiving Party at the Point of Delivery or the Delivering Party at the Point of Receipt. The Transmission Customer shall arrange for transmission service, as necessary, in accordance with this OATT, including Schedules 8, 9, 20 and 21. The ISO will undertake reasonable

efforts to assist the Transmission Customer in making such arrangements, including without limitation, providing any information or data required by such other electric system pursuant to Good Utility Practice.

## 5. Procedures for Arranging Firm MTF Service

**5.1 Application:** Eligible Customers seeking MTF Service must submit a Completed Application for MTF Service to the MTF Provider. MTF Service Applications should be submitted by entering the information listed below in the MTF Transmission Provider Pages on the OASIS. MTF Service requests should be submitted by transmitting the Completed Application in accordance with the MTF Transmission Provider's rules, as posted on the MTF Transmission Provider Page on the OASIS.

# 5.2 Request for Firm MTF Service

- (a) Timing: A request for Firm MTF Service for periods of one (1) year or longer must be made in an Application, delivered to the MTF Provider at their place of business. The request should be delivered at least sixty (60) days in advance of the calendar month in which service is requested to commence. The MTF Provider will consider requests for such Firm MTF Service on shorter notice when practicable. Requests for Firm MTF Service for periods of less than one (1) year will be subject to expedited procedures that will be negotiated between the MTF Provider and the party requesting service within the time constraints provided in this Schedule 18.
- (b) Completed Application: A Completed Application for Firm Point-To-Point Service shall provide all of the information included at 18 C.F.R. § 2.20 of the Commission's regulations, including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

- (ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under this Schedule 18;
- (iii) The location of the Point(s) of Receipt and Point(s) of Delivery and the identities of the Delivering Parties and the Receiving Parties;

- (iv) An estimate of the capacity and energy expected to be delivered to the Receiving Party;
- (v) The Service Commencement Date and the term of the requested MTF transmission service; and
- (vi) The transmission capacity requested for each Point of Receipt and each Point of Delivery on the PTF, MTF or OTF. Customers may combine their requests for service in order to satisfy the minimum transmission capacity requirement.
- (vii) In addition to the information specified above and when required to properly evaluate the application for service, the MTF Provider also may request that the eligible Customer provider the following:

• The location of the generating facility(ies) supplying the capacity and energy, and the location of the load ultimately served by the capacity and energy transmitted. The MTF Provider will treat this information as confidential in accordance with the MTF Provider's information policy except to the extent that disclosure of such information is required by this Schedule 18, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice; and

• A description of the supply characteristics of the capacity and energy to be delivered.

The MTF Provider will treat this information in (vii) as confidential at the request of the Transmission Customer except to the extent that disclosure of this information is required by the MTF Transmission Service Agreement, MTF Provider's Business Practices, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice. The MTF Provider will treat this information consistent with the standards of conduct contained in 18 C.F.R. Part 37 of the Commission's regulations.

#### 5.3 Request for Non-Firm MTF Service

(a) Timing: When required, requests for monthly service shall be submitted no earlier than sixty (60) days before service is to commence; requests for weekly service shall be submitted no earlier than fourteen (14) days before service is to commence; requests for daily service shall be submitted no earlier than five (5) days before service is to

commence; and requests for hourly service shall be submitted no earlier than 9:00 a.m. the second day before service is to commence. Requests for service received later than noon of the day prior to the day service is scheduled to commence will be accommodated if practicable.

(b) **Completed Application:** A Completed Application for MTF Service shall provide all of the information included in 18 C.F.R. §2.20 including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

- (ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under this Schedule 18;
- (iii) The Point(s) of Receipt and the Point(s) of Delivery;
- (iv) The maximum amount of capacity requested at each Point of Receipt and Point of Delivery; and

(v) The proposed dates and hours for initiating and terminating transmission service hereunder.

- (vi) In addition to the information specified above, when required to properly evaluate the application for service, the MTF Provider also may ask the Transmission Customer to provide the following:
- The electrical location of the initial source of the power to be transmitted pursuant to the Transmission Customer's request for service; and
- The electrical location of the ultimate load.

The MTF Provider will treat this information in (vi.) as confidential at the request of the Transmission Customer except to the extent that disclosure of this information is required by the MTO pursuant to this Schedule 18, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice. The MTF Provider shall treat this information consistent with the standards of conduct contained in Part 37 of the Commission's regulations.

5.4 **Deposit:** If required by the MTF Provider, a Completed Application for MTF Service by a Transmission Customer shall also include a deposit of no more than (a) one (1) month's charge for Reserved Capacity over the MTF for service requests of one (1) month or greater or (b) the full charge for Reserved Capacity over the MTF for service requests of less than one (1) month. If the Application for MTF Service is rejected by the MTF Provider because it does not meet the conditions for service as set forth herein, or in the case of requests for service arising in connection with losing bidders in a request for proposals (RFP), the deposit will be returned with Interest, less any reasonable administrative costs incurred by the MTF Provider, the ISO or any affected Transmission Owners in connection with the review of the Application for MTF Service. The deposit also will be returned with Interest, less any reasonable administrative costs incurred by the MTF Provider, the ISO or any affected Transmission Owners if the new facilities or upgrades needed to provide the service cannot be completed. If an Application for MTF Service is withdrawn or the Eligible Customer decides not to enter into a MTF Transmission Service Agreement, the deposit will be refunded in full, with Interest, less reasonable administrative costs incurred by the MTF Provider, the ISO or any affected Transmission Owners to the extent such costs have not already been recovered from the Eligible Customer. The MTF Provider will provide to the Eligible Customer a complete accounting of all costs deducted from the refunded deposit, which the Eligible Customer may contest if there is a dispute concerning the deducted costs. Deposits associated with construction of new facilities or upgrades are subject to the provisions of this OATT. If a MTF Transmission Service Agreement for MTF Service is executed, the deposit, with Interest, will be returned to the Transmission Customer upon expiration or termination of the MTF Transmission Service Agreement. Applicable Interest will be calculated from the day the deposit is credited to the MTF Provider's account.

**5.5** Notice of Deficient Application: If an Application for MTF Service fails to meet the requirements of this Schedule 18, the MTF Provider will notify the entity requesting service within fifteen (15) days of the MTF Provider's receipt of the Application for MTF Service of the reasons for such failure. The MTF Provider will attempt to remedy minor deficiencies in the Application for MTF Service through informal communications with the Eligible Customer. If such efforts are unsuccessful, the MTF Provider will return the Application for MTF Service, along with any deposit (less the reasonable administrative costs incurred by the MTF Provider, the ISO or any affected Transmission Owners in connection with the Application for MTF Service), with Interest. Upon receipt of a new or revised

Application for MTF Service that fully complies with the requirements of this Schedule 18, the Eligible Customer will be assigned a new reservation priority based upon the date of receipt by the MTF Provider of the new or revised Application for MTF Service.

**5.6 Response to a Completed Application:** Following receipt of a Completed Application the Eligible Customer will be notified as soon as practicable, but not later than thirty (30) days after the date of receipt of a Completed Application for MTF Service. Responses by the MTF Provider must be made as soon as practicable to all Completed Applications for MTF Service and the timing of such responses must be made on a nondiscriminatory basis.

**5.7 Execution of MTF Transmission Service Agreement:** Whenever the MTF Provider determines that a System Impact Study is not required and that the requested service can be provided, it will notify the Eligible Customer as soon as practicable but no later than thirty (30) days after receipt of the Completed Application for MTF Service, and will tender a MTF Transmission Service Agreement to the Eligible Customer. Failure of an Eligible Customer to execute and return the MTF Transmission Service Agreement, within fifteen (15) days after it is tendered by the MTF Provider shall be deemed a withdrawal and termination of the Application for MTF Service and any deposit (less the reasonable administrative costs incurred by the MTF Provider, the ISO and any affected Transmission Owners in connection with the Application for MTF Service) submitted will be refunded with Interest. Nothing herein limits the right of an Eligible Customer to file another Application for MTF Service after such withdrawal and termination. Where a System Impact Study is required, the provisions of this Schedule 18 will govern the execution of a MTF Transmission Service Agreement.

(a) Extensions for Commencement of Firm MTF Service: The Transmission Customer can obtain, subject to availability, up to five one-year extensions for the commencement of service. The Transmission Customer may postpone service by paying a non-refundable annual reservation fee equal to one-month's charge for Firm MTF Service for each year or fraction thereof within 15 days of notifying the MTF Provider that it intends to extend the commencement of service. If during any extension for the commencement of service an Eligible Customer submits a Completed Application for Firm MTF Service, and such request can be satisfied only by releasing all or part of the Transmission Customer's Reserved Capacity over the MTF, the original Reserved Capacity over the MTF will be released unless the following condition is satisfied: within thirty (30) days, the original Transmission Customer agrees to pay the applicable

rate for Firm MTF Service for its Reserved Capacity over the MTF for the period that its reservation overlaps the period covered by such Eligible Customer's Completed Application for MTF Service. In the event the Transmission Customer elects to release the Reserved Capacity over the MTF, the reservation fees or portions thereof previously paid will be forfeited.

**5.8 Confidentiality of Information and Standards of Conduct.** The MTF Provider will treat all information included in the Application as confidential in accordance with the MTF Provider's information policy except to the extent that disclosure of such information is required by this Schedule 18, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice. The MTF Provider will treat this information consistent with the standards of conduct contained in 18 C.F.R. Part 37 of the Commission's regulations.

#### 6. Determination of Available Transfer Capability

Following approval of a tendered application for MTF Service, the MTF Provider will make a determination on a non-discriminatory basis of Available Transfer Capability pursuant to this Schedule 18 and Attachment C to this OATT. Such determination shall be made as soon as reasonably practicable after receipt, but not later than the following time periods for the following terms of service (i) thirty-five (35) minutes for hourly service, (ii) thirty-five (35) minutes for daily service, (iii) four (4) hours for weekly service, and (iv) two (2) days for monthly service.

#### 7. Payment for MTF Service

A Transmission Customer shall pay the MTF Service Charge to the MTF Provider, or its designated agent, if the Customer: (i) receives Firm or Non-Firm MTF Service based upon an allocation of rights to transmission service over the MTF awarded to the Transmission Customer through a Commission-approved rights allocation process; (ii) reserves on the MTF Transmission Provider Page transfer capability over the MTF not initially allocated in the Commission-approved rights allocation process; or (iii) reserves on the MTF Transmission Provider Page transfer capability over the MTF Transmission Provider Page transfer capability over the MTF made available as a result of an assignment by a rights holder of MTF transfer capability, a default release pursuant to rules filed with the Commission and business practices or a capability forfeiture by a rights holder for non-use consistent with the terms of a Commission-approved rights allocation. The Transmission Customer will be billed for its Reserved Capacity over the MTF under the terms of this Schedule 18 for MTF.

#### 8. Changes in Service Specifications of MTF Service

**8.1 Modification on a Firm Basis**: Any request by a Transmission Customer to modify Point(s) of Receipt and Point(s) of Delivery on a firm basis shall be treated as a new request for MTF Service in accordance with this Schedule 18, except that such Transmission Customer shall not be obligated to pay any additional deposit if the capacity reservation over the MTF does not exceed the amount reserved in the existing MTF Transmission Service Agreement. While such new request is pending, the Transmission Customer shall retain its reservation priority for service at the firm Point(s) of Receipt and Point(s) of Delivery specified in the Transmission Customer's MTF Transmission Service Agreement.

**8.2** Modifications on a Non-Firm Basis: The Transmission Customer taking Firm MTF Service may submit a request to the MTF Provider for transmission service on a non-firm basis over Point(s) of Receipt and Point(s) of Delivery other than those specified in the MTF Transmission Service Agreement ("Secondary Receipt and Delivery Points"), in amounts not to exceed the Transmission Customer's firm capacity reservation over the MTF, without incurring an additional Non-Firm MTF Service charge or executing a new MTF Transmission Service Agreement, subject to the following conditions:

- (a) service provided over Secondary Receipt and Delivery Points will be non-firm only, on an as-available basis, and will not displace any firm or non-firm service reserved or scheduled by Transmission Customers under this OATT or by the Transmission Customers on behalf of their Native Load Customers or Excepted Transactions;
- (b) the Transmission Customer shall retain its right to schedule Firm MTF Service at the Point(s) of Receipt and Point(s) of Delivery specified in the relevant MTF Transmission Service Agreement in the amount of the Transmission Customer's original capacity reservation over the MTF; and
- (c) service over Secondary Receipt and Delivery Points on a non-firm basis shall not require the filing of an Application for Non-Firm MTF Service under the OATT. However, all other requirements of this OATT (except as to transmission rates) shall apply to transmission service on a non-firm basis over Secondary Receipt and Delivery Points.

#### 9. Sale, Assignment or Transfer of MTF Service

9.1 Procedures for Sale, Assignment or Transfer of Service: Pursuant to Commission-approved rules posted by the MTF Provider on the MTF Transmission Provider Pages on the OASIS, a Transmission Customer may sell, assign, or transfer all or a portion of its rights under its MTF Transmission Service Agreement, but only to another Eligible Customer (the "Assignee"). The Transmission Customer that sells, assigns or transfers its rights under its MTF Transmission Service Agreement is hereafter referred to as the "Reseller." Compensation to the Reseller shall be at rates established by the Reseller and posted on the MTF Transmission Provider Page. The Assignee must execute a service agreement with the MTF Provider governing reassignments of transmission service prior to the date on which the reassigned service. If the Assignee does not request any change in the Point(s) of Receipt or the Point(s) of Delivery, or a change in any other term or condition set forth in the original MTF Transmission Service Agreement, the Assignee shall receive the same services as did the Reseller and the transmission priority of service for the Assignee shall be the same as that of the Reseller. A Reseller shall notify the MTF Provider as soon as possible after any sale, assignment or transfer of service occurs, but in any event, notification must be provided prior to any provision of service to the Assignee. The Assignee shall be subject to all terms and conditions of this Schedule 18. If the Assignee requests a change in service, the reservation priority of service will be determined by the MTF Provider pursuant to this Schedule 18.

**9.2 Limitations on and Obligations of Assignment or Transfer of Service:** If the Assignee requests a change in the Point(s) of Receipt or Point(s) of Delivery, or a change in any other specifications set forth in the original MTF Transmission Service Agreement, the MTF Provider will consent to such change subject to the provisions of this Schedule 18, provided that the change will not impair the operation and reliability of the Market Participants' generation systems or TO's transmission or distribution systems. The Assignee shall compensate the MTF Provider, the ISO and any affected Transmission Owner for performing any System Impact Study needed to evaluate the capability of the MTF to accommodate the proposed change and any additional costs resulting from such change. The Reseller shall remain liable for the performance of all obligations under the MTF Transmission Service Agreement, except as specifically agreed to by the MTF Provider, the Reseller and the Assignee through an amendment to the MTF Transmission Service Agreement.

**9.3 Information on Assignment or Transfer of Service:** All re-sales or assignments of capacity must be conducted through or otherwise posted on the MTF Transmission Provider Page on or before the date the reassigned service commences and are subject to Section 9.1 of this Schedule 18. In accordance with this

Schedule 18, Transmission Customers may also use the MTF Transmission Provider Page to post information regarding transmission capacity over the MTF available for resale.

## 10. Real Power Losses

Real power losses across MTF shall be allocated solely to Transmission Customers that use MTF. Such allocation for transactions across MTF shall be pursuant to the Transmission, Markets and Services Tariff.

# 11. No Obligation to Build

The MTF Provider status under the OATT shall not impose an obligation to build transmission facilities on the MTF Provider. The offering of MTF Service under this OATT shall not impose an obligation to build transmission facilities on the Market Participants, Transmission Owners or the ISO.

# 12. No Effect on Rates; No Allocation of Revenues

MTF and MTF Service shall not affect rates for service on the PTF under this OATT and MTF Providers shall not be allocated any revenues collected under this OATT for such service.

# 13. Ancillary Services

Ancillary Services costs associated with MTF Service shall be assessed pursuant to this Tariff.

# 14. Congestion Costs and FTRs

Pursuant to the Transmission, Markets and Services Tariff, Congestion Costs will not be calculated, and therefore FTRs will not be offered, between any set of points on the MTF, so long as it remains MTF. Transmission Customers taking MTF Service, however, shall be subject to applicable Congestion Costs for any use of the PTF.

# SCHEDULE 18 - IMPLEMENTATION RULE CROSS-SOUND CABLE COMPANY, LLC PROCEDURES FOR THE REASSIGNMENT OF TRANSMISSION RIGHTS

The procedures for reassignment of CSC transmission rights are consistent with, and supplement, the provisions of the ISO-NE OATT governing the provision of MTF Service. The applicable ISO-NE OATT rules include ISO-NE OATT Schedule 18 and ISO-NE OATT Section II.44 . The following procedures will apply to the release of unused transfer capability to third parties:

#### 1. Definitions

- (a) "CSC" means the Cross Sound Cable.
- (b) "CSC LLC" means Cross-Sound Cable Company, LLC.
- (c) "CSC OASIS" means the CSC node on the ISO-NE OASIS site of the CSC.
- (d) "External Transaction" means a transaction as defined under Market Rule 1.
- (e) **"Firm MTF Service**" means firm service held by the primary rights holder to the transmission rights over the CSC.
- (f) "ISO-NE" means ISO New England, Inc.
- (g) "ISO-NE OATT" means the ISO-NE Open Access Transmission Tariff (Section II of the ISO-NE Transmission, Markets and Services Tariff), on file with the Federal Energy Regulatory Commission, as modified and amended from time to time.
- (h) "MTF Service" means service over the CSC taken under Schedule 18 and other relevant portions of the ISO-NE OATT.
- **"MTF Service Agreement**" refers to the service agreement contained in Attachment A to Schedule 18 in the ISO-NE OATT, as modified and amended from time to time.

- (j) "New England OASIS" means the OASIS site of the New England System Operator.
- (k) "Non-Firm MTF Service" refers to any service over the CSC that is not Firm MTF Service.
- (I) "NYISO" refers to the New York Independent System Operator, Inc.
- (m) "OASIS" means Open Access Same Time Information System.
- (n) "Rights Holder" refers to the entity or entities that have an executed MTF Service Agreement for Firm MTF Service.
- (o) "System Operator" refers to the ISO-NE or any other entity that in the future has operational control over the CSC.

#### 2. Process for Release

The release of unused transfer capability will be facilitated through the posting of available transfer capability on the CSC OASIS site. The posting of such releases and notices of assignment shall be consistent with FERC procedures regarding OASIS postings.

#### 3. Character of Service to be Released

Unless otherwise posted on the CSC OASIS, all releases of transfer capability will be for Non-Firm MTF Service. Such Non-Firm MTF Service may be released on a monthly, weekly, daily or hourly basis. MTF Service is unidirectional (i.e. scheduling from New Haven to Shoreham as an export transaction from New England or Shoreham to New Haven as an import transaction into New England). The characteristics of Firm MTF Service and Non-Firm MTF Service are set forth in Schedule 18 of the ISO-NE OATT.

#### 4. Assignment of Rights Holders' MTF Service Reservation

A Rights Holder may separately assign its advance reservation for MTF Service to third parties provided that notice of such assignment is provided to CSC LLC and ISO-NE with such information then posted on the CSC OASIS. The assignment of such advance reservation may be on either a firm or non-firm basis, be in whole or in part, in segments, on a full or partial term basis, with or without recall rights or any combination thereof.

#### 5. Transmission Customers

Market participants seeking to acquire an advance reservation over the CSC must meet the creditworthiness and financial security standards established by CSC LLC and the relevant Rights Holder and have an executed MTF Service Agreement.

#### 6. Timing of Release

Rights Holder(s) shall notify CSC LLC and ISO-NE of the release of any transfer capability on a Monthly, Weekly, Daily and Hourly basis in accordance with the deadlines set forth below. All releases of transfer capability shall be posted on the CSC OASIS through an automated notification procedure.

**a.** *Monthly Releases:* 

• No later than 7 calendar days

## **b**. Weekly Releases:

• No later than 3 calendar days

## c. Daily Releases:

• No later than Noon on the day before the Operating Day.

- d. Hourly Release:
  - No later than Noon on the day before the Operating Day.

The deadlines set forth above address voluntary releases of a Rights Holders' transfer capability to facilitate full access to transfer capability for third parties. Automatic release of transfer capability due to a Rights Holders' failure to schedule transmission service over the CSC is governed by and set forth below in the "Default Release" provision.

#### 7. Award of Reservations

Releases of advance reservations for CSC transfer capability and bids for such advance reservations shall be submitted to the Transmission Provider via the CSC OASIS. The award of reservations shall be accomplished through either: (1) a public auction process conducted by the Rights Holder, with the released capability awarded to the highest bidder; or (2) the posting of released capability at a specified rate on the CSC OASIS, with the award of such capability performed on a first-come, first served basis for bidders that meet the posted rate for such capability. The rate for assignment either through a public

auction process or through a posting on the CSC OASIS shall be as determined by Section 9 of Schedule 18 of the ISO-NE OATT, and shall be posted on the CSC OASIS.

#### 8. Effect of Advance Reservation

The issuance of an advance reservation is a prerequisite to scheduling an External Transaction in the ISO-NE Real-Time Energy Market that involves the use of the CSC. A party holding an advance reservation for Firm MTF Service or Non-Firm MTF Service and otherwise meeting the qualifications for submitting transactions under the ISO-NE OATT may submit scheduling transactions with ISO-NE that involve the submission of a bid/offer at the Shoreham node.

#### 9. Default Release

In the event that a Rights Holder or any other holder of an advance reservation for MTF Service fails to submit a schedule for its full MTF Service reservation by Noon of the day prior to the Operating Day, the difference between all remaining advance reservations for which accepted bids/offers have been submitted to the New England energy market by advance reservation holders and the Total Transfer Capability over the CSC in the scheduling hour shall be automatically released for scheduling by third parties and posted on the CSC as Available Transfer Capability. Advance reservations for released capability under default release rules will be issued on a first-come, first-served basis through the CSC OASIS.

#### 10. Priority of Capability Released Under the Default Release Provisions

Reservations for CSC transfer capability released due to the default release provisions shall be deemed Non-Firm MTF Service and assigned the NERC transmission service priority "2" (Hourly Non-Firm).

#### 11. Curtailment and Interruptions of Service over MTF

Curtailment and interruptions of service over the CSC required to be initiated by the System Operator pursuant to the ISO-NE system rules or in response to conditions or constraints within the New York Control Area identified by the NYISO as requiring curtailment or interruption of service shall be based upon transmission priority. For Firm MTF Service, curtailment or interruptions within each reservation classification will be performed on a pro rata basis. Curtailment and interruptions within each reservation classification of Non-Firm MTF Service (i.e. Monthly, Weekly, Daily, Hourly) will be based upon the time stamp associated with the submission of valid bids/offers to the ISO-NE Real-Time Market. Curtailments and interruptions of service over the CSC that relate to conditions or constraints on the Pool Transmission Facilities that may otherwise affect service over the CSC will be conducted consistent with the priorities established in the ISO-NE Operating Procedures. The NYISO is responsible for determining the need for any curtailments and interruptions of service relating to conditions or constraints within the New York Control Area consistent with the priorities established by the NYISO's administration of its tariffs and procedures and will communicate the need for such curtailments or interruptions to the System Operator for implementation in compliance with prescribed NERC Policies.

#### 12. Liability

The Transmission Provider and any Rights Holder releasing its advance reservation through the voluntary or default release procedures of these rules shall be held harmless with regard to any claim which may be raised by any party regarding the selection of a bid, except to the extent that such party successfully establishes that the Transmission Provider or the Rights Holder, as the case may be, has incorrectly selected the bidder as the result of gross negligence or willful misconduct.

#### 13. Billing

A party holding advance reservation through releases in accordance with these CSC Releases shall be billed by the Transmission Provider and shall make payments to the Transmission Provider in accordance with the terms of the Service Agreements and the Transmission Provider shall simultaneously credit (on a contingent basis) all reservation charges billed the party releasing such advance reservation. If party acquiring advance reservations through releases fails to pay the reservation charges by the due date, the Transmission Provider shall reverse the credit and bill the party releasing such advance reservation for said reservation charges, plus interest, and the advance reservation shall, at the election of the releasing party, revert to the releasing party for the remaining term of the release.

# SCHEDULE 18 - ATTACHMENTS SCHEDULE 18 - ATTACHMENT A

# Form of Blanket Service Agreement for MTF Service over the Cross Sound Cable Reserved via the Cross Sound Cable Transmission Provider Page on the ISO New England Inc. OASIS Node

- 1.0
   This Service Agreement, dated as of \_\_\_\_\_\_, is entered into, by and between Cross-Sound

   Cable Company, LLC ("CSC LLC") and \_\_\_\_\_\_ ("Transmission Customer").
- 2.0 The Transmission Customer has been determined by CSC LLC to have a Completed Application for [Firm] [Non-Firm] MTF Transmission Service under the ISO New England Inc. ("ISO-NE")

Transmission, Markets and Services Tariff ("Tariff") and the Cross Sound Cable Business Practices.

- **3.0** If required, the Transmission Customer has provided to CSC LLC an Application deposit in accordance with the provisions of the Tariff and the Cross Sound Cable Business Practices.
- **4.0** MTF Service under this Service Agreement shall commence on the later of (1) the requested service commencement date, or (2) the date on which construction or any Direct Assignment Facilities and/or facility additions or upgrades are completed, or (3) such other date as it is permitted to become effective by the Commission. MTF Service under this Service Agreement shall terminate on such date as is mutually agreed upon by the parties. [The Service Agreement may include a blanket agreement for non-firmMTF service.]
- 5.0 CSC LLC agrees to provide, and the Transmission Customer agrees to take and pay for, Transmission Service in accordance with the provisions of Schedule 18 of the Tariff (or its successor tariff), the Cross Sound Cable Business Practices, the Schedule 18 Implementation Rule -Cross-Sound Cable Company, LLC Procedures for the Reassignment of Transmission Rights and this Service Agreement.
- 6.0 Any notice or request made to or by either party regarding this Service Agreement shall be made to the representative of the other party as indicated below, and shall be copied to the System Operator at the address below.

CSC LLC:

Cross-Sound Cable Company, LLC 200 Donald Lynch Blvd. Marlborough, MA 01752

Transmission Customer:

System Operator:

ISO New England Inc. One Sullivan Road Holyoke, MA 01040

7.0 The Tariff, including Schedule 18 and the Schedule 18 Implementation Rule, is incorporated in this Service Agreement and made a part hereof, except that all financial assurance requirements, billing arrangements, payment obligations and liabilities associated with MTF Service shall be solely the responsibility of CSC LLC and the Transmission Customer under this Service Agreement.

IN WITNESS WHEREOF, the Parties have caused this Service Agreement to be executed by their respective authorized officials.

Cross-Sound Cable Company, LLC:

By:		
Name	Title	Date
Transmission Customer:		
By:		
Name	Title	Date

# Specifications For MTF Service over the Cross Sound Cable Reserved via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS Node

A Transmission Customer must acquire an advance reservation for Firm MTF Service or Non-Firm MTF Service. The issuance of an advance reservation is a prerequisite to scheduling an External Transaction over the Cross Sound Cable in the ISO New England Real-Time Energy Market. While not required, an advance reservation for the ISO New England Day Ahead Market is highly recommended, as absent an advance reservation the financial transaction in the Day Ahead Market will not be supported by a corresponding External Transaction in the Real-Time Energy market, thus creating significant financial risks to the transacting party. A party holding an advance reservation and otherwise meeting the qualifications for submitting transactions under the ISO New England, Inc. ("ISO-NE") Transmission, Markets and Services Tariff ("Tariff") may submit scheduling transactions over the Cross Sound Cable with ISO-NE up to the total MW amount of the advance reservation.

1.0	Term of Transaction:	As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node
	Start Date:	As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node
	Termination Date:	As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node

2.0 Description of capacity and energy to be transmitted by Participants including the electric Control Area in which the transaction originates: As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the CSC OASIS node

3.0 Point(s) of Receipt: Either Shoreham Substation in Brookhaven, New York, or East Shore

Substation in New Haven, Connecticut, as specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node

Delivering party: The Transmission Customer

4.0 Point(s) of Delivery: Either Shoreham Substation in Brookhaven, New York, or East Shore
 Substation in New Haven, Connecticut, as specified in the Transmission
 Customer's advance reservation via the Cross Sound Cable Transmission
 Provider Page on the ISO-NE OASIS node

Receiving party: The Transmission Customer

- 5.0 Maximum amount of capacity and energy to be transmitted (Reserved Capacity): As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node
- 6.0 Designation of party(ies) or other entity(ies) subject to reciprocal transmission service obligation: Not applicable
- 7.0 Name(s) of any intervening systems providing transmission service: New York ISO or ISO-NE pursuant to their respective tariffs
- **8.0** MTF Service under this Service Agreement may be subject to some combination of the charges detailed below. (The appropriate charges for individual transactions will be determined in accordance with the terms and conditions of this Tariff.)
- **8.1** MTF Transmission Charge: As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node
- 8.2 System Impact Study and/or Facilities Study Charge(s): Not applicable
- 8.3 Direct assignment expansion charge: Not applicable

# SCHEDULE 18 - ATTACHMENT C Cross-Sound Cable TTC, CBM, TRM and ATC Methodology Version 2.0; Issued: December 22, 2010

#### 1. Introduction

Cross-Sound Cable ("CSC") is an HVDC Transmission Facility located between New Haven, CT and Shoreham, NY (Long Island). The CSC is owned and operated by Cross-Sound Cable Company, LLC ("CSC LLC"). CSC LLC operates as Transmission Service Provider ("TSP") for the CSC, which is a Merchant Transmission Facility ("MTF") within the ISO New England ("ISO-NE") regional transmission organization ("RTO"). ISO-NE serves the New England states through reliable minute to minute operation of the New England Bulk Power System; development, oversight, and fair administration of New England's wholesale market; and management of comprehensive bulk electric power system and wholesale markets' planning processes. ISO-NE serves as the Balancing Authority for the New England Area ("ISO-NE Area"). The ISO-NE Area is interconnected to three neighboring Balancing Authority Areas ("BAAs"): New Brunswick System Operator Balancing Authority Area ("NBSO BAA"), New York Independent System Operator Balancing Authority Area ("NYISO BAA"), and Hydro-Quebec TransEnergie Balancing Authority Area ("HQTE BAA"). As the RTO for New England, ISO-NE performs the reliability functions related to the calculation of Total Transfer Capability ("TTC") for all of the external interfaces between the ISO Area and its neighboring Balancing Authority Areas and for the internal interfaces between the Pool Transmission Facilities ("PTF"), Other Transmission Facilities ("OTF") and MTF such as the CSC. As a TSP offering MTF service pursuant to Schedule 18 of the ISO-NE Tariff, CSC LLC retains the responsibility for determining and posting the Available Transfer Capability ("ATC") of its facilities.

# **1.1.** Scope of Document

This document addresses the following items with respect to the CSC between ISO-NE and NYISO for Schedule 18 MTF Service:

- Total Transfer Capability (TTC) methodology
- Capacity Benefit Margin (CBM) methodology
- Transmission Reliability Margin (TRM) methodology
- Available Transfer Capability (ATC) methodology

#### **1.2.** Overview of Cross-Sound Cable

The Cross-Sound Cable is a 330 MW High Voltage Direct Current Merchant Transmission Facility with associated AC/DC converter stations that are directly interconnected with the 345 kV PTF in New Haven, CT at the East Shore substation, and 138 kV transmission facilities at the Shoreham substation in Long Island, NY. Firm Transmission Service for the entire transfer capability of the CSC was awarded to Long Island Power Authority ("LIPA") through an allocation process approved by the Federal Energy Regulatory Commission ("FERC"). To the extent that the entire capacity of this firm Existing Transmission Commitment ("ETC<sub>F</sub>") is unused by LIPA, secondary rights to use the MTF service is offered on an hourly non-firm basis for the remaining ATC through non-firm Existing Transmission Commitment ("ETC<sub>NF</sub>"). CSC ATC is described in section 5 below.

#### 2. CSC Total Transfer Capability ("TTC")

The Total Transfer Capability or TTC for an interface is the best engineering estimate of the total amount of electric power that can be transferred over the interface in a reliable manner in a given time frame. ISO-NE, acting as the Transmission Operator ("TOP"), determines the TTC for the Cross-Sound Cable based on the equipment ratings and availability provided by CSC LLC and system conditions, then posts the TTC on the ISO-NE OASIS Node. Due to the controllable and bi-directional nature of CSC, it is treated as two separate and independent transmission paths for scheduling purposes. Flow from ISO-NE to NYISO is treated as Export with a maximum TTC of 330 MW delivered, while flow from NYISO to ISO-NE is treated as Import with a maximum TTC of 346 MW received. Cross-Sound Cable is operated in accordance with the requirements of TTC methodology are addressed in Sections 1 and 3 of the ISO-NE NE document "Attachment C Available Transfer Capability Methodology".

#### 3. CSC Capacity Benefit Margin ("CBM")

The use of Capacity Benefit Margin or CBM within the ISO-NE Area is governed by the overall ISO-NE approach to capacity planning requirements. Load Serving Entities ("LSEs") operating within the ISO Area do not utilize CBM to ensure their capacity needs are met; therefore CBM is not applicable within the New England market design. Accordingly, for the purpose of ATC calculation, CBM for the New England Control Area, including CSC, is set to zero (0). For additional information on CBM, refer to Section 4 of the ISO-NE document "Attachment C Available Transfer Capability Methodology".

#### 4. CSC Transmission Reliability Margin ("TRM")

The Transmission Reliability Margin or TRM is the amount of transmission transfer capability set aside to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as the system conditions change.

ISO-NE, acting as a Transmission Operator, calculates the TRM on the CSC MTF interface by taking into account any operational uncertainties with CSC in accordance with MOD-008. Typically the operational uncertainties associated with an external HVDC facility are minimal and result in a TRM value of zero (0), as is the case for CSC.

For additional information on TRM, refer to Section 5.2.1 Calculation of TRM for the MTF and OTF of the ISO-NE document "Attachment C Available Transfer Capability Methodology".

## 5. CSC Available Transfer Capability ("ATC")

This section defines the Available Transfer Capability calculations performed for MTF service over the CSC. The general equation for calculation of ATC is derived from MOD-029 as follows:

ATC = TTC - ETC - CBM - TRM + Postbacks + Counterflows

The CBM and TRM Values have been previously discussed (CBM = 0, TRM = 0). The purpose of the ETC component of the ATC equation is for the TSP to define all elements that are reducing the amount of ATC available to market participants. Details regarding the ETC component, Postbacks and Counterflows of the ATC calculation and its impact on Firm and Non-firm ATC are described below.

#### 5.1. Firm ATC for MTF Transmission Services

Firm Available Transfer Capability ("ATC<sub>F</sub>") is defined as the capability for firm transmission reservations that remains after allowing for CBM, TRM and firm existing transmission commitments. As described in Section 1.2, CSC LLC has a long term contract with LIPA for Yearly Firm Transmission Service for the entire transfer capability of the CSC.

Firm ATC is calculated using the following equation:

 $ATC_F = TTC - ETC_F - CBM - TRM + Postbacks_F + Counterflows_F$ 

Where

ATC<sub>F</sub> is the firm Available Transfer Capability for the ATC path during the period.

TTC is the Total Transfer Capability for the ATC path during the period.

ETC<sub>F</sub> is the sum of firm Existing Transmission Commitments scheduled by LIPA in the Day Ahead Market, under contractual agreement, for the ATC path during the period.

CBM is set to 0 by ISO-NE per section 3 of this document.

TRM is set to 0 by ISO-NE per section 4 of this document.

- Postbacks<sub>F</sub> is set to 0 because any changes to the  $ATC_F$  would be released as secondary market capacity resulting in a change to the  $ETC_{NF}$  value used to determine the resulting  $ATC_{NF}$ .
- $Counterflows_F$  is set to 0 because Export point-to-point flow and Import point-to-point flow are treated as two independent directional paths. Since CSC calculates ATC in both directions independently, there are no Counterflows by definition.

Essentially,  $ATC_F$  is equal to zero (0) as  $ETC_F$  owned by LIPA over both directions of flow is equal to the entire TTC. The  $ATC_F$  will be equal to the TTC until LIPA schedules their actual transfers in the Day Ahead Market. At this point, any portion of the  $ETC_F$  that LIPA does not schedule will get released into the hourly market as  $ATC_{NF}$ .

#### 5.2. Non-Firm ATC for MTF Transmission Services

Non-firm Available Transfer Capability ("ATC<sub>NF</sub>") is defined as the capability for non-firm transmission reservations that remain after allowing for CBM, TRM, ETC<sub>F</sub> and non-firm Existing Transmission Commitments ("ETC<sub>NF</sub>") that have been Confirmed and Accepted. Although the entire TTC of the CSC is contracted to LIPA for Yearly Firm Transmission Service, any portion of the capacity that is not scheduled by LIPA in the Day-Ahead market will be released on an hourly non-firm basis. Customers may then purchase capacity in the Hourly Market, creating an ETC<sub>NF</sub> contract which will in turn reduce the ATC<sub>NF</sub>. Incorporating this into the determination of ATC, non-firm ATC is calculated using the following equation:

$$ATC_{NF} = TTC - ETC_F - ETC_{NF} - CBM_S - TRM_U + Postbacks_{NF} + Counterflows_{NF}$$

#### Where

ATC<sub>NF</sub> is the non-firm Available Transfer Capability for the ATC path during the period. TTC is the Total Transfer Capability for the ATC path during the period. ETC<sub>F</sub> is the sum of firm Existing Transmission Commitments scheduled by LIPA in the Day Ahead Market, under contractual agreement, for the ATC path during the period.

 $ETC_{NF}$  is the sum of non-firm Existing Transmission Commitments purchased by Secondary Market Customers in the Hourly Market, for the ATC path during the period.

CBM is set to 0 by ISO-NE per section 3 of this document.

TRM is set to 0 by ISO-NE per section 4 of this document.

- Postbacks<sub>NF</sub> is set to 0 because any changes to the non-firm ATC would be re-released as secondary market capacity resulting in a change to the  $ETC_{NF}$  value.
- $Counterflows_{NF}$  is set to 0 because Export point-to-point flow and Import point-to-point flow are treated as two independent directional paths. Since CSC calculates ATC in both directions independently, there are no Counterflows by definition.

Additional capacity may be purchased for MTF service on an Hourly non-firm basis until the  $ATC_{NF}$  equals zero (0) for the subject path. Purchases may take place on both paths individually up to their full TTC, which would effectively result in no transfer across CSC. In no case would purchases on one path result in increased ATC on the other path.

## 6. Posting of CSC ATC

#### 6.1. ATC Values

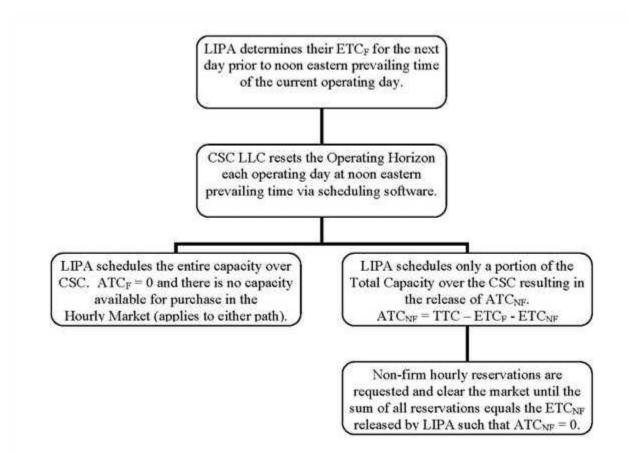
Using the process described in Section 5 above, the ATC calculations are performed for CSC automatically by the scheduling software. The ATC values for CSC are determined using the Mathematical Algorithms for Calculation of ATC

(https://www.oasis.oati.com/CSC/CSCdocs/Algorithms\_for\_ATC\_Calculation\_for\_CSC.pdf) and posted in accordance with NAESB standards on the CSC OASIS (https://www.oasis.oati.com/csc/index.html).

As discussed, firm ATC is equal to zero at all times. LIPA determines the  $ETC_F$  for the next day prior to noon eastern prevailing time of each operating day. CSC LLC then resets the Operating Horizon ("OH") through the scheduling software. The OH spans from noon of the current day through midnight of the next day, or for the next 36 hours calculating  $ATC_{NF}$  based on the  $ETC_F$  selected by LIPA.  $ATC_{NF}$  is calculated from the TTC and  $ETC_F$  and offered as non-firm Hourly MTF in the OH. Subsequent Capacity purchases are considered  $ETC_{NF}$ , which is then subtracted from the  $ATC_{NF}$ . Any changes to the  $ATC_{NF}$ are updated in real time through the scheduling software.

# 6.2. Diagram of Energy Transactions

Below is a diagram that describes how energy transactions are processed over the CSC interface. The timing of the submittal of the energy transactions is governed by the ISO-NE Market Rules.



# SCHEDULE 18 – ATTACHMENT L Creditworthiness Procedures

# I. Overview

The creditworthiness of each Transmission Customer seeking MTF Service must be established before receiving service from the MTF Provider. The MTF Provider shall make this credit review in accordance with procedures based on specific quantitative and qualitative criteria to determine the level of secured and unsecured credit required from the Transmission Customer. A summary of the MTF Provider's Creditworthiness Requirements are described in this Attachment L to Schedule 18. Detailed information regarding the MTF Provider's Creditworthiness Requirements is available in the MTF Provider's Business Practices as posted on the MTF Transmission Provider Page on the OASIS.

## II. Financial Information

Transmission Customers requesting MTF Service will be required to provide credit rating and financial information as part of the Credit Application for MTF Service. Required information may include: (a) all current credit rating reports from commercially accepted credit rating agencies including Standard and Poor's Inc. ("S&P"), Moody's Investors Service ("Moody's"), and Fitch Ratings ("Fitch"); (b) financial statements audited by a registered independent auditor; and (c) references from banks and utilities/vendors.

# III. Creditworthiness Requirements and Process

Transmission Customers, rated and un-rated, will be required to meet the creditworthiness requirements specified in this Attachment L to Schedule 18 and the MTF Business Practices. Credit rating and financial information provided by Transmission Customers that would be used to establish creditworthiness include investment grade ratings for senior unsecured long-term debt and ratio analyses of audited financial statements. If the Customer does not meet the MTF Provider's creditworthiness requirements, the MTF Provider (at its discretion) may establish a credit limit for that Customer equal to the financial assurance (i.e., the security deposit) required from all Transmission Customers, as specified in this Attachment L to Schedule 18 and the MTF Provider's Business Practices.

The MTF Provider shall use the following criteria in reviewing the creditworthiness of Transmission Customers:

- 1. The Transmission Customer must meet and maintain the credit and financial assurance requirements applicable to market participants as established by ISO New England Inc.; and
- 2. The Transmission Customer must not be in default of any amounts owed to any MTF Providers.

If the Transmission Customer does not qualify using the above requirements, the MTF Provider may consider other qualitative factors on a case-by-case basis. The specific factors will depend upon the MTF Provider's Business Practices, and may include billing history and the Transmission Customer's anticipated use of the MTF service.

# A. Procedure for Determining Creditworthiness

The MTF Service Credit Application is posted on the MTF Provider's OASIS and is available for download. The Credit Application may be submitted along with the Application for MTF Transmission Service. Because the amount of time required to complete the credit review varies widely, it is recommended that credit applications be submitted at least ten (10) business days before the Transmission Customer takes service for the first time. As part of the credit review process, the MTF Provider will assign a credit limit to each Transmission Customer. For a customer that holds a below investment grade rating from either S&P, Moody's or Fitch, or is not rated by any of those three rating agencies, the assigned credit limit will be the amount of the security deposit posted by such customer. For a customer that is rated by one or more of S&P, Moody's or Fitch and holds an investment grade rating from each agency that rates that customer, the credit limit will be established using standard commercial practices on a case-by-case basis based on an estimate of the customer's anticipated use of MTF Service.

## IV. Financial Assurance

All Transmission Customers requesting MTF Service are required to submit a security deposit to the MTF Provider. For customers executing a Blanket MTF Transmission Service Agreement, the minimum security deposit shall be \$100,000.00, provided, however, that customers may choose to provide a higher security deposit. For customers executing a transaction-specific MTF Transmission Service Agreement, the security deposit requirement shall be determined on a case-by-case basis, the maximum security deposit that may be charged is equal to the cost of the Reserved Capacity over the MTF for the duration of the specific transaction. Security deposits will be held in separate accounts. Account statements will be provided to the customer on an annual basis upon request.

#### V. Credit Levels

Transmission Customers meeting the above Creditworthiness Requirements will be extended credit based on levels specified in the MTF Provider's Business Practices. Transmission Customers that do not meet the MTF Provider's creditworthiness requirements will not receive unsecured credit from the MTF Provider. The MTF Provider will monitor the credit status of all approved customers and may modify credit limits (higher or lower) for such customer to the extent that company circumstances or service changes occur. In the event that a customer is downgraded such that it holds a below investment grade rating from S&P, Moody's or Fitch, or is not rated by any of the three agencies, the customer's credit limit shall be immediately reduced to the amount of security deposit posted by that customer.

## VI. Contesting Creditworthiness Determination

Should the MTF Provider reject a credit application, the MTF Provider will provide the customer the reasons for the rejection and an opportunity to revise and resubmit the credit application to address the identified deficiencies. Transmission Customers may also contest the MTF Provider's determination of creditworthiness by submitting a written request for re-evaluation. Such request should provide information supporting the basis for a request to re-evaluate a Transmission Customer's creditworthiness. The MTF Provider will review and respond to the request under the procedures outlined in this Attachment L to Schedule 18 and the MTF Provider's Business Practices.

## VII. Procedures for Changes in Credit Levels and Collateral Requirements

The MTF Provider will immediately notify customers of any modifications to credit limits or required security deposits. Upon request, the MTF Provider will provide customers a written explanation for any change in credit limits or required security deposits, including an opportunity to cure any credit deficiencies within a specified time period.

## VIII. Posting Collateral Requirements

In the event that the MTF Providers revises the level of collateral required (e.g., security deposit) as a result of changes to the Transmission Customer's financial information, the MTF Provider's criteria, or other events that result in the Transmission Customer being determined to be non-creditworthy, the Transmission Customer shall have the opportunity to cure such deficiency consistent with the procedures in this Attachment L to Schedule 18 and the MTF Provider's Business Practices, as posted on the MTF Transmission Provider Page on the OASIS.

# IX. Additional Requirements

Along with the above criteria for determining creditworthiness, the MTF Provider may require the Transmission Customer to fulfill additional conditions under the MTF Provider's Business Practices, as posted on the MTF Transmission Provider Page on the OASIS.

# SCHEDULE 18 - ATTACHMENT Z Incorporation By Reference of NAESB Standards

In accordance with Commission Order No. 676-H, the NAESB WEQ Version 003 Standards listed below are hereby incorporated by reference to the extent that the requirements therein apply to Cross Sound Cable:

- WEQ-000, Abbreviations, Acronyms, and Definition of Terms, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Oct. 4, 2012, Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-001, Open Access Same-Time Information Systems (OASIS), Version 2.0 WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013) excluding Standards ,001-9.5, 001-10.5, 001-14.1.3, 001-15.1.2 and 001-106.2.5;
- WEQ-002, Open Access Same-Time Information Systems (OASIS) Business Practice Standards and Communication Protocols (S&CP), OASIS Version 2.0 WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-003, Open Access Same-Time Information Systems (OASIS) Data Dictionary Business Practice Standards, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);

WEQ-004, Coordinate Interchange WEQ Version 003, July 31, 2012 (as modified by NAESB final actions ratified on December 28, 2012) excluding Standards 004-0.1 through 004-18.2, but including 004-A through 004-D;

- WEQ-005, Area Control Error (ACE) Equation Special Cases, WEQ Version 003, July 31, 2012;
- WEQ-006, Manual Time Error Correction, WEQ Version 003, July 31, 2012;
- WEQ-007, Inadvertent Interchange Payback, WEQ Version 003, July 31, 2012;

- WEQ-008, Transmission Loading Relief (TLR) Eastern Interconnection, WEQ Version 003, July 31, 2012 (with minor corrections applied November 28, 2012);
- WEQ-011, Gas/Electic Coordination, WEQ Version 003, July 31, 2012;
- WEQ-012, Public Key Infrastructure (PKI) WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified October 4, 2012);
- WEQ-013, Open Access Same-Time Information Systems (OASIS) Implementation Guide, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-015, Measurement and Verification of Wholesale Electricity Demand Response, WEQ Version 003, July 31, 2012; and
- WEQ-021, Measurement and Verification of Energy Efficiency Products, WEQ Version 003, July 31, 2012.

# SCHEDULE 20A POINT-TO-POINT SERVICE OVER THE PHASE I/II HVDC TRANSMISSION FACILITIES (PHASE I/II HVDC-TF SERVICE)

In order to ensure continuity of service to customers, all agreements for transmission service over the Phase I/II HVDC-TF in effect as of the effective date of this Schedule 20A will remain in full force and effect under this Schedule 20A. This Schedule 20A contains the general terms and conditions regarding the treatment of Phase I/II HVDC-TF Service under the Tariff. In the event of a conflict between the terms and conditions of Part I and Part II of this Schedule, the terms and conditions of Part II shall govern. Phase I/II HVDC-TF Service is a Point-To-Point Service offered by certain Interconnection Rights Holders ("IRH") under this Schedule 20A. Such IRH are referred to herein as the "Schedule 20A Service Providers", have Phase I/II HVDC-TF Service Schedules in Part II of this Schedule 20A, and are listed on the ISO OASIS. Phase I/II HVDC-TF Service shall be offered to Eligible Customers by Schedule 20A Service Providers through their Phase I/II HVDC-TF Transmission Provider Page in accordance with this Schedule 20A and the HVDC Transmission Operating Agreement and is subject to the rights and obligations of the IRHs under the Restated Use Agreement, the Support Agreements, and the Phase I/II HVDC-TF Transmission Service Administration Agreement. Phase I/II HVDC-TF Service under this Schedule 20A is offered by the Schedule 20A Service Providers based on their Use Rights and on any Use Rights that they offer on behalf of any other IRH that are not Schedule 20A Service Providers. Pursuant to Section 2 of Part 1 of this Schedule 20A and subject to mutually agreeable contractual arrangements, the Schedule 20A Service Providers will offer, through this Schedule 20A and their Phase I/II HVDC-TF Transmission Provider Page, the Use Rights of any IRHs that are not Schedule 20A Service Providers. This Schedule 20A also includes the specific rates, terms and conditions for Phase I/II HVDC-TF Service for individual Schedule 20A Service Providers. All Transmission Customers taking Phase I/II HVDC-TF Service shall be subject to and comply with the terms and conditions of this Schedule 20A and the Tariff. The specific terms and conditions for rates and charges of the individual Schedule 20A Service Providers' offering of their Phase I/II HVDC-TF Use Rights are found in the Phase I/II HVDC-TF Service Schedules in Part II of this Schedule 20A.

#### I. PHASE I/II HVDC-TF POINT-TO-POINT SERVICE

#### 1. Definitions

Capitalized terms used and defined in this Schedule 20A shall have the meaning given them under this Schedule. Capitalized terms used and not defined in this Schedule 20A but defined in other sections of the Tariff shall have the meaning given them under those sections. Capitalized terms used in this Schedule 20A that are not defined in it or elsewhere in the Tariff shall have the meanings in the Restated Use Agreement or those customarily attributed to applicable criteria, rules, standards and operating procedures.

**1.1 Interconnection Rights Holders ("IRHs"):** means the entities that pay for and hold exclusive Use Rights to the transfer capability of the Phase I/II HVDC-TF, as granted under the Support Agreements and as further provided for under the Restated Use Agreement, either (i) directly, by virtue of being parties to the Support Agreements, or (ii) indirectly ("Indirect IRH(s)"), through a Transfer Agreement.

1.2 Phase I/II HVDC-TF: means the transmission facilities, identified in Schedule 2.01 (a) of the HVDC Transmission Operating Agreement or its successor schedule, constructed in two phases ("Phase I" and "Phase II") that comprise the United States segment of the 2000 MW transmission interconnection which connects the Hydro-Quebec TransÉnergie control area and the New England Control Area. Phase I is the United States portion of the 450 kV high-voltage, direct-current ("Phase I/II HVDC") transmission line from a terminal at the Des Cantons Substation on the Hydro-Quebec system near Sherbrooke, Quebec to a terminal with a nominal transfer capability of 690 MW at the Monroe Converter Station in New Hampshire. Phase II is the United States portion of the facilities required to increase to 2000 MW the nominal transfer capability of the Phase I/II HVDC-TF, including an extension of the Phase I/II HVDC transmission line from the terminus of Phase I at the Monroe Converter Station through New Hampshire to a terminal at the Sandy Pond Converter Station in Massachusetts. Phase I/II HVDC-TF is a form of OTF, as defined under Section II.1.85 of the Tariff.

1.3 Phase I/II HVDC-TF Owners: are: New England Hydro-Transmission Electric Company, Inc.; New England Hydro-Transmission Corporation; New England Electric Transmission Corporation; and Vermont Electric Transmission Company. The Phase I facilities in the United States are owned by New England Electric Transmission Corporation and Vermont Electric Transmission Company. The Phase II facilities in the United States are owned by New England Hydro-Transmission Electric Company, Inc. and New England Hydro-Transmission Corporation. The Phase I/II HVDC-TF Owners are parties to financial support agreements (the "Support Agreements") with the IRHs.

**1.4 Phase I/II HVDC-TF Service:** means Firm and Non-Firm Point-To-Point Service over the Phase I/II HVDC-TF.

**1.5 Phase I/II HVDC-TF Service Agreement:** means an executed or unexecuted agreement for Phase I/II HVDC-TF Service, as reflected in Attachment A to Part I of this Schedule 20A.

1.6 Phase I/II HVDC-TF Transmission Service Administration Agreement: means the agreement among the ISO, the Schedule 20A Service Providers, and the IRH Management Committee specifying the rights and obligations of the parties regarding transmission service over the Phase I/II HVDC-TF, dated April 1, 2005, as may be amended and restated from time to time, and any successor agreement.

1.7 Phase I/II HVDC-TF Service Charge: is the charge for Phase I/II HVDC-TF Service, which shall be determined pursuant to arrangements between the applicable Schedule 20A Service Provider and Eligible Customers that take Phase I/II HVDC-TF Service under this Schedule 20A. The charge for Phase I/II HVDC-TF Service shall be determined by the applicable Phase I/II HVDC-TF Service Schedule in Part II of this Schedule 20A.

**1.8 Phase I/II HVDC-TF Service Schedule:** is an individual Schedule 20A Service Provider's schedule in Part II of this Schedule 20A that sets forth the terms and conditions for rates and charges, as applicable to Phase I/II HVDC-TF Service offered by that Schedule 20A Service Provider.

**1.9 Phase I/II HVDC-TF Transmission Provider Page:** means the respective Transmission Provider pages of the Schedule 20A Service Providers, which are located on the ISO OASIS, through which Phase I/II HVDC-TF Service is offered. Some of the information posted on the Transmission Provider pages of the Schedule 20A Service Providers shall include: values for Available Transmission Capability (ATC); offerings for Phase I/II HVDC-TF Service; and procedures for the application for and acquisition of Phase I/II HVDC-TF Service.

**1.10 Pre-Confirmed Request:** is an OASIS transmission service request that commits the Transmission Customer to take and pay for the requested Phase I/II HVDC-TF Service upon acceptance on OASIS by the Schedule 20A Service Provider that can provide the requested Phase I/II HVDC-TF Service.

**1.11 Restated Use Agreement:** is the Agreement among the IRH with respect to the Use Rights, dated as of December 1, 1981, as amended or restated as of September 1, 1985, November 19, 1997, April 8, 1998, and June 1, 2002, and as it may be further amended or restated from time to time.

1.12Schedule 20A Service Provider: is an individual IRH that has a Phase I/IIHVDC-TF Service Schedule and offers its own Use Rights or the Use Rights of other IRHs under<br/>this Schedule 20A.

**1.12a Submittal Window:** is the 5 minute window, beginning immediately after the expiration of the "no earlier than" request time, within which all service requests will be deemed to have been submitted simultaneously.

**1.13 Support Agreements:** are the certain agreements between the Phase I/II HVDC-TF Owners and the IRH that are not Indirect IRHs, under which the IRH are granted the exclusive rights to the transfer capability of the Phase I/II HVDC-TF and the obligation to pay the costs of the Phase I/II HVDC-TF.

**1.14 Transfer Agreement:** is an agreement, pursuant to the Restated Use Agreement, under which an IRH may transfer all or part of its Use Rights to another entity for a specified period of time.

**1.15 Transmission Customer:** is, for purposes of this Schedule 20A, an Eligible Customer that is receiving or has received Phase I/II HVDC-TF Service.

**1.16** Use Rights: are the exclusive rights to the Combined Percentage Interest of the transfer capability of the Phase I/II HVDC-TF granted to the each of the IRH under the Support Agreement in exchange for the IRH's obligation to pay for the Phase I/II HVDC-TF. The maximum MW amount of Use Rights that a Schedule 20A Service Provider may make available is its Combined Percentage Interest times the posted TTC value, plus the maximum MW amount of Use Rights of any other IRH on whose behalf the Schedule 20A Service Provider is posting, rounded down to whole MW.

1.17 FERC: The Federal Energy Regulatory Commission.

#### 2. Phase I/II HVDC-TF Service

Phase I/II HVDC-TF Service is a Point-To-Point Service offered by the Schedule 20A Service Providers over Phase I/II HVDC-TF using the transfer capability associated with their own Use Rights and the Use Rights of any other IRH that has contracted with a Schedule 20A Service Provider for the offering of Use Rights under this Schedule 20A. Not all IRHs are FERC-jurisdictional utilities and, as such, these IRHs are not required to offer transmission service for their share of the Phase I/II HVDC-TF. An IRH that is not a Schedule 20A Service Provider may, however, choose to make all or a portion of its rights available through an individual Schedule 20A Service Provider and its Phase I/II HVDC-TF Service Schedule by entering into a Transfer Agreement. Subject to a mutually agreeable Transfer Agreement and associated contractual arrangements, a Schedule 20A Service Provider will offer the Use Rights of any other IRH that wishes to make its Use Rights available under this Schedule 20A. In the event that the parties cannot agree on a Transfer Agreement and associated contractual arrangements, either party may petition the FERC for relief.

## 2.1 Nature of Phase I/II HVDC-TF Service

#### (a) Term of Phase I/II HVDC-TF Service:

(i) Firm Phase I/II HVDC-TF Service: The minimum term of Firm Phase I/II HVDC-TF Service shall be one day and the maximum term shall be that specified in the Phase I/II HVDC-TF Service Agreement.

(ii) Non-Firm Phase I/II HVDC-TF Service: Non-Firm Phase I/II HVDC-TF Service will be available for periods ranging from one hour to one month and shall be that specified in the Phase I/II HVDC-TF Service Agreement. A Transmission Customer that purchases Non-Firm Phase I/II HVDC-TF Service will be entitled to reserve a sequential term of service (such as a sequential monthly term without having to wait for the initial term to expire before requesting another monthly term) so that the total time period for which the reservation applies may be greater than one month, subject to the requirements of this Schedule 20A.

# (b) Reservation, Interruption and Curtailment Priority for Phase I/II HVDC-TF Service:

(i) The Schedule 20A Service Providers, individually or collectively, shall post on the Phase I/II HVDC-TF Transmission Provider Page, rules setting reservation, interruption and Curtailment priorities for Firm and Non-Firm Phase I/II HVDC-TF Service. Such rules shall be non-discriminatory and consistent with Commission Orders and shall also be in accordance with the Restated Use Agreement.

In instances where an IRH is not a Schedule 20A Service Provider and it desires to offer its Use Rights, that IRH shall arrange for the posting of the associated transmission service and associated reservations on a Phase I/II HVDC-TF Transmission Provider Page.

Each Schedule 20A Service Provider shall be responsible for calculating the ATC for its Use Rights and for the Use Rights of any other IRH with whom it has contracted to offer such Use Rights, and for posting such ATC values on its Phase I/II HVDC-TF Transmission Provider Page.

Phase I/II HVDC-TF reservation priorities shall be established separately from PTF, other OTF or MTF reservation priorities.

(ii) If a Schedule 20A Service Provider fails to post such rules, then reservation, interruption and Curtailment priorities for Firm and Non-Firm Phase I/II HVDC-TF Service shall be those established by relevant reliability authorities (e.g., the Northeast Power Coordinating Council) and under such scheduling and curtailment rules as may be accepted and/or approved by the FERC for participation in the regional electricity markets.

(iii) Firm Phase I/II HVDC-TF Service Reservation Priority: The Phase I/II HVDC-TF reservation priority for either Long-Term or Short-Term Firm Phase I/II HVDC-TF Service shall be determined on a first come first served basis by the date and time of the service request, with requests received within the Submittal Window being subject to the procedures described in Section 2.1(b)(vi) below. However, Pre-Confirmed Requests for Short-Term Point-To-Point Transmission Service will receive priority over earlier-submitted requests that are not pre-confirmed and that have equal or shorter duration. Among requests with the same duration and, as relevant, pre-confirmation status (pre-confirmed or not pre-confirmed), priority will be given to a Transmission Customer's request that offers the highest price, followed by the date and time of the request.

(iv) If the Phase I/II HVDC-TF becomes oversubscribed, requests for service may preempt competing reservations up to the following conditional reservation deadlines: one day before the commencement of daily service, one week before the commencement of weekly service, and one month before the commencement of monthly service. Before the conditional reservation deadline, if available transfer capability is insufficient to satisfy all requests and reservations, a Transmission Customer with a reservation for shorter term service or equal duration service and lower price has the right of first refusal to match any longer term request or equal duration service with a higher price before losing its reservation priority. A longer term competing request for Firm Phase I/II HVDC-TF Service will be granted if the Transmission Customer with the right of first refusal does not agree to match the competing request within 24 hours (or earlier if necessary to comply with the scheduling deadlines provided in Section I.2.1(f) of this Schedule 20A) from being notified by the Schedule 20A Service Provider of a longer-term competing request for Firm Phase I/II HVDC-TF Service. When a longer duration request preempts multiple shorter duration reservations, the shorter duration reservations shall have simultaneous opportunities to exercise the right of first refusal. Duration, price and time of response will be used to determine the order by which the multiple shorter duration reservations will be able to exercise the right of first refusal. After the conditional reservation deadline, service will commence pursuant to the terms of this Schedule 20A. Firm Phase I/II HVDC-TF Service will always have a reservation priority over Non-Firm Phase I/II HVDC-TF Service under the Tariff.

(v) Non-Firm Phase I/II HVDC-TF Service Reservation Priority: Non-Firm Phase I/II HVDC-TF Service shall be available from transfer capability in excess of that needed for reliable service to Long-Term and Short-Term Firm Phase I/II HVDC-TF Service. A higher reservation priority will be assigned first to Non-Firm Phase I/II HVDC-TF Service requests or reservations with a longer duration of service than those reservations with a shorter duration and second to Pre-Confirmed Requests. Competing requests of the same pre-confirmation status and equal duration for Non-Firm Phase I/II HVDC-TF Service will be prioritized based on the highest price offered by the Transmission Customer for the transmission service, or in the event the price for all Transmission Customers is the same, will be prioritized on a first-come, first-served basis (i.e., in the chronological sequence in which each Transmission Customer has reserved service). Requests for monthly service received within the Submittal Window shall be subject to the procedures described in Section 2.1(b)(vi) below. Transmission Customers that have already reserved shorter-term service over Phase I/II HVDC-TF have the right of first refusal to match any longer-term request before being preempted, provided that such Transmission Customer's advance reservation is consistent with any modified request for Non-Firm Phase I/II HVDC-TF Service.

(vi) Requests for Firm and monthly Non-Firm Phase I/II HVDC-TF Service are subject to a Submittal Window and to an allocation in accordance with the procedures of this section.

Each Schedule 20A Service Provider will refuse those service requests for the same increment and class of service from the same Transmission Customer which, in aggregate, exceeds that Schedule 20A Service Provider's posted ATC. A single service request will be refused if it exceeds the posted ATC. If multiple identical service requests, as defined by NAESB Standard 001-0.5, for the entire posted ATC are received within the Submittal Window, only the first of those service requests will be considered valid. The remaining identical service requests will be refused.

If sufficient transfer capability is not available to meet all service requests for Phase I/II HVDC-TF Service submitted within the Submittal Window, the Schedule 20A Service Providers will allocate among valid requests received in the Submittal Window, allocating ATC pro-rata, on a whole MW basis, among those requests of the longest duration first and subject to the following order: pre-confirmed Firm, Firm, pre-confirmed Non-Firm and Non-Firm. If the total amount of valid pre-confirmed service requests exceeds a Schedule 20A Service Provider's Firm ATC, each valid pre-confirmed service request for Firm Phase I/II HVDC-TF Service will be multiplied by the ratio of that Schedule 20A Service Provider's Firm or Non-Firm ATC, as applicable, to the total MWs of valid Firm or Non-Firm pre-confirmed service requests, as applicable. If the total amount of valid pre-confirmed Firm service requests does not exceed ATC for Firm Phase I/II HVDC-TF Service, then any remaining non pre-confirmed Firm service requests will be allocated similarly across remaining ATC. Non-Firm service requests for monthly service will follow the same methodology for any remaining ATC.

If a customer withdraws its service request after it has been accepted but prior to the Customer Confirmation Time Limit as identified in FERC Order 638, the pro rata allocation of ATC for the remaining valid service requests will be recalculated and the service requests will be updated accordingly on OASIS. The Schedule 20A Service Providers will address queue flooding, queue hoarding and denial of service in accordance with in NAESB WEQ-001. If the Schedule 20A Service Providers detect any of the above activities, the Schedule 20A Service Providers may extend the Submittal Window by additional 5 minute increments.

Each Schedule 20A Service Provider reserves the right to develop additional allocation criteria in the event that the above criteria do not address a particular situation that occurs during the Submittal Window. Such criteria shall either be included in the Business Practice posted on the Schedule 20A Service Provider's Phase I/II HVDC-TF Transmission Provider Page or the Schedule 20A Service Providers will file with the Commission, changes to this Schedule 20A, in compliance with applicable Commission regulations.

In cases where valid service requests received in the Submittal Window result in residual MW(s), the Schedule 20A Service Providers will allocate, via counter offer, the residual MW(s) to the first valid service request queued in the Submittal Window. In cases where more than one residual MW is available, 1 MW will be allocated, via counter offer, to each valid service request, starting with the first valid service request in the Submittal Window and moving to the next until all such MW(s) have been allocated.

(c) Use of Phase I/II HVDC-TF Service By a Transmission Customer: A Transmission Customer shall take and pay for Phase I/II HVDC-TF Service for the transmission of any scheduled Real-Time Energy Market transaction (including imports of energy into, exports of energy out of, and wheels of energy through, the New England Control Area ) that requires the use of the Phase I/II HVDC-TF. If a Transmission Customer elects to take Phase I/II HVDC-TF Service, it must first reserve transmission capability (i.e., a confirmed advance Phase I/II HVDC-TF Service reservation) to allow both the delivery of energy and/or capacity to it over the Phase I/II HVDC-TF (to the extent permitted under the Tariff) commensurate with the associated Phase I/II HVDC-TF Service and the delivery of Energy and/or capacity to or from it over the Phase I/II HVDC-TF to the extent permitted under the Tariff. A Transmission Customer that takes Phase I/II HVDC-TF Service under this Schedule 20A must also take any other applicable service, in accordance with the Tariff. (d) Phase I/II HVDC-TF Service Agreements: A standard form Phase I/II HVDC-TF Service Agreement (Attachment A to Part I of this Schedule 20A) will be offered to an Eligible Customer when it submits a Completed Application for Phase I/II HVDC-TF Service pursuant to this Schedule 20A. Executed Phase I/II HVDC-TF Service Agreements that contain the information required under this Schedule 20A will be reported and/or filed by the Schedule 20A Service Provider with the Commission in compliance with applicable Commission regulations. An Eligible Customer that uses Phase I/II HVDC-TF Service at a Point of Receipt or Point of Delivery that it has not reserved and that has not executed a Phase I/II HVDC-TF Service Agreement will be deemed, for purposes of assessing any appropriate charges and penalties, to have executed the appropriate Service Agreement.

# (e) Classification of Phase I/II HVDC-TF Service:

(i) Transmission Customers requesting Phase I/II HVDC-TF Service do so with the full realization that such service is subject to availability and Curtailment pursuant to Section II.44 of the Tariff and that the ISO will redispatch all Resources subject to its control, pursuant to the Tariff, in order to meet load and to accommodate External Transactions. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with the Tariff.

(ii) The Point of Receipt and Point of Delivery on the Phase I/II HVDC-TF at which transmission capacity is reserved for Phase I/II HVDC-TF Service by the Transmission Customer shall be set forth in the Phase I/II HVDC-TF Service Agreement for such service along with a corresponding capacity reservation over the Phase I/II HVDC-TF. The Point of Receipt and Point of Delivery for Phase I/II HVDC-TF Service shall be as mutually agreed upon by the Schedule 20A Service Provider and the Transmission Customer for Phase I/II HVDC-TF Service.

(iii) Non-Firm Phase I/II HVDC-TF Service shall be offered on an hourly, daily, weekly or monthly basis, under applicable terms and conditions contained in this Schedule 20A, and shall not exceed one month's reservation. Firm Phase I/II HVDC-TF Service shall be offered on a daily, weekly, monthly or yearly basis under the applicable terms and conditions contained in this Schedule 20A.

(iv) The Transmission Customer's Reserved Capacity over the Phase I/II HVDC-TF shall be the sum of its Phase I/II HVDC-TF Service reservations.

(f) Scheduling Associated with Phase I/II HVDC-TF Service: An advance reservation is required for Phase I/II HVDC-TF Service for any External Transaction that imports energy into, exports energy out of, or wheels energy through, the New England Control Area over the Phase I/II HVDC-TF. The External Transaction, with its supporting advance reservation, shall be submitted by the Transmission Customer for inclusion in the Real-Time Energy Market pursuant to the Tariff and in accordance with applicable ISO New England Operating Procedures. External Transactions submitted into the Real-Time Energy Market and associated with Phase I/II HVDC-TF Service shall be dispatched pursuant to the Tariff. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such dispatch in accordance with the Tariff.

(g) Curtailment Associated with Phase I/II HVDC-TF Service: When the ISO determines that an electrical emergency exists on the New England Transmission System, the ISO shall implement emergency procedures to effect a Curtailment of Phase I/II HVDC-TF Service. The ISO will redispatch all Resources subject to its control, pursuant to the Tariff, in order to meet load and to accommodate External Transactions. External Transactions using Phase I/II HVDC-TF Service shall be curtailed or interrupted in accordance with Section II.44 of the Tariff. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with the Tariff. Pursuant to such redispatch, in the event that ISO exercises its right to effect a Curtailment of Phase I/II HVDC-TF Service, in whole or part, no credit or other adjustment shall be provided as a result of the Curtailment with respect to the charges payable by the Transmission Customer.

**2.2 Transmission Customer Responsibility for Other Service:** Phase I/II HVDC-TF Service only provides transmission service over the Phase I/II HVDC-TF. The Transmission Customer is responsible for obtaining and paying any applicable costs associated with any service on other transmission facilities that may be required to complete a transaction that utilizes Phase I/II HVDC-TF Service.

**2.3** Availability of Phase I/II HVDC-TF Service: An Eligible Customer having a Phase I/II HVDC-TF Service Agreement with a Schedule 20A Service Provider is a Transmission

Customer (except as provided below) that may utilize the Use Rights offered by that Schedule 20A Service Provider for the transmission of any scheduled Real-Time transaction (includes imports of energy into, exports of energy out of, and wheels of energy through, the New England Control Area ) that requires the use of the Phase I/II HVDC-TF. Such service shall be provided and administered by the individual Schedule 20A Service Provider and shall be requested pursuant to the applicable terms and conditions of this Schedule 20A. Phase I/II HVDC-TF Service is available to any Eligible Customer who meets the financial assurance requirements of this Schedule 20A. The provision of Phase I/II HVDC-TF Service under this Schedule 20A requires that the Transmission Customer acquire an advance reservation over the Phase I/II HVDC-TF prior to the scheduling of an associated Real-Time transaction that requires the use of the Phase I/II HVDC-TF.

2.4 **Reservation Priority For Existing Firm Service Customers:** Existing firm service customers (wholesale requirements and transmission-only, with a contract term of five years or more), have the right to elect to continue to take Phase I/II HVDC-TF Service from the Schedule 20A Service Providers when the contract expires, rolls over or is renewed, subject to the rights and obligations of the Schedule 20A Service Providers under the Restated Use Agreement, the Support Agreements, and the Phase I/II HVDC-TF Transmission Service Administration Agreement. This transmission reservation priority is independent of whether the existing customer continues to purchase capacity and energy from the Schedule 20A Service Provider or elects to purchase capacity and energy from another supplier. If at the end of the contract term, the Schedule 20A Service Provider's Use Rights cannot accommodate all of the requests for Phase I/II HVDC-TF Service, the existing firm service customer must agree to accept a contract term at least equal to the longest competing request by any new Transmission Customer and to pay the current just and reasonable rate, as approved by the Commission, for such service; provided that, the firm service customer shall have a right of first refusal at the end of such service only if the new contract is for five years or more. The existing firm service customer must provide notice to the Schedule 20A Service Provider whether it will exercise its right of first refusal no less than one year prior to the expiration date of its Phase I/II HVDC-TF Service Agreement. This transmission reservation priority for existing firm service customers is an ongoing right that may be exercised at the end of all firm contract terms of five years or longer, subject to the rights and obligations of the Schedule 20A Service Providers under the Restated Use Agreement, the Support Agreements, and the Phase I/II HVDC-TF Transmission Service Administration Agreement. Service Agreements subject to a right of first refusal entered into

prior to the date of the Schedule 20A Service Providers' filing adopting the reformed rollover language herein in compliance with Order No. 890 or associated with a transmission service request received prior to July 13, 2007, unless terminated, will become subject to the five year/one year requirement on the first rollover date after the date of the Schedule 20A Service Providers' filing adopting the reformed rollover language herein in compliance with Order No. 890; provided that, the one year notice requirement shall apply to such service agreements with five years or more left in their terms as of the date of the Schedule 20A Service Providers' filing adopting the reformed rollover language herein in compliance with Order No. 890.

#### 3. Transmission Customer Responsibilities

**3.1 Conditions Required of Transmission Customers:** Phase I/II HVDC-TF Service will be provided by the Schedule 20A Service Provider only if the following conditions are satisfied by the Transmission Customer.

(a) The Transmission Customer has submitted a Completed Application for Phase I/IIHVDC-TF Service in accordance with this Schedule 20A;

(b) The Transmission Customer continues to qualify as an Eligible Customer;

(c) The Transmission Customer and the Schedule 20A Service Provider have executed a Phase I/II HVDC-TF Service Agreement pursuant to this Schedule 20A;

(d) The Transmission Customer agrees to have arrangements in place for any other transmission service necessary to effect the delivery from the generating source to the Point of Receipt prior to the time service commences;

(e) The Transmission Customer agrees to submit External Transactions into the New England Markets in accordance with the applicable ISO New England Operating Documents;

(f) The Transmission Customer agrees to pay for Phase I/II HVDC-TF Service Charges, any Congestion Costs or other redispatch costs chargeable to such Transmission Customer under this Schedule 20A, and the Tariff, whether or not the Transmission Customer takes service for the full term of its Phase I/II HVDC-TF Service reservation;

(g) The Transmission Customer has an advance reservation with a Schedule 20A Service Provider for Phase I/II HVDC-TF Service;

(h) The Transmission Customer meets the creditworthiness procedures in Attachment L to the Schedule 20A Service Provider's Phase I/II HVDC-TF Service Schedule in Part II of Schedule 20A; and

(i) The Transmission Customer provides the information required by the ISO's regional system planning process.

# **3.2 Transmission Customer Responsibility for Third-Party Arrangements:** Any

arrangements for Transmission Service and the scheduling of transactions that may be required by neighboring electric systems shall be the responsibility of the Transmission Customer requesting service. The Transmission Customer shall provide, unless waived by ISO, notification to ISO identifying such neighboring electric systems and authorizing them to schedule the transactions to be transmitted pursuant to the Tariff on behalf of the Receiving Party at the Point of Delivery or the Delivering Party at the Point of Receipt.

The Transmission Customer shall arrange for Transmission Service, as necessary, in accordance with the Tariff. The ISO will undertake reasonable efforts to assist the Transmission Customer in making such arrangements, including without limitation, providing any information or data required by such other electric system pursuant to Good Utility Practice.

## 4. Procedures for Arranging Phase I/II HVDC-TF Service

**4.1 Application:** Eligible Customers seeking Phase I/II HVDC-TF Service must submit a Completed Application for Phase I/II HVDC-TF Service to the Schedule 20A Service Provider in accordance with the applicable section of this Schedule 20A and in accordance with the Schedule 20A Service Provider's rules, as posted on the Phase I/II HVDC-TF Transmission Provider Page. The Schedule 20A Service Provider shall post a copy of its form of Application for Phase I/II HVDC-TF Service on its Phase I/II HVDC-TF Transmission Provider Page.

**4.2 Completed Application:** A Completed Application for Phase I/II HVDC-TF Service shall provide all of the information included at 18 C.F.R. § 2.20 of the Commission's regulations, including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

(ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under this Schedule 20A;

(iii) The Point(s) of Receipt and Point(s) of Delivery;

(iv) The maximum amount of capacity and energy expected to be utilized under the Phase I/IIHVDC-TF Service Agreement;

(v) The Service Commencement Date and the term of the requested Phase I/II HVDC-TF Service;

(vi) The transmission capacity requested for each Point of Receipt and each Point of Delivery on the Phase I/II HVDC-TF. Customers may combine their requests for Phase I/II HVDC-TF Service in order to satisfy the minimum transmission capacity requirement;

(vii) A statement indicating that if the Transmission Customer submits a Pre-Confirmed Request, then the Transmission Customer will take and pay for the requested Phase I/II HVDC-TF Service upon acceptance on OASIS by the Schedule 20A Service Provider that can provide the requested Phase I/II HVDC-TF Service; and

(viii) Any additional information required by the ISO's regional system planning process.

(ix) In addition to the information specified above and when required to properly evaluate the application for service, the Schedule 20A Service Provider also may request that the Eligible Customer provide the following:

The location of the generating facility(ies) supplying the capacity and energy, and the location of the load ultimately served by the capacity and energy transmitted.
 A description of the supply characteristics of the capacity and energy to be delivered.

4.3 **Deposit:** If required by the Schedule 20A Service Provider, a Completed Application for Phase I/II HVDC-TF Service by a Transmission Customer shall also include a deposit of either (a) one (1) month's charge for Reserved Capacity over the Phase I/II HVDC-TF for service requests of one (1) month or greater or (b) the full charge for Reserved Capacity over the Phase I/II HVDC-TF for service requests of less than one (1) month. If the Application for Phase I/II HVDC-TF Service is rejected by the Schedule 20A Service Provider because it does not meet the conditions for service as set forth herein, or in the case of requests for service arising in connection with losing bidders in a request for proposals (RFP), the deposit will be returned with interest, less any reasonable costs incurred by the Schedule 20A Service Provider, the ISO or any affected Transmission Owners in connection with the review of the Application for Phase I/II HVDC-TF Service. If an Application for Phase I/II HVDC-TF Service is withdrawn or the Eligible Customer decides not to enter into a Phase I/II HVDC-TF Service Agreement, the deposit will be refunded in full, with interest, less reasonable costs incurred by the Schedule 20A Service Provider, the ISO or any affected Transmission Owners to the extent such costs have not already been recovered from the Eligible Customer. The Schedule 20A Service Provider will provide to the Eligible Customer a complete accounting of all costs deducted from the refunded deposit, which the Eligible Customer may contest if there is a dispute concerning the deducted costs. If a Phase I/II HVDC-TF Service Agreement is executed, the deposit, with interest, will be returned to the Transmission Customer upon expiration or termination of the Phase I/II HVDC-TF Service Agreement. Applicable interest will be calculated in accordance with Commission regulations from the day the deposit is credited to the Schedule 20A Service Provider's account.

**4.4 Notice of Deficient Application:** If an Application for Phase I/II HVDC-TF Service fails to meet the requirements of this Schedule 20A, the Schedule 20A Service Provider will notify the entity requesting service within fifteen (15) days of the Schedule 20A Service Provider's receipt of the Application for Phase I/II HVDC-TF Service of the reasons for such failure. The Schedule 20A Service Provider and the Eligible Customer will attempt to remedy minor deficiencies in the Application for Phase I/II HVDC-TF Service through informal communications. If such efforts are unsuccessful, the Schedule 20A Service Provider will return the Application for Phase I/II HVDC-TF Service, along with any deposit (less the reasonable

costs incurred by the Schedule 20A Service Provider, the ISO or any affected Transmission Owners in connection with the Application for Phase I/II HVDC-TF Service), with interest, to the Eligible Customer. Upon receipt of a new or revised Application for Phase I/II HVDC-TF Service that fully complies with the requirements of this Schedule 20A, the Eligible Customer will be assigned a new reservation priority based upon the date of receipt by the Schedule 20A Service Provider of the new or revised Application for Phase I/II HVDC-TF Service.

**4.5 Response to a Completed Application:** Following receipt of a Completed Application for Phase I/II HVDC-TF Service, the Eligible Customer will be notified as soon as practicable, but not later than thirty (30) days after the date of receipt of a Completed Application for Phase I/II HVDC-TF Service. Responses by the Schedule 20A Service Provider must be made as soon as practicable to all Completed Applications for Phase I/II HVDC-TF Service and the timing of such responses must be made on a nondiscriminatory basis.

**4.6 Execution of Phase I/II HVDC-TF Service Agreement:** Whenever the Schedule 20A Service Provider determines that the requested service can be provided, it will notify the Eligible Customer as soon as practicable but no later than thirty (30) days after receipt of the Completed Application for Phase I/II HVDC-TF Service, and will tender a Phase I/II HVDC-TF Service Agreement to the Eligible Customer. Failure of an Eligible Customer to execute and return the Phase I/II HVDC-TF Service Agreement or request the filing of an unexecuted Phase I/II HVDC-TF Service Agreement, within fifteen (15) days after it is tendered by the Schedule 20A Service Provider, shall be deemed a withdrawal and termination of the Application for Phase I/II HVDC-TF Service Provider, the ISO and any affected Transmission Owners in connection with the Application for Phase I/II HVDC-TF Service) submitted will be refunded with interest. Nothing herein limits the right of an Eligible Customer to file another Completed Application for Phase I/II HVDC-TF Service after such withdrawal and termination.

**4.7 Reservation of Phase I/II HVDC-TF Service:** OASIS requests for yearly or monthly service shall be submitted no earlier than sixty (60) days before service is to commence; requests for weekly, daily and hourly service shall be submitted no earlier than twenty-one (21) days before service is to commence.

#### 4.8 Extensions for Commencement of Firm Phase I/II HVDC-TF Service: The

Transmission Customer can obtain, subject to availability, up to five one-year extensions for the commencement of service. The Transmission Customer may postpone service by paying a non-refundable annual reservation fee equal to one- month's charge for Firm Phase I/II HVDC-TF Service for each year or fraction thereof within 15 days of notifying the Schedule 20A Service Provider it intends to extend the commencement of service. If during any extension for the commencement of service an Eligible Customer submits a Completed Application for Firm Phase I/II HVDC-TF Service, and such request can be satisfied only by releasing all or part of the Transmission Customer's Reserved Capacity over the Phase I/II HVDC-TF, the original Reserved Capacity over the Phase I/II HVDC-TF, the original Reserved Capacity over the Phase I/II HVDC-TF will be released unless the following condition is satisfied: within thirty (30) days, the original Transmission Customer agrees to pay the applicable rate for Firm Phase I/II HVDC-TF Service for its Reserved Capacity over the Phase I/II HVDC-TF for the period that its reservation overlaps the period covered by such Eligible Customer's Completed Application for Phase I/II HVDC-TF Service. In the event the Transmission Customer elects to release the Reserved Capacity over the Phase I/II HVDC-TF, the reservation for Phase I/II HVDC-TF, the reservation for Phase I/II HVDC-TF Service. In the event the Transmission Customer's Completed Application for Phase I/II HVDC-TF Service. In the event the Transmission Customer for Phase I/II HVDC-TF Service for the Phase I/II HVDC-TF, the reservation fees or portions thereof previously paid will be forfeited.

**4.9 Confidentiality of Information and Standards of Conduct.** The Schedule 20A Service Provider will treat all information included in the Completed Application for Phase I/II HVDC-TF Service as confidential in accordance with the standards of conduct contained in 18 C.F.R. Part 37 of the Commission's regulations except to the extent that disclosure of such information is required by this Schedule 20A, the Phase I/II HVDC-TF Service Agreement, Schedule 20A Service Provider's Business Practices, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice.

## 5. Determination of Available Transfer Capability

The Schedule 20A Service Provider will make a determination on a non-discriminatory basis of ATC pursuant to Attachment C to this Schedule 20A and Section II, Attachment C of the Tariff.

## 6. Payment for Phase I/II HVDC-TF Service

**6.1 Phase I/II HVDC-TF Service Charge:** A Transmission Customer shall pay the Schedule 20A Service Provider's Phase I/II HVDC-TF Service Charge to the Schedule 20A Service Provider under the terms of this Schedule 20A.

**6.2 Discounts:** Information regarding any discounts to the Phase I/II HVDC-TF Service Charge shall be offered by the Schedule 20A Service Provider in a not unduly discriminatory manner and posted on its Phase I/II HVDC-TF Transmission Provider Page pursuant to Commission regulations. Three principal requirements apply to discounts for transmission service over the Phase I/II HVDC-TF: (1) any offer of a discount made by a Schedule 20A Service Provider must be announced to all Eligible Customers solely by posting on the OASIS, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on the OASIS, and (3) once a discount is negotiated, details must be immediately posted by the Schedule 20A Service Provider on the OASIS. For any discount agreed upon for service on a path, from Point(s) of Receipt to Point(s) of Delivery, the individual Schedule 20A Service Provider must offer the same discounted Phase I/II HVDC-TF Service rate for the same time period to all of its Eligible Customers.

**6.3 Resales:** The rates and rules governing charges and discounts stated in Sections 6.1 and 6.2 above shall not apply to resales of transmission service, compensation for which shall be governed by Section 8 of this Schedule 20A.

#### 7. Changes in Service Specifications of Phase I/II HVDC-TF Service

7.1 Modification on a Firm Basis: Any request by a Transmission Customer to modify Point(s) of Receipt and Point(s) of Delivery on a firm basis shall be treated as a new request for Phase I/II HVDC-TF Service in accordance with this Schedule 20A, except that such Transmission Customer shall not be obligated to pay any additional deposit if the capacity reservation over the Phase I/II HVDC-TF does not exceed the amount reserved in the existing Phase I/II HVDC-TF Service Agreement. While such new request is pending, the Transmission Customer shall retain its reservation priority for service at the firm Receipt Point(s) and Delivery Point(s) specified in the Transmission Customer's existing Phase I/II HVDC-TF Service Agreement.

**7.2** Modifications on a Non-Firm Basis: The Transmission Customer taking Firm Phase I/II HVDC-TF Service may submit a request to the Schedule 20A Service Provider for transmission service on a non-firm basis over Point(s) of Receipt and Point(s) of Delivery other

than those specified in the Phase I/II HVDC-TF Service Agreement ("Secondary Receipt and Delivery Points"), in amounts not to exceed the Transmission Customer's firm capacity reservation over the Phase I/II HVDC-TF, without incurring an additional Non-Firm Phase I/II HVDC-TF Service charge or executing a new Phase I/II HVDC-TF Service Agreement, subject to the following conditions:

 (a) Phase I/II HVDC-TF Service provided over Secondary Receipt and Delivery Points will be non-firm only, on an as-available basis, and will not displace any firm or non-firm Phase I/II HVDC-TF Service reserved by Transmission Customers under this Schedule;

(b) the Transmission Customer shall retain its right to schedule Firm Phase I/II HVDC-TF Service at the Point(s) of Receipt and Point(s) of Delivery specified in the relevant Phase I/II HVDC-TF Service Agreement in the amount of the Transmission Customer's original Phase I/II HVDC-TF Service reservation over the Phase I/II HVDC-TF; and

(c) Phase I/II HVDC-TF Service over Secondary Receipt and Delivery Points on a non-firm basis shall not require the filing of an Application for Non-Firm Phase I/II HVDC-TF Service under this Schedule. However, all other requirements of this Schedule (except as to Phase I/II HVDC-TF Service charges) shall apply to Phase I/II HVDC-TF Service on a non-firm basis over Secondary Receipt and Delivery Points.

#### 8. Sale, Assignment or Transfer of Phase I/II HVDC-TF Service

**8.1 Procedures for Sale, Assignment or Transfer of Service:** Pursuant to Commissionapproved rules posted by the Schedule 20A Service Provider on its Phase I/II HVDC-TF Transmission Provider Page, and subject to the requirements of the Restated Use Agreement, a Transmission Customer may sell, assign, or transfer all or a portion of its rights under its Phase I/II HVDC-TF Service Agreement, but only to another Eligible Customer (the "Assignee"). The Transmission Customer that sells, assigns or transfers its rights under its Phase I/II HVDC-TF Service Agreement is hereafter referred to as the "Reseller" as the term is used throughout this Schedule 20A. Compensation to Resellers shall be at rates established by agreement between the Reseller and the Assignee. The Assignee must execute a service agreement with the Schedule 20A Service Provider governing reassignments of transmission service prior to the date on which the reassigned service commences. The Schedule 20A Service Provider shall charge the Reseller, as appropriate, at the rate stated in the Reseller's Service Agreement with the Schedule 20A Service Provider or the associated OASIS schedule and credit the Reseller with the price reflected in the Assignee's Service Agreement with the Schedule 20A Service Provider or the associated OASIS schedule and credit the Reseller with the price reflected in the Assignee's Service Agreement with the Schedule 20A Service Provider or the associated OASIS schedule; provided that, such credit shall be reversed in the event of non-payment by the Assignee. If the Assignee does not request any change in the Point(s) of Receipt or the Point(s) of Delivery, or a change in any other term or condition set forth in the original Phase I/II HVDC-TF Service Agreement, the Assignee shall receive the same services as did the Reseller. The Assignee shall be subject to all terms and conditions of this Schedule 20A. If the Assignee requests a change in service, the reservation priority of service will be determined by the Schedule 20A Service Provider pursuant to this Schedule 20A.

**8.2** Limitations on and Obligations of Assignment or Transfer of Service: If the Assignee requests a change in the Point(s) of Receipt or Point(s) of Delivery, or a change in any other specifications set forth in the original Phase I/II HVDC-TF Service Agreement, the Schedule 20A Service Provider will consent to such change subject to the provisions of this Schedule 20A, provided that the change will not impair the operation of the New England Markets or the operation and reliability of the New England Transmission System. The Reseller shall remain liable for the performance of all obligations under the Phase I/II HVDC-TF Service Agreement, except as specifically agreed to by the Schedule 20A Service Provider, the Reseller and the Assignee through an amendment to the Phase I/II HVDC-TF Service Agreement.

**8.3** Information on Resale of Service: In accordance with this Schedule 20A, Transmission Customers may use the Phase I/II HVDC-TF Transmission Provider Page to post information regarding transmission capacity over the Phase I/II HVDC-TF available for resale. All sales or assignments of capacity must be conducted through or otherwise posted on the Schedule 20A Service Provider's OASIS on or before the date the reassigned service commences and are subject to Section 8.1.

#### 9. Real Power Losses

Real power losses across the Phase I/II HVDC-TF shall be allocated solely to Transmission Customers that use Phase I/II HVDC-TF. Such allocation for transactions across the Phase I/II HVDC-TF shall be pursuant to the Tariff and in accordance with the operating protocols adopted by TransÉnergie and the Phase I/II HVDC-TF Owners. The Transmission Customer will be responsible for the losses associated with Phase I/II HVDC-TF Service, in addition to any losses associated with other transmission service under the Tariff.

## 10. No Obligation to Build or Expand the Phase I/II HVDC-TF

A Schedule 20A Service Provider's status under the Tariff shall not impose any obligation on it to build transmission facilities or expand the Phase I/II HVDC-TF. The offering of Phase I/II HVDC-TF Service under the Tariff shall not impose on the Phase I/II HVDC-TF Owners, the IRH or the ISO an obligation to build any transmission facilities to accommodate Phase I/II HVDC-TF Service.

# 11. No Effect on PTF Rates

Inclusion of Phase I/II HVDC-TF Service under the Tariff shall not affect rates for service on the PTF under the Tariff.

# 12. Ancillary Services

Transmission Customers taking service over the Phase I/II HVDC-TF Transmission System are required to acquire Ancillary Services from (a) the Schedule 20A Service Provider pursuant to the provisions within Section II to this Schedule 20A and (b) the Control Area Operator pursuant to the provisions within the Tariff. The specific Ancillary Services, prices and/or compensation methods are described in Section II to this Schedule 20A and in the applicable Schedules of the OATT.

# 13. Congestion Costs and FTRs

Congestion Costs will not be calculated, and therefore FTRs will not be offered, between any set of points on the Phase I/II HVDC-TF. Transmission Customers taking Phase I/II HVDC-TF Service in conjunction with service over the PTF, however, shall be subject to applicable Congestion Costs for any use of the PTF.

## 14. Creditworthiness

Each Schedule 20A Service Provider will specify its Creditworthiness procedures in Attachment L to its Phase I/II HVDC-TF Service Schedule in Part II of Schedule 20A.

## 15. Billing and Payment

**15.1 Billing Procedure:** Within a reasonable time after the first day of each month, the Schedule 20A Service Provider shall submit an invoice to the Transmission Customer for the charges for all Phase I/II HVDC-TF Service furnished under this Schedule 20A during the preceding month. The invoice shall be paid by the Transmission Customer within twenty (20) days of receipt. All payments shall be made in immediately available funds payable to the Schedule 20A Service Provider, or by wire transfer to a bank named by the Schedule 20A Service Provider.

**15.2** Interest on Unpaid Balances: Interest on any unpaid amounts (including amounts placed in escrow) shall be calculated in accordance with the methodology specified for interest on refunds in the Commission's regulations. Interest on delinquent amounts shall be calculated from the due date of the bill to the date of payment. When payments are made by mail, bills shall be considered as having been paid on the date of receipt by the Schedule 20A Service Provider.

15.3 **Customer Default:** In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to the Schedule 20A Service Provider on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after the Schedule 20A Service Provider notifies the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, the Schedule 20A Service Provider may initiate a proceeding with the Commission to terminate Phase I/II HVDC-TF Service but shall not terminate such service until the Commission approves any such request. In the event of a billing dispute between the Schedule 20A Service Provider and the Transmission Customer, the Schedule 20A Service Provider will continue to provide Phase I/II HVDC-TF Service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of Phase I/II HVDC-TF Service, then the Schedule 20A Service Provider may provide notice to the Transmission Customer of its intention to suspend such service in sixty (60) days, in accordance with Commission policy.

#### 16. Standards for Business Practices and Communication Protocols for Public Utilities

The following NAESB WEQ Version 003 Standards are hereby incorporated by reference in this Schedule 20A to the extent they apply to the Schedule 20A Service Providers:

- WEQ-000, Abbreviations, Acronyms, and Definition of Terms, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Oct. 4, 2012, Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-001, Open Access Same-Time Information System (OASIS), OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013) excluding Standards 001-9.5, 001-10.5, 001-14.1.3, 001-15.1.2 and 001-106.2.5;
- WEQ-002, Open Access Same-Time Information System (OASIS) Business Practice Standards and Communication Protocols (S&CP), OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-003, Open Access Same-Time Information System (OASIS) Data Dictionary Business Practice Standards, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013).
- WEQ-004, Coordinate Interchange, WEQ Version 003, July 31, 2012 (as modified by NAESB final actions ratified on December 28, 2012);
- WEQ-005, Area Control Error (ACE) Equation Special Cases, WEQ Version 003, July 31, 2012);
- WEQ-006, Manual Time Error Correction, WEQ Version 003, July 31, 2012;
- WEQ-007, Inadvertent Interchange Payback, WEQ Version 003, July 31, 2012;
- WEQ-008, Transmission Loading Relief (TLR) Eastern Interconnection, WEQ Version 003, July 31, 2012 (with minor corrections applied November 28, 2012);
- WEQ-011, Gas / Electric Coordination, WEQ Version 003, July 31, 2012;
- WEQ-012, Public Key Infrastructure (PKI) WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on October 4, 2012);
- WEQ-013, Open Access Same-Time Information System (OASIS) Implementation Guide, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-015, Measurement and Verification of Wholesale Electricity Demand Response, WEQ Version 003, July 31, 2012; and

• WEQ-021, Measurement and Verification of Energy Efficiency Products, WEQ Version 003, July 31, 2012.

## **SCHEDULE 20A**

# ATTACHMENT A

# PHASE I/II HVDC-TF SERVICE AGREEMENT

This Phase I/II HVDC-TF Service Agreement ("Service Agreement"), dated as of \_\_\_\_\_\_, is entered into, by and between \_\_\_\_\_\_ ("Schedule 20A Service Provider") and \_\_\_\_\_\_ ("Transmission Customer").

#### **PART I – General Terms and Conditions**

1. Service Provided: Phase I/II HVDC-TF Service under Part II, Schedule 20A of the ISO New England Inc., Transmission, Markets and Services Tariff ("Tariff") (Check applicable service):

\_\_Non-Firm (Part I) \_\_Firm (Parts I & II)

2. The Transmission Customer is an Eligible Customer under the Tariff and is a party to either a Market Participant Service Agreement or a Transmission Service Agreement.

3. The Transmission Customer has submitted a Completed Application and the required deposit, if applicable, for Phase I/II HVDC-TF Service under this Service Agreement and the Tariff.

4. The Transmission Customer agrees to supply information associated with its request for Phase I/II HVDC-TF Service to the Schedule 20A Service Provider that the Schedule 20A Service Provider deems reasonably necessary in accordance with Schedule 20A and Good Utility Practice in order for it to receive the requested service.

5. The Schedule 20A Service Provider agrees to provide and the Transmission Customer agrees to take and pay for Phase I/II HVDC-TF Service in accordance with the provisions of the Tariff and this Service Agreement.

6. Service will be subject to some combination of the charges detailed in Part II, Schedule 20A of the Tariff. The appropriate charges will be determined in accordance with the terms and conditions of Schedule 20A.

7. Any notice or request made to or by either party regarding this Service Agreement shall be made to the representative of the other party as indicated below.

Transmission Customer:

Schedule 20A Service Provider:

8. The Tariff is incorporated herein and made a part hereof.

9. Nothing contained in this Service Agreement shall be construed as affecting in any way the right of the Schedule 20A Service Provider to file with the Commission under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of this Service Agreement. Nothing contained in this Service Agreement shall be construed as affecting in any way the ability of the Transmission Customer to file with the Commission under Section 206 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of this Service Agreement.

Phase I/II HVDC-TF Service under this Service Agreement shall commence on the later of: (1)
 \_\_\_\_\_, or (2) such other date as it is permitted to become effective by the Commission.
 Service shall terminate on \_\_\_\_\_\_.

# PART II – Firm Phase I/II HVDC-TF Service

Specifications for Phase I/II HVDC-TF Service.

1.

Term of Transaction:
Description of capacity and energy to be transmitted over the Phase I/II HV including the electric Control Area in which the transaction originates:
Point(s) of Receipt and Capacity Reservation:
Delivering Party:
Point(s) of Delivery and Capacity Reservation:
Receiving Party:
Reserved Capacity:

Additional terms and conditions as may be specified in individual Schedule 20A Service Providers' Service Schedule:

IN WITNESS WHEREOF, the Parties have caused this Phase I/II HVDC-TF Service Agreement to be executed by their respective authorized officials.

Transmission Customer:

Print Name

By:		
Name	Title	Date
Print Name		
Schedule 20A Service Provider:		
By:		
Name	Title	Date

#### **SCHEDULE 20A**

#### **ATTACHMENT A-1**

# Form of PHASE I/II-TF Service Agreement For The Resale, Reassignment or Transfer of Point-To-Point Phase I/II HVDC-TF Service

This Phase I/II HVDC-TF Service Agreement ("Service Agreement"), dated as of \_\_\_\_\_\_
is entered into, by and between \_\_\_\_\_\_ ("Schedule 20A Service Provider") and \_\_\_\_\_\_("Assignee").

2. The Assignee has been determined by the Schedule 20A Service Provider to be an Eligible Customer under the Tariff pursuant to which the transmission service rights to be transferred were originally obtained.

3. The terms and conditions for the transaction entered into under this Service Agreement shall be subject to the terms and conditions of Part I of Schedule 20A and the Schedule 20A Service Provider's Service Schedule of Schedule 20A, except for those terms and conditions negotiated by the Reseller of the reassigned transmission capacity (pursuant to Section I.8.1 of this Tariff) and the Assignee, to include: contract effective and termination dates, the amount of reassigned capacity or energy, point(s) of receipt and delivery. Changes by the Assignee to the Reseller's Points of Receipt and Points of Delivery will be subject to the provisions of Section I.8.2 of this Tariff.

4. The Schedule 20A Service Provider shall credit the Reseller for the price reflected in the Assignee's Service Agreement or the associated OASIS schedule.

5. Any notice or request made to or by either Party regarding this Service Agreement shall be made to the representative of the other Party as indicated below.

Schedule 20A Service Provider:

Assignee:

6. The Tariff is incorporated herein and made a part hereof.

IN WITNESS WHEREOF, the Parties have caused this Service Agreement to be executed by their respective authorized officials.

Schedule 20A Service Provider:

By:		
Name	Title	Date
Print Name		
Assignee:		
By:		
Name	Title	Date

Print Name

# Specifications For The Resale, Reassignment Or Transfer of

# Long-Term Firm Point-To-Point Phase I/II HVDC-TF Service

1. Term of Transaction: \_\_\_\_\_\_

Start Date: \_\_\_\_\_

Termination Date: \_\_\_\_\_

2. Description of capacity and energy to be transmitted by the Schedule 20A Service Provider including the electric Control Area in which the transaction originates.

3. Point(s) of Receipt:\_\_\_\_\_

Delivering Party	

4. Point(s) of Delivery:

Receiving Party:\_\_\_\_\_

5. Maximum amount of reassigned capacity: \_\_\_\_\_

Designation of party(ies) subject to reciprocal service
 obligation:

7. Name(s) of any Intervening Systems providing transmission service:

(Name of Transmission Owner) Open Access Transmission Tariff

8. Service under this Service Agreement may be subject to some combination of the charges detailed below. (The appropriate charges for individual transactions will be determined in accordance with the terms and conditions of the Tariff.)

8.1 Transmission Charge:\_\_\_\_\_

8.2 System Impact and/or Facilities Study Charge(s):

8.3 Direct Assignment Facilities Charge:\_\_\_\_\_

8.4 Ancillary Services Charges: \_\_\_\_\_

9.0 Name of Reseller of the reassigned transmission capacity:

# II. PHASE I/II HVDC-TF SERVICE SCHEDULES

The specific terms and conditions for rates and charges of the individual Schedule 20A Service Providers' offering of their Phase I/II HVDC-TF Use Rights are found in the Phase I/II HVDC-TF Service Schedules in this Part II of Schedule 20A.

### **SCHEDULE 20A**

# ATTACHMENT C

# METHODOLOGY TO ASSESS AVAILABLE TRANSFER CAPABILITY

## 1. INTRODUCTION

This Attachment C to Schedule 20A applies to the calculation of transfer capability of the Phase I/II HVDC-TF by the Schedule 20A Service Providers.

# 1.1 Scope of Document

This Attachment C to Schedule 20A addresses the following items with respect to the Phase I/II HVDC-TF between the Hydro-Quebec Control Area and the New England Control Area for the Schedule 20A Service Providers:

- Total Transfer Capability (TTC) methodology
- Available Transfer Capability (ATC) methodology
- Existing Transmission Commitments (ETC)
- Use of Transmission Reliability Margin (TRM)
- Use of Capacity Benefit Margin (CBM)
- Use of Roll-over Rights (ROR) in the calculation of ETC

# **1.2** Overview of Phase I/II HVDC-TF

The Phase I/II HVDC-TF is a 2,000 MW HVDC tie line in New England that interconnects the New England Control Area with the Hydro-Québec Control Area in the Province of Québec, Canada. This HVDC line has one termination point in New England (with paired operation with complementary facilities in Québec). The specific facilities in New England are the Sandy Pond HVDC Terminal, which interconnects Central Massachusetts and the Nicolet and/or Radisson HVDC terminals of Hydro-Québec. Additional information on the Phase I/II HVDC-TF can be found at ISO New England OASIS web site under the "IRH".

### **1.3** Definitions

Capitalized terms used and defined in this Attachment C to Schedule 20A shall have the meaning given them under this Attachment. Capitalized terms used and not defined in this Schedule 20A but defined in other sections of Schedule 20A or the ISO Tariff shall have the meaning given them under those sections. Capitalized terms used in this Attachment C to Schedule 20A that are not defined in it or elsewhere in Schedule 20A or the ISO Tariff shall have the meanings in the Restated Use Agreement or those customarily attributed to applicable criteria, rules, standards and operating procedures.

**Balancing Authority (BA):** The responsible entity that integrates resource plans ahead of time, maintains load-interchange-generation balance within a Balancing Authority Area, and supports Interconnection frequency in real time.

**Balancing Authority Area:** The collection of generation, transmission, and loads within the metered boundaries of the Balancing Authority. The Balancing Authority maintains load-resource balance within this area.

Export: New England to Hydro-Quebec

Import: Hydro-Quebec to New England

Operating Horizon (OH): For the purposes of this document,

• CVPS resets the OH at 16:00 eastern prevailing time each day. At that time, the OH spans from 16:00 through midnight two days out for a total of 56 hours. As time progresses the total hours remaining in the OH decreases until 16:00 the following day when the OH is once again reset to 56 hours.

• All SSPs (except CVPS) individually reset their OHs at noon eastern prevailing time each day. At that time, the OH spans from noon through midnight of the next day for a total of 36 hours. As time progresses the total hours remaining in the OH decreases until noon the following day when the OH is once again reset to 36 hours.

**Planning Horizon (PH):** For the purpose of this Attachment C to Schedule 20A, PH for any Schedule 20A Service Provider is any period before the OH.

**Scheduling Horizon (SH):** For the purpose of this Attachment C to Schedule 20A, SH is Real-Time and the hour before and utilizes Firm and Non-Firm Phase I/II HVDC-TF Service pursuant to ISO New England Operating Documents.

#### 2. PHASE I/II HVDC-TF TOTAL TRANSFER CAPABILITY (TTC)

The Total Transfer Capability (TTC) is the amount of electric power that can be moved or transferred reliably from one area to another area of the interconnected transmission systems by way of all transmission lines (or paths) between those areas under specified system conditions. TTC for the Phase I/II HVDC-TF is calculated by the ISO as Transmission Operator using the NERC Standard MOD-029-1 Rated System Path Methodology and posted on the ISO New England OASIS site. Therefore, all requirements associated with the documentation of TTC methodology are addressed in Sections 1 and 3 of Section II, Attachment C – Available Transfer Capability Methodology of the ISO Tariff.

### **3.** PHASE I/II HVDC-TF AVAILABLE TRANSFER CAPABILITY (ATC)

#### General

NERC standards: MOD-001-1 – Available Transmission System Capability and MOD-029-1 – Rated System Path Methodology define the required items to be identified when describing a transmission provider's ATC methodology. However, several of those items are not applicable to the Phase I/II HVDC-TF due to the fact that the Phase I/II HVDC-TF is a DC facility and sinks into a region where advance transmission service is not required. Because of this arrangement, loop flow is not an issue; and since associated Regional Transmission Service is not sold in advance of real-time flow within ISO New England, the flow on the Phase I/II HVDC-TF does not typically impact the calculation of any other transfer capability.

Each Schedule 20A Service Provider, based on its Planning and Operating Horizon timing guidelines, will calculate and post as specified in Section 5 of this document Firm and Non-Firm Phase I/II HVDC-TF ATC separately using the NERC Standard MOD-029-1 Rated System Path Methodology.

#### Phase I/II HVDC-TF Capacity Benefit Margin (CBM)

CBM is defined as the amount of firm transmission transfer capability set aside by a TSP for use by the Load Serving Entities. The use of CBM on Phase I/II HVDC-TF is governed by the overall ISO approach

to capacity planning requirements in the ISO New England Operating Documents. Load Serving Entities operating within the New England Control Area are required to arrange their Capacity Requirements prior to the beginning of any given month in accordance with the ISO Tariff. As such, no CBM on Phase I/II HVDC-TF is set aside by any SSP for use by Load Serving Entities in ATC calculations. Therefore CBM is zero and will not be included in the calculations of ATC. As long as this market design is in place in New England, the CBM will continue to be set to zero.

### Existing Transmission Commitments, Firm (ETC<sub>F</sub>)

The ETC<sub>F</sub> are those Phase I/II HVDC-TF confirmed Firm transmission reservation (PTP<sub>F</sub>) plus any rollover rights for Firm transmission reservations (ROR<sub>F</sub>) that have been exercised. There are no allowances necessary for Native Load forecast commitments (NL<sub>F</sub>), Network Integration Transmission Service (NITS<sub>F</sub>), grandfathered Transmission Service (GF<sub>F</sub>) and other service(s), contract(s) or agreement(s) (OS<sub>F</sub>) to be considered in the ETC<sub>F</sub> calculation.

## Existing Transmission Commitments, Non-Firm (ETC<sub>NF</sub>)

The ETC<sub>NF</sub> are those Phase I/II HVDC-TF confirmed Non-Firm transmission reservations (PTP<sub>NF</sub>). There are no allowances necessary for Non-Firm Network Integration Transmission Service (NITS<sub>NF</sub>), Non-Firm grandfathered Transmission Service (GF<sub>NF</sub>) or other service(s), contract(s) or agreement(s) (OS<sub>NF</sub>).

### Transmission Reliability Margin (TRM)

The TRM is the amount of transmission transfer capability necessary to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as system conditions change. TRM is only applicable to Firm Phase I/II HVDC-TF ATC and shall not be applied to Non-Firm Phase I/II HVDC-TF ATC.

The ISO, as Transmission Operator, is responsible for calculating the TRM on the Phase I/II HVDC-TF interface. The Phase I/II HVDC-TF interface poses one of the largest contingency risks in the NYISO, PJM and New England Control Areas. As such, the Import TRM on the Phase I/II HVDC-TF is directly related to these operational limits which can be enforced at any time and the Import TRM is calculated as TTC minus the largest single source contingency. Therefore the SSPs set the Import TRM at 800 MW such that Firm Transmission Service is not sold above this operational limit.

Export TRM is established based on the methodology to account for operational uncertainties on the Hydro-Quebec TransEnergie transmission system. Therefore, the Export TRM is calculated as TTC minus these operational uncertainties.

For additional information on TRM, refer to the ISO Tariff, Attachment C – Available Transfer Capability Methodology, Section 5.2.2 – TRM Calculation for the OTF.

# 4. CALCULATION OF PHASE I/II HVDC-TF ATC

# 4.1 Calculation of Phase I/II HVDC-TF Firm ATC (ATC<sub>F</sub>)

## 4.1.1 Calculation of ATC<sub>F</sub> in the PH

Consistent with the NERC definition, ATC  $_{\rm F}$  is the capability for Firm transmission reservations that remain after allowing for ETC  $_{\rm F}$ , CBM, TRM, Postbacks $_{\rm F}$  and counterflows $_{\rm F}$ .

As discussed above, Phase I/II HVDC-TF CBM is zero. Firm Transmission Service over the Phase I/II HVDC-TF that is available in the Planning Horizon (PH) includes: Yearly, Monthly, Weekly, and Daily. Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Phase I/II HVDC-TF transmission reservations are not considered in the ATC<sub>F</sub> calculation. Therefore, ATC<sub>F</sub> in the PH is equal to the TTC minus ETC<sub>F</sub> and TRM.

# 4.1.2 Calculation of ATC<sub>F</sub> in the OH

Consistent with the NERC definition,  $ATC_F$  is the capability for Firm transmission reservations that remain after allowing for  $ETC_F$ , CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, Phase I/II HVDC-TF CBM is zero. Daily Firm Transmission Service over the Phase I/II HVDC-TF is the only firm service offered in the Operating Horizon (OH). Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Phase I/II HVDC-TF transmission reservations are not considered in the ATC<sub>F</sub> calculation. Therefore, ATC<sub>F</sub> in the OH is equal to the TTC minus  $ETC_F$  and TRM.

# 4.2 Calculation of Non-Firm ATC (ATC<sub>NF</sub>)

### 4.2.1 Calculation of ATC<sub>NF</sub> in the PH

 $ATC_{NF}$  is the capability for Non-Firm transmission reservations that remain after allowing for  $ETC_F$ ,  $ETC_{NF}$ , scheduled CBM (CBM<sub>S</sub>), unreleased TRM (TRM<sub>U</sub>), Non-Firm Postbacks (Postbacks<sub>NF</sub>) and Non-Firm counterflows (counterflows<sub>NF</sub>).

As discussed above, the CBM for Phase I/II HVDC-TF is zero. Non-Firm ATC available in the PH includes: Monthly, Weekly, Daily and Hourly. TRM  $_{\rm U}$ , Postbacks<sub>NF</sub> and counterflows<sub>NF</sub> of Phase I/II HVDC-TF transmission reservations are not considered in this calculation. Therefore, ATC<sub>NF</sub> in the PH is equal to the TTC minus ETC<sub>F</sub> and ETC<sub>NF</sub>.

# 4.2.2 Calculation of $ATC_{NF}$ in the OH

ATC NF available in the OH includes: Daily and Hourly.

 $TRM_U$  and counterflows<sub>NF</sub> are not considered in this calculation and CBM is zero. Therefore,  $ATC_{NF}$  in the OH is equal to the TTC minus  $ETC_{F}$ , and  $ETC_{NF}$  plus Postbacks<sub>NF</sub>.

## 4.3 Negative ATC

Due to the calculation methodologies defined above, typically there should not be negative ATC values posted.

# 5. POSTING OF PHASE I/II HVDC-TF ATC

### 5.1 Location of ATC Posting

ATC values are posted separately on the Phase I/II HVDC-TF Transmission Provider's Page for the Schedule 20A Service Providers. In addition, a summary of the level of service available from the Schedule 20A Service Providers is available on the ISO New England OASIS site under the "IRH".

# 5.2 Updates To ATC

When any of the variables in the ATC equations change, the ATC values are recalculated and immediately posted.

### 5.3 Coordination of ATC Calculations

The Phase I/II HVDC-TF is a controllable DC inter-Control Area tie line. Therefore it is not necessary to coordinate the Phase I/II HVDC-TF ATC values with the Hydro-Québec Control Area.

## 5.4 Load Forecast

The Phase I/II HVDC-TF is a controllable DC inter-Control Area tie line. Therefore, the ISO load forecast has no impact on the Phase I/II HVDC-TF ATC. The ISO is responsible for calculating the load forecast for the region and posts the load forecast on the ISO New England OASIS site.

# 5.5 ATC Mathematical Algorithms

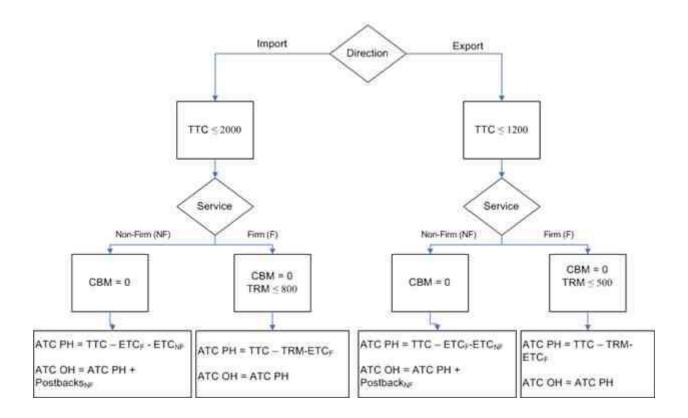
The mathematical algorithms are posted on the ISO New England OASIS web site at http://www.oatioasis.com/ISNE/ISNEdocs/sched20A\_atc\_algorithm.docx. Each SSP will provide a link to this document on their individual web sites.

# 5.6 Generation and Transmission Outages

The Phase I/II HVDC-TF is a controllable DC inter-Control Area tie line and therefore generation or transmission outages have no impact on the Phase I/II HVDC-TF ATC.

# 6. ATC PROCESS FLOW DIAGRAM

#### ATC Process Flow Diagram



Northeast Utilities Companies

**SCHEDULE 20A-NU** 

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**I.** Common Service Provisions

**II.** Phase I/II HVDC-TF Point-to-Point Service

Supplement No. 1 to Schedule 20-NU: Service over Phase I/II HVDC-TF

# Schedule Phase I/II HVDC-TF-LTF

Schedule Phase I/II HVDC-TF-LTF: Appendix A: Rates

• **Exhibit 1**: Annual Transmission Revenue Requirements

Schedule Phase I/II HVDC-TF-LTF: Appendix B: Opportunity Costs

# Schedule Phase I/II HVDC-TF-STF

Schedule Phase I/II HVDC-TF-STF: Appendix A: Rates

• **Exhibit 1:** Annual Transmission Revenue Requirements

Schedule Phase I/II HVDC-TF-STF: Appendix B: Opportunity Costs

Schedule Phase I/II HVDC-TF-NF

Schedule Phase I/II HVDC-TF-NF: Appendix A: Rates

• **Exhibit 1:** Annual Transmission Revenue Requirements

Schedule 20A-NU Attachment L: Creditworthiness Procedures

#### **SCHEDULE 20A-NU**

# NORTHEAST UTILITIES COMPANIES PHASE I/II HVDC-TF SERVICE NU

This Schedule 20A-NU contains the main substantive provisions applicable to the NU Companies' portion of Phase I/II HVDC-TF Service. It includes rates, terms and conditions for Phase I/II HVDC-TF Point-to-Point Service and NU-specific Phase I/II HVDC-TF Service Schedules. All Transmission Customers taking Phase I/II HVDC-TF Service from the NU Companies shall be subject to and comply with the rates, terms and conditions of this Schedule 20A-NU. In the event of a conflict between any rate, term or condition in the Tariff and any rate, term or condition in this Schedule 20A-NU, this Schedule 20A NU shall govern.

The NU Companies will perform their functions under this Schedule 20A in a manner that is not inconsistent with the ISO's provision of regional service, administration of the regional markets, dispatch of resources, and operation of the New England Transmission System for purposes of reliability.

#### I. <u>COMMON SERVICE PROVISIONS</u>

1. **Definitions:** Capitalized terms not defined herein shall have the meanings as defined within the Tariff.

1.1 **Interest:** The amount computed in accordance with the Commission's regulations at 18 CFR §35.19a(a)(2)(iii). Interest on deposits shall be calculated from the day the deposit check is credited to the NU Companies' account.

1.2 **Service Year:** The calendar year in which the Transmission Customer receives service under this Service Schedule.

1.3 **NU Companies**: The Northeast Utilities Companies (or "NU Companies") which consist of The Connecticut Light and Power Company, Western Massachusetts Electric Company, and Public Service Company of New Hampshire, each an operating company of Northeast Utilities ("NU").

1.4 **NUSCO:** Northeast Utilities Service Company, the Designated Agent for the NU Companies.

1.5 **Transmission Service**: Point-To-Point Transmission Service provided under this Service Schedule on a firm and non-firm basis.

#### 2. **Billing and Payment**

2.1 **Customer Default**: In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to the NU Companies on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after the NU Companies notify the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist.

Upon the occurrence of a default, the NU Companies may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission so approves any such request. In the event of a billing dispute between the NU Companies and the Transmission Customer, the NU Companies will continue to provide service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then the NU Companies may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy. Neither Party shall have the right to challenge any monthly bill or to bring any court or administrative action of any kind questioning the propriety of any bill after a period of twenty-four (24) months from the date the bill was due; provided, however, that in the case of a bill based on estimates, such twenty-four month period shall run from the due date of the final adjusted bill.

3. **Creditworthiness:** See Attachment L to this Schedule 20A-NU.

4. **Regulatory Filings:** Nothing contained in the Tariff or any Service Agreement shall be construed as affecting in any way the right of the NU Companies to unilaterally make application to the Commission for a change in rates, terms and conditions, charges, classification of service, Service

Agreement, rule or regulation under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder. Nothing contained in the Tariff or any Service Agreement shall be construed as affecting in any way the ability of any Party receiving service under the Tariff to exercise its rights under the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder.

5. **Rights Under The Federal Power Act:** Nothing in this section shall restrict the rights of any party to file a Complaint with the Commission under relevant provisions of the Federal Power Act.

## II. Phase I/II HVDC-TF POINT-TO-POINT SERVICE

#### Preamble

Except as otherwise provided Schedules, Firm and Non-Firm Phase I/II HVDC-TF Point-To-Point Service will be provided pursuant to the rates, terms and conditions set forth below. Phase I/II HVDC-TF Point-To-Point Service is for the receipt of capacity and/or energy at designated Point(s) of Receipt and the transmission of such capacity and energy to designated Point(s) of Delivery.

## 6. Nature of Firm Phase I/II HVDC-TF Point-To-Point Service

### a) Classification of Firm Phase I/II HVDC-TF Point-To-Point Service:

For Firm Point-To-Point Transmission Service over the Phase I/II HVDC-TF, the Transmission Customer will be billed for its Reserved Capacity under the terms of Schedule Phase I/II HVDC-TF-STF or Schedule Phase I/II HVDC-TF-LTF, to this Schedule 20A-NU.

## 7. Procedures for Arranging Firm Phase I/II HVDC-TF Point-To-Point Service

### a) Deposit:

A Completed Application for Firm Phase I/II HVDC-TF Point-To-Point Service also shall include a deposit of either three month's charge for Reserved Capacity or the full charge for Reserved Capacity for service requests of less than one month. If the Application is rejected because it does not meet the conditions for service as set forth herein, said deposit shall be returned with interest less any reasonable costs incurred by NU in connection with the review of the losing bidder's Application. If an Application is withdrawn or the Eligible Customer decides not to enter into a Phase I/II HVDC-TF Service Agreement for Firm Phase I/II HVDC-TF PointTo-Point Service, the deposit shall be refunded in full, with interest, less reasonable costs incurred by NU to the extent such costs have not already been recovered by NU from the Eligible Customer. NU will provide to the Eligible Customer a complete accounting of all costs deducted from the refunded deposit, which the Eligible Customer may contest if there is a dispute concerning the deducted costs. Applicable interest shall be computed in accordance with the Commission's regulations at 18 C.F.R. § 35.19a(a)(2)(iii), and shall be calculated from the day the deposit check is credited to the PTO's account.

### 8. Rates and Charges

The Transmission Customers taking Phase I/II HVDC-TF Point-To-Point Transmission Service shall pay the NU Companies for any Ancillary Services, consistent with Commission policy, along with the following:

a) Rates for Firm and Non-Firm Point-To-Point Transmission Services: Rates for Firm and Non-Firm Point-To-Point Transmission Service over the Phase I/II HVDC-TF are provided in Schedule Phase I/II HVDC-TF-LTF and Schedule Phase I/II HVDC-TF-STF.

# SUPPLEMENT NO. 1 TO Schedule 20A-NU Service Over Phase I/II HVDC-TF

# I. **Definitions:**

Unless otherwise provided, capitalized terms used herein shall have the definitions provided in the ISO-New England Transmission, Markets and Services Tariff ("Tariff") including Schedule 20A-NU to the OATT.

# II. Transmission Service Over Phase I/II HVDC-TF:

Transmission service over the Phase I/II HVDC-TF is provided pursuant to the terms and conditions of this Phase I/II HVDC-TF Service Schedule.

# III. Rates For Transmission Service Over Phase I/II HVDC-TF:

Rates for Point-To-Point Transmission Service over the Phase I/II HVDC-TF are set forth in the following rate schedules attached to this Supplement No. 1: Rate Schedule Phase I/II HVDC-TF-LTF for Long-Term Firm Point-To-Point Transmission Service; Rate Schedule Phase I/II HVDC-TF-STF for Short-Term Firm Point-To-Point Transmission Service; and Rate Schedule Phase I/II HVDC-TF-NF for Non-Firm Point-To-Point Transmission Service.

#### SCHEDULE PHASE I/II HVDC-TF-LTF

I. For each month of service, NUSCO or its agent will bill the Transmission Customer the difference between: (1) the higher of the cumulative annual Embedded Cost Charges or the cumulative annual Opportunity Costs Charges, calculated on a monthly basis for each calendar year and (2) the cumulative annual amount of charges for Embedded Costs and Opportunity Costs preceding the service month for which the bill is being rendered. In January of each calendar year the cumulative billed amount for (2) above will be reset to zero (0).

#### A. <u>EMBEDDED COST CHARGE</u>

#### 1) Determination of Embedded Cost Charge

The Embedded Cost Charge will provide for recovery of the embedded costs of the Phase I/II HVDC-TF of the NU Companies. The Embedded Cost Charge for each month will be the product of: (a) the "NU Companies' Formula Rate" (expressed in dollars per kilowatt-year), divided by twelve (12) months, and (b) the Reserved Capacity (expressed in kilowatts).

#### 2) <u>NU Companies Formula Rate</u>

The NU Companies' formula rate shall be determined in accordance with the rate formulas specified in Appendix A of this Schedule Phase I/II HVDC-TF-LTF ("Formula Rate"), being applied to the costs recorded on each of the NU Companies' books of account (i.e., FERC Form 1). The Formula Rate shall be determined on the basis of estimated costs for each year until the actual NU Companies' costs for such year are determined. Thereafter, payments made on such estimate shall be recalculated based on actual data for that year, and an appropriate billing adjustment shall be made pursuant to Schedule 20A.

#### 3) <u>Tax Rates and Taxes</u>

The Formula Rate in effect during a Service Year shall be based on the local, state, and federal tax rates and taxes in effect during the prior year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the Formula Rate will be

appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

## 4) <u>Provision re: Exchanges</u>

With respect to Entitlement Transactions or Energy Transactions or other transactions that involve an exchange, each party to such transaction shall be treated as an individual Transmission Customer under the Tariff. Accordingly, a separate Schedule Phase I/II HVDC-TF-LTF or other applicable charge(s) will be calculated for, and a separate bill will be rendered to, each such individual Transmission Customer.

## B) <u>OPPORTUNITY COSTS CHARGE</u>

The Opportunity Costs Charge shall be determined each month in accordance with the provisions set forth in Appendix B of this Schedule Phase I/II HVDC-TF-LTF and the Service Agreement.

- II. In addition to the applicable charges set forth in Parts I and II of the Tariff, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay to NUSCO each month the following additional charges for Phase I/II HVDC-TF Long-Term Firm Transmission Service provided during such month.
- A. Taxes and Fees Charge
- B. Regulatory Expenses Charge
- C. Other

# A. <u>TAXES AND FEES CHARGE</u>

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service provided under the Tariff, not specifically provided for in any of the charge or rate provisions under the Tariff, including any applicable Interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for any such fee, assessment, or tax shall be borne by the

Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

# B. <u>REGULATORY EXPENSES CHARGE</u>

The NU Companies shall have the right to make a Section 205 filing for recovery of regulatory expenses associated with the Tariff and the Service Agreements.

# C. <u>OTHER</u>

The NU Companies shall have the right; at any time, unilaterally to file for a change in any of the provisions of this Schedule Phase I/II HVDC-TF-LTF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE PHASE I/II HVDC-TF-LTF Appendix A RATES

The NU Companies' Formula Rate for Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula.

Formula Rate<sub>i</sub> = 
$$\underline{A_{i-1}-B_{i-1}}_{C_{i-1}}$$

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

• A<sub>i-1</sub> is the Annual Cost (expressed in dollars) of the Phase I/II HVDC-TF of the NU Companies for the calendar year prior to the Service Year. The Annual Revenue Requirements are determined pursuant to the formula specified in Exhibit 1 to this Appendix A.

•  $B_{i-1}$  is the actual transmission revenues (expressed in dollars) provided from the provision of transmission services over the Phase I/II HVDC-TF to others. The actual transmission revenues shall be those recorded on the books of the NU Companies in FERC Account

Nos. 447 and 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

•  $C_{i-1}$  is the average of the NU Companies twelve monthly maximum transfer limits (expressed in kilowatts) on its share of the Phase I/II HVDC-TF for the calendar year prior to the Service Year.

# SCHEDULE PHASE I/II HVDC-TF-LTF Appendix A Exhibit 1 ANNUAL TRANSMISSION REVENUE REQUIREMENTS

The Annual Transmission Cost for the NU Companies' Phase I/II HVDC-TF are the costs assessed by each of them in owning, operating, maintaining, and supporting those facilities, plus any applicable leasing costs and an allocable share of General Plant and other such plant and equipment. These costs shall be computed on a calendar-year basis using costs, from the calendar year prior to the Service Year.

In making such determinations, the provisions of the Uniform System of Accounts prescribed by FERC for Class A and Class B Public Utilities and Licensees shall be controlling. The formula rate for determination of the annual revenue requirements for the Phase I/II HVDC-TF of the NU Companies are determined pursuant to this Appendix A of Schedule Phase I/II HVDC-TF-LTF, as follows:

A. ANNUAL COST = Sum of [each NU Company's Phase I/II HVDC-TF transmission costs - Chester Static VAR Compensator].

# SCHEDULE PHASE I/II HVDC-TF LTF Appendix B OPPORTUNITY COSTS

The types of Opportunity Costs that may be incurred by the NU Companies and charged to Transmission Customers in connection with the provision of Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service pursuant to a Service Agreement are described below.

## 1. OUT OF RATE COSTS

1.1 Out of Rate Costs are incurred when: (i) the NU Companies are required under a ISO dispatch order to limit the operation of any of their generation Entitlements below the output level under economic dispatch or to "must run" any of their generation Entitlements above the levels associated with economic dispatch; and (ii) the ISO dispatch order adversely impacts the NU Companies' settlement billing or the settlement billing of another Transmission Customer that has a contractual right (through the purchase of an Entitlement from the NU Companies) to pass the cost back to the NU Companies; and (iii) the ISO does not grant a waiver of the Out of Rate Costs incurred pursuant to (i) and (ii) above.

1.2 The information required from the ISO to establish the existence and level of Out of Rate Costs and the Transmission Customer's responsibility for such costs will normally not be available to the NU Companies by the end of the billing month in which the Out of Rate Costs are incurred. Accordingly, the bills rendered for Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service pursuant to Schedule 20A shall be subject to subsequent adjustment, as provided in this Appendix B of Schedule Phase I/II HVDC-TF-LTF.

1.3 In circumstances where multiple transactions across a constrained transmission path are causing the incurrence of Out of Rate Costs, the Out of Rate Costs will be allocated first to the Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff to the extent that their service is not curtailed or interrupted pursuant to the provisions of the Tariff. If, after curtailment or interruption of such Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and/or the allocation of Out of Rate Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, Out of Rate Costs remain, such remaining costs will be allocated to Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service customers with the latest date (latest means, the latest dated Service Agreement for Phase I/II HVDC-TF Firm Point-To-Point Transmission Service or latest dated Reservation for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service). Where the reduction in the number of megawatts of Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and of Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short Term Firm Point-To-Point Transmission Service that would have been required to eliminate the need for the ISO limitation or "must run" in any hour exceeds the megawatts of actual Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and Phase I/II HVDC-TF Long-Term and Short-Term Firm Point-To-Point Transmission Service of the latest applicable transaction in such hour, the excess Out of Rate Costs will be allocated to the next latest transaction and so on until the total additional megawatts of Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service that is required to be reduced to eliminate the need for such ISO limitation or "must run" order has been achieved. Whenever the transactions across a constrained transmission path that are causing the incurrence of Out of Rate Costs include off-system sales by the NU Companies, such NU Companies' off-system sales shall be included on the same basis as Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service transactions in determining responsibility for Out of Rate Costs and the date of the off-system sales contract or wholesale transaction shall be used to determine its "service agreement" or "reservation" date.

### 2. <u>OPPORTUNITY COSTS ON PHASE I/II HVDC-TF</u>

#### 2.1 Short-Term Power Transfers into New England

The NU Companies' lost opportunities to purchase economic short-term power will occur when the amount of power that would be economical for the NU Companies to purchase in the market (at a validated, quoted delivered price below their decremental energy cost) exceeds the amount of the NU Companies' allocated share of Phase I/II HVDC-TF transfer capacity not then committed to others for Non-Firm Point-To-Point Transmission Service and Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service into New England and for purchases on behalf of Native Load Customers ("Short-Term Available Import Capacity"). Operating conditions in New England or elsewhere and/or the location of the seller may affect the amount of Short-Term Available Import Capacity.

The following steps comprise the procedures to be used in assigning such Opportunity Costs on Phase I/II HVDC-TF to Firm Transmission Service customers under the Tariff after assignment of any Opportunity

Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, pursuant to the provisions of the Tariff.

2.1.1 The megawatt (MW) difference, if any, between the aggregate of economic power purchase opportunities available and Short-Term Available Import Capacity will be determined hourly ("Import Shortfall").

2.1.2 To assign such Opportunity Costs on Phase I/II HVDC-TF to Transmission Customers, Service Agreements for Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service will be ordered (stacked) by date of execution of the Service Agreement under the Tariff, with the Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff having the latest date being assigned the highest order number.

2.1.3 Firm Transmission Customers under the Tariff contributing to the MW amount of lost opportunities will be determined by aggregating MWs of the Reserved Capacity counting backward from the highest order number Firm Point-To-Point Service Agreement under the Tariff until the aggregate MWs equals the Import Shortfall.

2.1.4 Such Opportunity Costs on Phase I/II HVDC-TF for each hour associated with the lowest cost purchase opportunity foregone will be assigned to the highest order numbered Phase I/II HVDC-TF Firm Point-To-Point Service Agreement(s) under the Tariff up to the MWs of such foregone purchase.

2.1.5 The MWs of the next lowest cost purchase foregone will be assigned to the MWs of the next following Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff or (next highest order number not fully included in the calculation in d. above) and so on until the MWs used to calculate the lost opportunities equals the Import Shortfall.

2.1.6 Such Opportunity Costs on Phase I/II HVDC-TF will be calculated for each hour by computing the difference between the cost of the economic power offered to, but not able to be taken by, the NU Companies and the decremental energy cost for the NU Companies for an equivalent amount of megawatt-hours (after reflecting applicable losses) of such foregone purchases. If however, the NU Companies elect to purchase power from an alternative supplier

involving an unconstrained interface, such Opportunity Costs on Phase I/II HVDC-TF for each hour will be calculated as the difference between the cost of the economic power for the foregone transaction and the cost of economic power for the alternative transaction. The Service Agreement will set forth the method for calculating charges for Opportunity Costs on Phase I/II HVDC-TF associated with such foregone purchases.

2.1.7 Short Term Power Transfers Out of New England - The NU Companies' lost opportunities to sell short-term power will occur when the amount of power that would be economical for the NU Companies to sell in the market (at validated, quoted prices that exceed their incremental energy cost) exceeds the amount of the NU Companies' allocated share of the Phase I/II HVDC-TF transfer capacity out of New England not then committed for Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service out of New England ("Short-Term Available Export Capacity"). It is recognized that operating conditions in New England or elsewhere and/or the location of the buyer may affect the amount of Phase I/II HVDC-TF Short-Term Available Export Capacity.

2.2 The following steps comprise the procedures to be used in assigning such Opportunity Costs on Phase I/II HVDC-TF to Firm Point-To-Point Transmission Service Customers under the Tariff after assignment of Opportunity Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, pursuant to the provision of the Tariff.

2.2.1 The megawatt (MW) difference, if any, between the aggregate of economic power sales opportunities and the Phase I/II HVDC-TF Short-Term Available Export Capacity will be determined hourly ("Export Shortfall").

2.2.2 To assign such Opportunity Costs on Phase I/II HVDC-TF to Firm Point-To-Point Transmission Customers, the date of Service Agreements under the Tariff for transmission service out of New England will be ordered (stacked) by date of the Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (for NU Companies off-system sales, transmitted under the Tariff, the date used shall be the date of the sales contract or wholesale transaction), with the Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff (or the NU Companies) having the latest execution date being assigned the highest order number.

2.2.3 Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff (and/or the NU Companies) contributing to the MW amount of lost opportunities will be determined by aggregating MWs of Reserved Capacity (including contract or transaction amount of such NU Companies' sales) counting backward from the highest order number Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (or contract or transaction of such NU Companies' sales) until the aggregate MWs equals the Export Shortfall.

2.2.4 Such Opportunity Costs on Phase I/II HVDC-TF for each hour associated with the highest priced sale opportunity foregone will be assigned to the highest order numbered Phase I/II HVDC-TF Firm Point-To-Point Service Agreement(s) under the Tariff (or contract or transaction for such NU Companies' sales) up to the MWs of such foregone sale.

2.2.5 The MWs of the next highest price sale foregone will be assigned to the MWs of the next following Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff or NU Companies' off-system sale (next highest order number not fully included in the calculation in d. above) and so on until the MWs used to calculate the lost opportunities equals the Export Shortfall.

2.2.6 Such Opportunity Costs on Phase I/II HVDC-TF for each hour will be calculated by computing the difference between the price of the power for which willing buyers exist, but to whom sales cannot be made because of limited Phase I/II HVDC-TF Short Term Available Export Capacity, and the incremental energy cost for the NU Companies for an equivalent amount of megawatt-hours (after reflecting applicable losses) of such foregone sales. If, however, the NU Companies elect to sell power to an alternative supplier involving an unconstrained interface, such Opportunity Costs on Phase I/II HVDC-TF will be calculated as the difference between the delivered price of power of the foregone transaction and the delivered price of power for the alternative transaction. The Service Agreement will set forth the methodology for calculating charges for Opportunity Costs on Phase I/II HVDC-TF associated with such foregone sales.

### 3. <u>TIE LINE ADJUSTMENT COSTS</u>

Service across the Phase I/II HVDC-TF into New England that results in a decrease in the amount of tie line benefits (expressed in kilowatts) reflected in the NU Companies' Capability Responsibility will be subject to claims for Opportunity Costs to account for reduction in such tie line benefits. The Service

Agreement will set forth the methodology to determine the reduced tie line benefit to the NU Companies and to calculate the charge for recovery of such Opportunity Costs.

## 4. <u>OTHER OPPORTUNITY COSTS</u>

Nothing in this Appendix B of Schedule Phase I/II HVDC-TF-LTF shall be construed to limit the right of the NU Companies to file unilaterally under Section 205 of the Federal Power Act for recovery of other Opportunity Costs incurred by the NU Companies in connection with Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service to a Transmission Customer.

# 5. <u>LIMIT OF OPPORTUNITY COSTS</u>

5.1 The aggregate annual Opportunity Costs billed across a given constrained interface shall be limited by the estimated annual levelized revenue requirement associated with new facilities that are technically and economically feasible to build and, if built, would increase the transfer capacity of the applicable interface to a level that would eliminate such costs. Such facilities and their costs will be designated in the Service Agreement. Opportunity Costs for all transactions will be accumulated and compared on an annual basis to the annual levelized revenue requirements associated with expanding the system as described above. The annual levelized revenue requirement so determined is the maximum cumulative Opportunity Costs that will be billed for that year for that interface for service in the applicable direction ("Cost Cap").

5.2 The Cost Cap shall not apply during the construction period set forth in the Service Agreement. The Companies shall not be restricted from filing a request for a waiver of the Cost Cap with the Commission on a case-by-case basis.

# 6. <u>OTHER PROVISIONS</u>

6.1 Whenever the NU Companies determine in advance that they expect to charge the Transmission Customer for Opportunity Costs hereunder, the NU Companies will, if practicable, notify the Transmission Customer, based on the information then available, and give such Customer the option of interrupting its scheduled deliveries for an identified day in order to avoid charges for Opportunity Costs. It is explicitly recognized that the NU Companies may not unilaterally interrupt service to avoid the incurrence of Opportunity Costs, and the option to permit interruption rests solely with the Transmission Customer. It is also explicitly recognized that the NU Companies may not have the ability to make this determination on a timely basis and to provide notice in advance of scheduling deadlines and they shall not be liable in any manner for failure to provide advance notice under this paragraph or for changes in operating conditions that impact on anticipated availability of transfer capability.

6.2 For any hour that the NU Companies incur an Opportunity Cost pursuant to this Appendix B of Schedule Phase I/II HVDC-TF-LTF and NUSCO determines that the Opportunity Cost would not have been incurred if the NU Companies were not providing Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service to the Transmission Customer, NUSCO shall be obligated to notify the Transmission Customer within one month of the date on which it had knowledge of the incurrence of the Opportunity Costs. In the event that the then calculated annual cumulative Opportunity Costs exceed the annual cumulative charges previously billed to the Transmission Customer for Embedded Costs or Opportunity Costs pursuant to Section I. of Schedule LTF, NUSCO may render an immediate billing adjustment.

6.3 All claims for Opportunity Costs shall be accompanied by a written statement or other documentation: (i) showing that the Opportunity Costs were incurred; showing the calculation for the Opportunity Costs incurred and claimed; and showing that the Opportunity Costs would not have been incurred in the absence of the transaction being charged. If the Transmission Customer, in good faith, disputes NUSCO's claim for Opportunity Costs, such dispute must be made within a ninety (90) day period following the end of the Service Year for which the Opportunity Costs were claimed by NUSCO.

6.4 The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Appendix B of Schedule Phase I/II HVDC-TF-LTF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

#### SCHEDULE Phase I/II HVDC-TF STF

I. For each daily, weekly or monthly Transaction, NUSCO will bill the Transmission Customer the higher of: (1) the Embedded Cost Charge or (2) the Opportunity Cost Charges, calculated for the term of each such Transaction. For Transaction having a term greater than one month, NUSCO will bill the Transmission Customer the difference between: (1) the higher of the cumulative Embedded Cost Charges or the cumulative Opportunity Costs Charges, calculated from the effective date of Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service through the end of the service month and (2) the cumulative billed amount of charges for Embedded Costs and Opportunity Costs preceding the service month for which the bill is being rendered.

#### A. <u>EMBEDDED COST CHARGE</u>

#### 1. Determination of Embedded Cost Charge

The Embedded Cost Charge will provide for recovery of the embedded costs of the Phase I/II HVDC-TF of the NU Companies. The Embedded Cost Charge for each month will equal the sum of the Embedded Cost Charges for each monthly (or longer term), weekly, or daily Transaction during such month.

The Embedded Cost Charge for each monthly Transaction shall be determined as the product of: (a) the NU Companies' Annual Rate for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service divided by twelve (I2) months (expressed in dollars per kilowatt-month) and (b) the Reserved Capacity set forth for such monthly Transaction (expressed in kilowatts). The Embedded Cost Charge for each weekly Transaction shall be determined as the product of: (a) the NU Companies' Weekly Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Rate (expressed in dollars per kilowatt-week), and (b) the Reserved Capacity set forth for such weekly Transaction (expressed in kilowatts). The NU Companies' Weekly Rate is the NU Companies' Annual Rate for Phase I/II HVDC-TF Short Term Firm Point-To-Point Transmission Service divided by fifty-two (52) weeks.

The Embedded Cost Charge for each daily Transaction shall be determined as the product of: (a) the NU Companies' Daily Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Rate (expressed in dollars per kilowatt-day), and (b) the Reserved Capacity set forth for such daily Transaction (expressed in kilowatts). The NU Companies' Daily Rate is the NU

Companies' Weekly Rate for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service divided by five (5) days. The total of the charges for daily Transactions, under an individual reservation, in a seven (7) day period shall not exceed the charges based on the Weekly Rate and the maximum Reserved Capacity in the period.

### 2. <u>NU Companies' Annual Formula Rate for Phase I/II HVDC-TF Short-Term</u>

<u>Transmission Service</u> The NU Companies' Annual Formula Rate for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service shall be expressed in dollars per kilowatt-year and shall be determined in accordance with the rate formula specified in Appendix A of this Schedule Phase I/II HVDC-TF-STF ("Formula Rate") being applied to the costs recorded on the NU Companies' books of account (i.e., FERC Form 1). The Formula Rate shall be determined on the basis of estimated costs for each year until the actual NU Companies' costs for such year are determined. Thereafter, payments made on such estimate shall be recalculated based on actual data for that year, and an appropriate billing adjustment shall be made.

# 3. <u>Tax Rates and Taxes</u>

The Formula Rate set forth in this Schedule Phase I/II HVDC-TF-STF in effect during a Service Year shall be based on the local, state, and federal tax rates and taxes in effect during the prior year. If, at any time, additional or new taxes are imposed on the Companies or existing taxes are removed, the Formula Rate will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

# 4. <u>Provision re: Exchanges</u>

With respect to Entitlement Transactions or Energy Transactions or other transactions that involve an exchange, each party to such transaction shall be treated as an individual Transmission Customer under the Tariff. Accordingly, a separate Schedule Phase I/II HVDC-TF-STF or other applicable charge(s) will be calculated for, and a separate bill will be rendered to, each such individual Transmission Customer.

# B. <u>OPPORTUNITY COSTS CHARGE</u>

The Opportunity Costs Charge shall be determined each month in accordance with the provisions set forth in Appendix B of this Schedule Phase I/II HVDC-TF-STF and the Service Agreement.

In addition to the applicable charges set forth in Section I of this Schedule Phase I/II
 HVDC-TF-STF, and as otherwise specified in the Service Agreement, the Transmission
 Customer shall pay to NUSCO each month the following additional charges for Phase I/II
 HVDC-TF Short-Term Firm Point-To-Point Transmission Service provided during such month.

- A. Taxes and Fees Charge
- B. Regulatory Expenses Charge
- C. Other

# A. <u>TAXES AND FEES CHARGE</u>

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service provided under the Tariff, not specifically provided for in any of the charge or rate provisions under the Tariff, including any applicable interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for any such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

## B. <u>REGULATORY EXPENSES CHARGE</u>

The NU Companies shall have the right to make a Section 205 filing for recovery of regulatory expenses associated with the Tariff and the Service Agreements.

# C. <u>OTHER</u>

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule Phase I/II HVDC-TF-STF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE PHASE I/II HVDC-TF STF Appendix A RATES

The NU Companies' Formula Rate for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula.

Formula Rate<sub>i</sub> = 
$$\underline{A_{i-1}} - \underline{B_{i-1}} - \underline{C_{i-1}}$$

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

• A<sub>i-1</sub> is the Annual Cost (expressed in dollars) of the Phase I/II HVDC-TF of the NU Companies for the calendar year prior to the Service Year. The Annual Revenue Requirements are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule Phase I/II HVDC-TF-STF.

•  $B_{i-1}$  is the actual transmission revenues (expressed in dollars) provided from the provision of transmission services over the Phase I/II HVDC-TF to others. The actual transmission revenues shall be those recorded on the books of the NU Companies in FERC Account Nos. 447 and 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

•  $C_{i-1}$  is the average of NU Companies' twelve monthly maximum transfer limits (expressed in kilowatts) on its share of the Phase I and Phase II DC facilities for the calendar year prior to the Service Year.

# SCHEDULE Phase I/II HVDC-TF-STF Appendix A Exhibit 1 ANNUAL TRANSMISSION REVENUE REQUIREMENTS

The Annual Transmission Cost for the NU Companies' Phase I/II HVDC-TF are the costs assessed by each of them in owning, operating, maintaining, and supporting those facilities, plus any applicable leasing costs and an allocable share of General Plant and other such plant and equipment. These costs shall be computed on a calendar-year basis using costs, from the calendar year prior to the Service Year.

In making such determinations, the provisions of the Uniform System of Accounts prescribed by FERC for Class A and Class B Public Utilities and Licensees shall be controlling. The rate formulae for determination of the annual revenue requirements for the Phase I/II HVDC-TF of the NU Companies are determined pursuant to this Appendix A of Schedule Phase I/II HVDC-TF-STF, as follows:

A. <u>ANNUAL REVENUE REQUIREMENTS</u> = Sum of [each NU Companies' Phase I/II HVDC-TF transmission costs - Chester Static VAR Compensator].

# SCHEDULE PHASE I/II HVDC-TF-STF Appendix B OPPORTUNITY COSTS

The types of Opportunity Costs that may be incurred by the NU Companies and charged to Transmission Customers in connection with the provision of Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service pursuant to a Service Agreement are described below.

## 1. <u>OUT OF RATE COSTS</u>

1.1 Out of Rate Costs are incurred when: (i) the NU Companies are required under an ISO dispatch order to limit the operation of any of their generation Entitlements below the output level under economic dispatch or to "must run" any of their generation Entitlements above the levels associated with economic dispatch; and (ii) the ISO dispatch order adversely impacts the NU Companies' settlement billing or the settlement billing of another Transmission Customer that has a contractual right (through the purchase of an Entitlement from the NU Companies) to pass the cost back to the NU Companies; and (iii) the ISO does not grant a waiver of the Out of Rate Costs incurred pursuant to (i) and (ii) above.

1.2 The information required from the ISO to establish the existence and level of Out of Rate Costs and the Transmission Customer's responsibility for such costs will normally not be available to the NU Companies by the end of the billing month in which the Out of Rate Costs are incurred. Accordingly, the bills rendered for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service pursuant to Schedule 20A shall be subject to subsequent adjustment, as provided in this Appendix B of Schedule Phase I/II HVDC-TF-STF.

1.3 In circumstances where multiple transactions across a constrained transmission path are causing the incurrence of Out of Rate Costs, the Out of Rate Costs will be allocated first to the Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff to the extent that their service is not curtailed or interrupted pursuant to the provisions of the Tariff. If, after curtailment or interruption of such Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and/or the allocation of Out of Rate Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, Out of Rate Costs remain, such remaining costs will be allocated to Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service customers with the latest date (latest means, the latest dated Service Agreement for Firm Point-To-Point

Transmission Service). Where the reduction in the number of megawatts of Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short Term Firm Point-To-Point Transmission Service that would have been required to eliminate the need for the ISO limitation or "must run" in any hour exceeds the megawatts of actual Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service of the latest applicable transaction in such hour, the excess Out of Rate Costs will be allocated to the next latest transaction and so on until the total additional megawatts of Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service that is required to be reduced to eliminate the need for such ISO limitation or "must run" order has been achieved. Whenever the transactions across a constrained transmission path that are causing the incurrence of Out of Rate Costs include off-system sales by the NU Companies, such NU Companies' off-system sales shall be included on the same basis as Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service transactions in determining responsibility for Out of Rate Costs and the date of the off-system sales contract or wholesale transaction shall be used to determine its "service agreement" or "transaction" date.

## 2. <u>OPPORTUNITY COSTS ON PHASE I/II HVDC-TF</u>

#### 2.1 Short-Term Power Transfers into New England

The NU Companies' lost opportunities to purchase economic short-term power will occur when the amount of power that would be economical for the NU Companies to purchase in the market (at a validated, quoted delivered price below their decremental energy cost) exceeds the amount of the NU Companies' allocated share of Phase I/II HVDC-TF transfer capacity not then committed to others for Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service into New England and for purchases on behalf of Native Load Customers ("Short-Term Available Import Capacity"). Operating conditions in New England or elsewhere and/or the location of the seller may affect the amount of Phase I/II HVDC-TF Short-Term Available Import Capacity.

The following steps comprise the procedures to be used in assigning such Opportunity Costs on Phase I/II HVDC-TF to Firm customers under the Tariff after assignment of any Opportunity Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, pursuant to the provisions of the Tariff. 2.1.1 The megawatt (MW) difference, if any, between the aggregate of economic power purchase opportunities available and Phase I/II HVDC-TF Short-Term Available Import Capacity will be determined hourly ("Import Shortfall").

2.1.2 To assign such Opportunity Costs on Phase I/II HVDC-TF to Transmission Customers, Firm Point-To-Point Service Agreements under the Tariff will be ordered (stacked) by date of execution of the Phase I/II HVDC-TF Firm Point To-Point Service Agreement under the Tariff, with the Firm Point-To-Point Transmission Customers under the Tariff having the latest date being assigned the highest order number.

2.1.3 Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff contributing to the MW amount of lost opportunities will be determined by aggregating MWs of Reserved Capacity counting backward from the highest order number Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff until the aggregate MWs equals the Import Shortfall.

2.1.4 Such Opportunity Costs on Phase I/II HVDC-TF for each hour associated with the lowest cost purchase opportunity foregone will be assigned to the highest order numbered Phase I/II HVDC-TF Firm Point-To-Point Service Agreement(s) under the Tariff up to the MWs of such foregone purchase.

2.1.5 The MWs of the next lowest cost purchase foregone will be assigned to the MWs of the next following Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (next highest order number not fully included in the calculation in d. above) and so on until the MWs used to calculate the lost opportunities equals the Import Shortfall.

2.1.6 Such Opportunity Costs on Phase I/II HVDC-TF will be calculated for each hour by computing the difference between the cost of the economic power offered to, but not able to be taken by, the NU Companies and the decremental energy cost for the NU Companies for an equivalent amount of megawatt-hours (after reflecting applicable losses) of such foregone purchases. If, however, the NU Companies elect to purchase power from an alternative supplier involving an unconstrained interface, such Opportunity Costs on Phase I/II HVDC-TF for each hour will be calculated as the difference between the cost of the economic power for the foregone transaction and the cost of economic power for the alternative transaction. The Service

Agreement will set forth the method for calculating charges for Opportunity Costs on Phase I/II HVDC-TF associated with such foregone purchases.

## 2.2 Short-Term Power Transfers Out of New England

The NU Companies' lost opportunities to sell Phase I/II HVDC-TF short-term power will occur when the amount of power that would be economical for the NU Companies to sell in the market (at validated, quoted prices that exceed their incremental energy cost) exceeds the amount of the NU Companies' allocated share of the Phase I/II HVDC-TF transfer capacity out of New England not then committed for Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short Term Firm Point-To-Point Transmission Service out of New England ("Short-Term Available Export Capacity"). It is recognized that operating conditions in New England or elsewhere and/or the location of the buyer may affect the amount of Short-Term Available Export Capacity.

The following steps comprise the procedures to be used in assigning such Opportunity Costs on Phase I/II HVDC-TF to Firm Point-To-Point Customers under the Tariff after assignment of Opportunity Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, pursuant to the provision of the Tariff.

2.2.1 The megawatt (MW) difference, if any, between the aggregate of economic power sales opportunities and the Short-Term Available Export Capacity will be determined hourly ("Export Shortfall").

2.2.2 To assign such Opportunity Costs on Phase I/II HVDC-TF to Transmission Customers, the date of Phase I/II HVDC-TF Firm Point-To-Point Service Agreements under the Tariff for transmission service out of New England will be ordered (stacked) by date of the Firm Point-To-Point Service Agreement under the Tariff (for NU Companies off-system sales, transmitted under Phase I/II HVDC-TF Firm Point-To-Point Transmission Service under the Tariff, the date used shall be the date of the sales contract or wholesale transaction), with the Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff (or the NU Companies) having the latest execution date being assigned the highest order number.

2.2.3 Firm Point-To-Point Transmission Customers under the Tariff (and/or the NU Companies) contributing to the MW amount of lost opportunities will be determined by aggregating MWs of Reserved Capacity (including contract or transaction amount of such

Companies' sales) counting backward from the highest order number Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (or contract or transaction of such NU Companies' sales) until the aggregate MWs equals the Export Shortfall.

2.2.4 Such Opportunity Costs on Phase I/II HVDC-TF for each hour associated with the highest priced sale opportunity foregone will be assigned to the highest order numbered Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (or contract or transaction for such Companies' sales) up to the MWs of such foregone sale.

2.2.5 The MWs of the next highest price sale foregone will be assigned to the MWs of the next following Finn Point-To-Point Service Agreement under the Tariff or NU Companies' off-system sale (next highest order number not fully included in the calculation in d. above) and so on until the MWs used to calculate the lost opportunities equals the Export Shortfall.

2.2.6 Such Opportunity Costs on Phase I/II HVDC-TF for each hour will be calculated by computing the difference between the price of the power for which willing buyers exist, but to whom sales cannot be made because of limited Phase I/II HVDC-TF Short-Term Available Export Capacity, and the incremental energy cost for the NU Companies for an equivalent amount of megawatt-hours (after reflecting applicable losses) of such foregone sales. If, however, the NU Companies elect to sell power to an alternative supplier involving an unconstrained interface, such Opportunity Costs on Phase I/II HVDC-TF will be calculated as the difference between the delivered price of power of the foregone transaction and the delivered price of power for the alternative transaction. The Service Agreement will set forth the methodology for calculating charges for Opportunity Costs on Phase I/II HVDC-TF associated with such foregone sales.

## 3. <u>TIE LINE ADJUSTMENT COSTS</u>

Service across the Phase I/II HVDC-TF into New England that results in a decrease in the amount of tie line benefits (expressed in kilowatts) reflected in the NU Companies' Capability Responsibility will be subject to claims for Opportunity Costs to account for reduction in such tie line benefits. The Service Agreement will set forth the methodology to determine the reduced tie line benefit to the NU Companies and to calculate the charge for recovery of such Opportunity Costs.

### 4. <u>OTHER OPPORTUNITY COSTS</u>

Nothing in this Appendix B of Schedule Phase I/II HVDC-TF-STF shall be construed to limit the right of the NU Companies to file unilaterally under Section 205 of the Federal Power Act for recovery of other Opportunity Costs incurred by the Companies in connection with Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service to a Transmission Customer.

## 5. <u>OTHER PROVISIONS</u>

5.1 Whenever the NU Companies determine in advance that they expect to charge the Transmission Customer for Opportunity Costs hereunder, the NU Companies will, if practicable, notify the Transmission Customer, based on the information then available, and give such Customer the option of interrupting its scheduled deliveries for an identified day in order to avoid charges for Opportunity Costs. It is explicitly recognized that the NU Companies may not unilaterally interrupt service to avoid the incurrence of Opportunity Costs, and the option to permit interruption rests solely with the Transmission Customer. It is also explicitly recognized that the NU Companies may not have the ability to make this determination on a timely basis and to provide notice in advance of scheduling deadlines and they shall not be liable in any manner for failure to provide advance notice under this paragraph or for changes in operating conditions that impact on anticipated availability of transfer capability.

5.2 For any hour that the NU Companies incur an Opportunity Cost pursuant to this Appendix B of Schedule Phase I/II HVDC-TF-STF and NUSCO determines that the Opportunity Cost would not have been incurred if the NU Companies were not providing Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service to the Transmission Customer, NUSCO shall be obligated to notify the Transmission Customer within one month of the date on which it had knowledge of the incurrence of the Opportunity Costs. In the event that the then calculated cumulative Opportunity Costs exceed the cumulative charges previously billed to the Transmission Customer for Embedded Costs or Opportunity Costs pursuant to Section I of Schedule Phase I/II HVDC-TF-STF, NUSCO may render an immediate billing adjustment.

5.3 All claims for Opportunity Costs shall be accompanied by a written statement or other documentation: (i) showing that the Opportunity Costs were incurred; (ii) showing the calculation for the Opportunity Costs incurred and claimed; and (iii) showing that the Opportunity Costs would not have been incurred in the absence of the transaction being charged. If the Transmission Customer, in good faith, disputes NUSCO's claim for Opportunity Costs, such dispute must be made within a ninety (90)

day period following the end of the Service Year for which the Opportunity Costs were claimed by NUSCO.

5.4 The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Appendix B of Schedule Phase I/II HVDC-TF-STF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE PHASE I/II HVDC-TF-NF

I. NUSCO shall bill the Transmission Customer for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service, and the Transmission Customer shall be obligated to pay to NUSCO the charges as set forth in this Schedule Phase I/II HVDC-TF-NF as applicable.

# A. TRANSMISSION CHARGE

## 1. <u>General</u>

The Transmission Customer shall pay to NUSCO each month the sum of the Transmission Charges calculated for all of its monthly Transactions, weekly Transactions, daily Transactions and hourly Transactions, each as set forth below.

With respect to any wholesale transactions that involve an exchange, each party to such Transaction shall be an individual Transmission Customer under the Tariff. Accordingly, a Transmission Charge, as applicable, will be calculated for, and a separate bill will be rendered to, each such Transmission Customer.

# 2. <u>Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service For Monthly</u> <u>Transactions</u>

The Transmission Charge for each month applicable to a monthly Transaction shall be determined as the product of: (a) the rate posted on NU's Open Access Same-Time Information System ("OASIS") at the time the service is reserved, not to exceed the NU Companies' Annual Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service divided by twelve (12) months and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such month, expressed in kilowatts.

# 3. <u>Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service For Weekly</u>

## **Transactions**

The Transmission Charge for each month applicable to weekly Transactions shall be the sum of the transmission charges determined for each weekly Transaction during such month. The transmission charge for each weekly Transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Weekly Phase I/II HVDC-TF Firm Point-To-Point Transmission Charge Rate (expressed in dollars per kilowatt week), and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such week (expressed in kilowatts). The NU Companies' Weekly Rate is the NU Companies' Annual Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service divided by fifty two (52) weeks.

# 4. <u>Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service For Daily</u>

## Transactions

The Transmission Charge for each month applicable to daily Transactions will be the sum of the transmission charges determined for each daily Transaction.

The transmission charge for each daily Transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Daily Phase I/II HVDC-TF Firm Point-To-Point Transmission Charge Rate (expressed in dollars per kilowatt-day); and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such day (expressed in kilowatts). The NU Companies' On-Peak Daily Rate is the Companies' Weekly Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service divided by five (5) days. The NU Companies' Off-Peak Daily Rate is the NU Companies' Weekly Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service plus seven (7) days. The total of the charges for daily Transactions, under an individual Reservation, in a seven (7) day period shall not exceed the charges based on the Weekly Rate and the maximum Reserved Capacity in the period.

# 5. <u>Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service For Hourly</u> <u>Transactions</u>

The Transmission Charge for each month applicable to hourly Transactions will be the sum of the transmission charges determined for each hourly Transaction. The transmission charge for each hour of an hourly Transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU System

Companies' Daily Phase I/II HVDC-TF Firm Point-To-Point Transmission Service Rates divided by sixteen (16) hours (expressed in dollars per kilowatt-hour), and (b) the Reserved Capacity as set forth in the Transmission Customer's applicable Reservation for such hour- (expressed in kilowatts). The NU Companies' Hourly On-Peak Rate is equal to the NU Companies' Daily Rate for Phase I/II HVDC-TF Non-Firm Transmission Service divided by sixteen (16) hours. The NU Companies' Hourly Off-Peak Rate is equal to the NU Companies' Daily Rate for Phase I/II HVDC-TF Non-Firm Transmission Service divided by twenty-four (24) hours. The total of the charges for hourly Transactions, under an individual Reservation, in a twenty-four (24) hour period shall not exceed the charges based on the Daily Rate and the maximum Reserved Capacity in the period.

### 6. <u>Credit to the Transmission Charge</u>

Whenever service provided hereunder is interrupted or curtailed by the NU Companies, the Phase I/II HVDC-TF Control Center or the ISO, the Transmission Charges to the Transmission Customer calculated pursuant to Sections A.1 through 5, of this Schedule Phase I/II HVDC-TF-NF shall be credited by an amount equal to the sum of the credits calculated for each hour of interruption or curtailment in service. The credit to the Transmission Customer for each such hour of interruption or curtailment shall be calculated as the product of (i) the applicable equivalent hourly charge for hourly, daily, weekly, or monthly Transactions, and (ii) the kilowatts of service interruption or curtailment during such hour.

# 7. <u>NU Companies' Annual Formula Rate for Phase I/II HVDC-TF Non-Firm Point-To-</u> Point Transmission Service

The NU Companies' Annual Formula Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service shall be expressed in dollars per kilowatt-year and shall be determined in accordance with the rate formula specified in Appendix A of this Schedule Phase I/II HVDC-TF-NF ("Formula Rate"), being applied to the costs recorded on each of the NU Companies' books of account (i.e., FERC Form 1). The Formula Rate shall be determined on the basis of estimated costs for each year until the actual NU Companies' costs for such year are determined. Thereafter, payments made on such estimate shall be recalculated based on actual data for that year, and an appropriate billing adjustment shall be made pursuant to Schedule 20A.

#### 8. <u>Tax Rates and Taxes</u>

The Formula Rate set forth in this Schedule Phase I/II HVDC-TF-NF in effect during a Service Year shall be based on local, state, and federal tax rates and taxes in effect during the prior year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the Formula Rate will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

II. In addition to the applicable charges set forth in Parts I and II of the Tariff, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay NUSCO each month the following additional charges for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service provided during such month.

- A. Taxes and Fees Charge
- B. Regulatory Expenses Charge
- C. Other

#### A. <u>TAXES AND FEES CHARGE</u>

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service provided under the Tariff, not specifically provided for in any of the charge or rate provisions under the Tariff, including any applicable interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

#### **B. REGULATORY EXPENSES**

The NU Companies reserve their rights to make a Section 205 filing for recovery of their costs to administer the Tariff and the Service Agreements.

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule Phase I/II HVDC-TF-NF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE Phase I/II HVDC-TF-NF Appendix A RATES

The NU Companies' Formula Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula.

Formula Rate<sub>i</sub> = 
$$\frac{A_{i-1}-B_{i-1}}{C_{i-1}}$$

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

• A <sub>i-1</sub> is the Annual Cost (expressed in dollars) of the Phase I/II HVDC-TF of the NU Companies for the calendar year prior to the Service Year. The Annual Revenue Requirements are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule Phase I/II HVDC-TF-NF.

• Bi-1 is the actual transmission revenues (expressed in dollars) provided from the provision of transmission services over the Phase I/II HVDC-TF to others. The actual transmission revenues shall be those recorded on the books of the NU Companies in FERC Account Nos. 447 and 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

• Ci-1 is the average of the NU Companies' monthly peak load (expressed in kilowatts of its share of the Phase I/II HVDC-TF of the NU Companies, for the calendar year prior to the Service Year, as reported in FERC Form No. 1.

# SCHEDULE Phase I/II HVDC-TF-NF Appendix A Exhibit I ANNUAL TRANSMISSION REVENUE REQUIREMENTS

The Annual Transmission Cost for the NU Companies' Phase I/II HVDC-TF are the costs assessed by each of them in owning, operating, maintaining, and supporting those facilities, plus any applicable leasing costs and an allocable share of General Plant and other such plant and equipment. These costs shall be computed on a calendar-year basis using costs, from the calendar year prior to the Service Year.

In making such determinations, the provisions of the Uniform System of Accounts prescribed by FERC for Class A and Class B Public Utilities and Licensees shall be controlling. The rate formula for determination of the annual revenue requirements for the Phase I/II HVDC-TF of the NU Companies are determined pursuant this Appendix A of Schedule Phase I/II HVDC-TF-NF, as follows:

A. <u>ANNUAL REVENUE REQUIREMENTS</u> = Sum of each NU Companies' Phase I/II HVDC TF transmission costs-Chester Static VAR Compensator.

#### **SCHEDULE 20A-NU**

#### ATTACHMENT L

#### **Creditworthiness Procedures**

1. General Information – All customers taking any service over the Phase I/II HVDC-TF facilities provided by The Connecticut Light and Power Company, Western Massachusetts Electric Company, and Public Service Company of New Hampshire (the "NU Companies") under Schedule 20A-NU must meet the terms of this Attachment L.

#### 2. Establishing Creditworthiness

a) Each customer's creditworthiness must be established before receiving transmission services from the NU Companies. A customer will be evaluated at the time that its application for transmission service is provided to the NU Companies based on the creditworthiness information required under this Attachment L. The NU Companies shall conduct a credit review of each transmission customer not less than annually or upon reasonable request by the transmission customer.

**b**) The NU Companies will review the customer's creditworthiness information for completeness and will notify the customer if additional information is required.

c) Upon completion of a creditworthiness evaluation of a customer, the NU Companies will forward a written evaluation to the customer if they determine that Financial Assurance must be provided.

**3. Financial Information** – Customers requesting transmission service must submit if available the following:

a) All current rating agency reports of the customer from Standard and Poor's ("S&P"), Moody's Investors Service ("Moody's"), and/or Fitch Ratings ("Fitch").

**b**) A Management Discussion and Analysis ("MD&A") along with audited financial statements provided by an independent registered public accounting firm or a registered independent auditor for the three (3) most recent fiscal years, or the period of the customer's existence, if shorter than three (3) years.

## 4. Creditworthiness – Qualification for Unsecured Credit

a) A customer may receive unsecured credit from the NU Companies equivalent to three (3) months of the transmission charges. The customer must meet at least one of the following criteria:

- (i) If rated, the customer's lowest rating from the three rating agencies on its senior unsecured long-term debt; or if the customer does not have such a rating, then one rating level below the rating then assigned to the customer's corporate credit rating, as follows:
  1. a Standard and Poor's or Fitch rating of at least BBB, or
  2. a Moody's rating of least Baa2.
- (ii) If un-rated or if rated below BBB/Baa2, as described in 4(a)(i) above, the customer must meet all of the following creditworthiness criteria for the three (3) most recent fiscal years:

1. A Capitalization Ratio (Debt divided by the sum of shareholders' equity and Debt) of no more than 60 percent Debt, where "Debt" is defined as the sum of all long-term and short-term debt, preferred securities and capital leases, each of which is recorded in accordance with generally accepted accounting principles;

2. Earnings before interest, taxes, depreciation and amortization ("EBITDA") in the most recent fiscal quarter divided by interest expense (ratio of EBITDA-to-interest expense of at least three (3) times); and

3. Audited Financial Statements with an unqualified audit opinion from an independent registered public accounting firm or a registered independent auditor.

**b**) If the customer relies on the creditworthiness of a parent company, the parent company must satisfy the ratings criteria in Section 4(a) above, and must provide to the NU Companies a written guarantee that it will be unconditionally responsible for all financial obligations associated with the customer's receipt of transmission service from the NU Companies.

c) If the customer or the customer's parent company do not qualify for unsecured credit under Sections 4(a), or (b) above, the customer can still qualify for unsecured credit equivalent to three (3)

months of transmission service charges, if the customer has, on a rolling basis, 12 consecutive months of payments to the NU Companies with no missed, late or defaults in payment.

**5. Financial Assurance** – If the customer does not meet the applicable requirements for unsecured credit set out in Section 4, then the customer must either:

a) pay in advance an amount equal to the lesser of the total charge for transmission service not less than five (5) days in advance of the commencement of service, in which case the NU Companies will pay to the customer interest on the amounts not yet due to the NU Companies, computed in accordance with 18 C.F.R. §35.19(a)(2)(iii) of the Commission's Regulations; or

**b**) obtain Financial Assurance in the form of a letter of credit or a parent guarantee equal to the equivalent of three (3) months of transmission service charges prior to receiving service.

- (i) The letter of credit must be one or more irrevocable, transferable standby letters of credit issued by a United States commercial bank or a United States branch of a foreign bank provided that such customer is not an affiliate of such bank. The issuing bank must have a credit rating of at least A2 from Moody's or an A rating from S&P or Fitch, or an equivalent credit rating by another nationally recognized rating service reasonably acceptable to the NU Companies, provided that such bank shall have assets totaling not less than ten billion dollars (\$10,000,000,000). All costs of the letter of credit shall be borne by the applicant for such letter of credit. In the event of an inconsistency in the ratings by Moody's, S&P, or Fitch, a "split rating", the lowest credit rating shall apply.
- (ii) If the credit rating of a bank or other financial institution issuing a letter of credit to a customer falls below the levels specified in Section 5(b)(i) above, the customer shall have three (3) business days to obtain a suitable letter of credit from another bank or other financial institution that meets the specified levels unless the NU Companies agree in writing to extend such period.

6. **Notifications** - Each customer must inform the NU Companies in writing within three (3) business days of any material change in its or its letter of credit issuer's financial condition, and if the customer qualifies under Section 4(b), that of its parent company. A material change in financial condition may include, without limitation, the following:

- a) change in ownership by way of a merger, acquisition, or substantial sale of assets;
- **b**) downgrade by a recognized major financial rating agency;
- c) placement on credit watch with negative implications by a major financial rating agency;
- d) a bankruptcy filing by the customer or parent;
- e) any action requiring the filing of a SEC Form 8-K;
- f) declaration of or acknowledgement of insolvency;
- g) report of a significant quarterly loss or decline in earnings;
- **h**) resignation of key officer(s); or
- i) issuance of a regulatory order and/or the filing of a lawsuit that could materially adversely impact current or future financial results.

7. **Ongoing Financial Review** – Each customer is required to submit to the NU Companies annually or when issued, as applicable:

a) current rating agency reports;

**b**) audited financial statements from an independent registered public accounting firm or a registered independent auditor; and

c) SEC Forms 10-K and 8-K, promptly upon their filing.

8. **Change in Creditworthiness Status** - A customer who has been extended unsecured credit pursuant to Section 4, must comply with the terms of Financial Assurance in Section 5, if one or more of the following conditions apply:

a) the customer no longer meets the applicable criteria for unsecured credit in Section 4;

- b) the customer exceeds the amount of unsecured credit extended by the NU Companies, in which case Financial Assurance equal to the amount of exceeded unsecured credit must be provided within five (5) business days; or
- c) the customer has missed two or more payments for any of the transmission services provided by the NU Companies in the last twelve (12) months.

## 9. **Procedures for Changes in Credit Levels and Collateral Requirements**

- a) The NU Companies shall issue notice to a customer of any changes to the approved credit levels and/or collateral requirements within five (5) business days after (1) receiving notification of any material changes in financial condition under Section 6 above; (2) receiving the information required for the customer's ongoing financial review listed in Section 7 above; or (3) the occurrence of any of the events leading to a change in creditworthiness requirements listed in Section 8 above.
- b) A customer may submit a written request that the NU Companies provide an explanation of the reasons for the changes in credit levels and/or collateral requirements within five (5) business days after receiving notification of the changes. The NU Companies will provide a written response within five (5) business days after receiving such a request.

10. **Contesting Creditworthiness Determinations** – A customer may contest the NU Companies' determination of its creditworthiness by submitting a written request for re-evaluation within 20 calendar days of being notified of the creditworthiness determination. The request should provide information supporting the basis for a re-evaluation of the customer's creditworthiness. The NU Companies will review the request and respond within 20 calendar days of receipt.

#### 11. Process for Changing Credit Requirements

a) In the event the NU Companies plan to revise the Schedule 20A-NU requirements for credit levels or collateral requirements described in this Attachment L, they will make a filing under Section 205 of the Federal Power Act.

**b**) Following Commission acceptance of such filing and upon the effective date, the NU Companies shall revise their Attachment L and an updated version of Schedule 20A-NU shall be posted to the ISO-NE web site.

c) When the NU Companies change their credit requirements for service under Schedule 20A-NU, the customer is responsible for forwarding updated financial information to the NU Companies. The customer must indicate whether the change affects its ability to meet the requirements of Attachment L. In cases where the customer's credit status has changed, the customer must take the necessary steps to comply with the revised credit requirements of Attachment L by the effective date of the change.

12. **Suspension of Service** - The NU Companies may immediately suspend service (with notification to the Commission) to a customer, and may initiate proceedings with the Commission to terminate service, if the customer does not meet the terms described in Sections 4 through 8 at any time during the term of service or if the customer's payment obligations to the NU Companies exceed the amount of unsecured or secured credit to which it is entitled under this Attachment L. A customer is not obligated to pay for transmission service that is not provided as a result of a suspension of service.

# **SCHEDULE 21 - LOCAL SERVICE**

This Schedule 21 contains the main substantive provisions applicable to Local Service. It includes common PTO rates, terms and conditions for Local Point-to-Point Service and Local Network Service and PTO-specific Local Service Schedules. Retail service is not subject to this Schedule 21 unless specifically provided for in the PTO's Local Service Schedule. The rates, terms and conditions for interconnection service to generators with total generating capacity of greater than 20 MW are set forth in Schedule 22. The rates, terms and conditions for interconnection service to generators with total generating capacity of generators with total generating capacity of 20 MW and less are set forth in Schedule 23. To the extent applicable, the rates, terms and conditions for load interconnections are set forth under the PTO-specific Local Service Schedules.

All Transmission Customers taking Local Service shall be subject to and comply with the rates, terms and conditions of this Schedule 21 as well as any applicable Local Service Schedule. In the event of a conflict between any rate, term or condition in the Tariff and any rate, term or condition in this Schedule 21 and/or an applicable Local Service Schedule, the rate, term or condition in this Schedule 21 and/or the applicable Local Service Schedule shall govern.

The following NAESB WEQ Standards are hereby incorporated by reference in this Schedule 21 to the extent that the requirements therein apply to the PTOs:

- WEQ-000, Abbreviations, Acronyms, and Definition of Terms, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Oct. 4, 2012, Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-001, Open Access Same-Time Information System (OASIS), OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013) excluding Standards 001-9.5, 001-10.5, 001-14.1.3, 001-15.1.2 and 001-106.2.5;
- WEQ-002, Open Access Same-Time Information System (OASIS) Business Practice Standards and Communication Protocols (S&CP), OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-003, Open Access Same-Time Information System (OASIS) Data Dictionary Business Practice Standards, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-004, Coordinate Interchange, WEQ Version 003, July 31, 2012 (as modified by NAESB final actions ratified on December 28, 2012);

- WEQ-005, Area Control Error (ACE) Equation Special Cases, WEQ Version 003, July 31, 2012);
- WEQ-006, Manual Time Error Correction, WEQ Version 003, July 31, 2012;
- WEQ-007, Inadvertent Interchange Payback, WEQ Version 003, July 31, 2012;
- WEQ-008, Transmission Loading Relief (TLR) Eastern Interconnection, WEQ Version 003, July 31, 2012 (with minor corrections applied November 28, 2012);
- WEQ-011, Gas / Electric Coordination, WEQ Version 003, July 31, 2012;
- WEQ-012, Public Key Infrastructure (PKI) WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on October 4, 2012);
- WEQ-013, Open Access Same-Time Information System (OASIS) Implementation Guide, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-015, Measurement and Verification of Wholesale Electricity Demand Response, WEQ Version 003, July 31, 2012;
- WEQ-021, Measurement and Verification of Energy Efficiency Products, WEQ Version 003, July 31, 2012.

The PTOs will perform their functions under this Schedule 21 and the Local Service Schedules in a manner that is not inconsistent with the ISO's provision of regional service, administration of the regional markets, dispatch of resources, and operation of the New England Transmission System for purposes of reliability.

**Pre-Confirmed Request**: Is an OASIS transmission service request that commits the Transmission Customer to take and pay for the requested Local Point-to-Point Service upon acceptance on OASIS by the PTO that can provide the requested Local Point-to-Point Service.

**Pre-RTO Local Service Agreements**<sup>1</sup>: A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Firm or Non-Firm Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of their existing Local Service Agreement that was in effect prior to February 1, 2005

<sup>&</sup>lt;sup>1</sup> LSAs as defined in Section II.1 of the OATT do not include Excepted Transaction Agreements under Attachments G-1, G-2 and G-3 of the OATT.

("Pre-RTO Local Service Agreement" as defined to Section II.1 of the OATT) shall not be required to complete an Application or execute a Local Service Agreement under this Schedule 21. Instead, the Transmission Customer shall contact the associated PTO to discuss and, if appropriate, modify its existing Pre-RTO Local Service Agreement.

A Transmission Customer who wishes to request an alternate Firm Point of Receipt or Point of Delivery or make upgrades (i.e., increase MWs served) beyond the terms of its existing Pre-RTO Local Service Agreement, shall contact the PTO to make arrangements to terminate the Transmission Customer's existing pre-RTO Local Service Agreement and shall complete (and submit to the ISO) an Application for Local Service and then execute a Local Service Agreement under this Schedule 21.

**RTO Local Service Agreements:** For Local Service Agreements with an effective date on or after February 1, 2005 (an "RTO Local Service Agreement" as defined to Section II.1 of the OATT) a Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Non-Firm Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of its existing Local Service Agreement under this Schedule 21, shall not be required to execute a new Local Service Agreement under this Schedule 21, however, modifications to the Transmission Customer's existing Local Service Agreement may be required. Such modifications to an existing Local Service Agreement typically do not require an additional local or regional System Impact Study to be completed. The Transmission Customer shall complete (and submit to the ISO) an application for Local Transmission Service that reflects the requested modifications to the Local Service Agreement to facilitate revision of its existing Schedule 21 Local Service Agreement. A Transmission Customer who wishes to request an alternate Firm Point of Receipt or Point of Delivery or make upgrades (i.e., increase MWs served) beyond the terms of its existing RTO Local Service Agreement, shall contact the ISO to discuss and, if appropriate, terminate the Transmission Customer's existing RTO Local Service Agreement under this Schedule 21 and shall complete (and submit to the ISO) a new Application for Local Service and then execute a new Local Service Agreement under this Schedule 21.

**Reservation Priority For Existing Firm Service Customers**: Existing firm service customers (wholesale requirements and transmission only, with a contract term of five years or more), have the right to continue to take Local Service from the PTO when the contract expires, rolls over or is renewed. This transmission reservation priority is independent of whether the existing customer continues to purchase capacity and energy from the PTO or elects to purchase capacity and energy from another supplier. If at

the end of the contract term, the PTO's Local Network cannot accommodate all of the requests for Local Service, the existing firm service customer must agree to accept a contract term at least equal to a competing request by any new Eligible Customer and to pay the current just and reasonable rate, as approved by the Commission, for such service; provided that, the firm service customer shall have a right of first refusal at the end of such service only if the new contract is for five years or more. The existing firm service customer must provide notice to the PTO whether it will exercise its right of first refusal no less than one year prior to the expiration date of its Local Service Agreement. This transmission reservation priority for existing firm service customers is an ongoing right that may be exercised at the end of all firm contract terms of five years or longer. Local Service Agreements subject to a right of first refusal entered into prior to the date of the PTOs' filing adopting the reformed rollover language herein in compliance with Order No. 890 or associated with a transmission service request received prior to July 13, 2007, unless terminated, will become subject to the five year/one year requirement on the first rollover date after the date of the PTOs' filing adopting the reformed rollover language herein in compliance with Order No. 890; provided that, the one year notice requirement shall apply to such service agreements with five years or more left in their terms as of the date of the PTOs' filing adopting the reformed rollover language herein in compliance with Order No. 890.

FERC: The Federal Energy Regulatory Commission.

**Force Majeure**: Neither the ISO, a Transmission Owner nor a Customer will be considered in default as to any obligation under the Tariff if prevented from fulfilling the obligation due to an event of Force Majeure; provided that no event of Force Majeure affecting any entity shall excuse that entity from making any payment that it is obligated to make hereunder or under a Service Agreement. However, an entity whose performance under the Tariff is hindered by an event of Force Majeure shall make all reasonable efforts to perform its obligations under the Tariff, and shall promptly notify the ISO, the Transmission Owner or the Customer, whichever is appropriate, of the commencement and end of each event of Force Majeure.

**Liability**: The ISO shall not be liable for money damages or other compensation to the Customer for actions or omissions by the ISO in performing its obligations under the Tariff or any Service Agreement thereunder, except to the extent such act or omission by the ISO is found to result from its gross negligence or willful misconduct. A Transmission Owner shall not be liable for money damages or other compensation to the Customer for action or omissions by such Transmission Owner in performing its obligations under the Tariff or any Service Agreement thereunder, except to the extent such act or omissions by such Transmission Owner in performing its obligations under the Tariff or any Service Agreement thereunder, except to the extent such act or

omission by such Transmission Owner is found to result from it gross negligence or willful misconduct. To the extent the Customer has claims against the ISO or a Transmission Owner, the Customer may only look to the assets of the ISO or a Transmission Owner (as the case may be) for the enforcement of such claims and may not seek to enforce any claims against the directors, members, shareholders, officers, employees or agents of the ISO or a Transmission Owner or Affiliate of either who, the Customer acknowledges and agrees, have no personal or other liability for obligations of the ISO or a Transmission Owner or Affiliate of either who, the Customer acknowledges and agrees, have no personal or other liability for obligations of the ISO or a Transmission Owner or Affiliate of either. In no event shall the ISO, a Transmission Owner or any Customer be liable for any incidental, consequential, multiple or punitive damages, loss of revenues or profits, attorneys fees or costs arising out of, or connected in any way with the performance or non-performance under the Tariff or any Service Agreement thereunder. Notwithstanding the foregoing, nothing in this section shall diminish a Customer's obligations under Section I.5.3 of the Tariff or under Schedule 21 of the OATT.

**Indemnification**: Each Customer shall at all times indemnify, defend, and save harmless the ISO and the Transmission Owners and their respective directors, officers, members, employees and agents from any and all damages, losses, claims and liabilities by or to third parties arising out of or resulting from the performance by the ISO or Transmission Owners under the Tariff or any Service Agreement thereunder, any bankruptcy filings made by a Customer, or the actions or omissions of the Customer in connection with the Tariff or any Service Agreement thereunder, except in case of the ISO, gross negligence or willful misconduct by the ISO or its directors, officers, members, employees or agents, and, in the case of a Transmission Owner, the gross negligence or willful misconduct by such Transmission Owner or its directors, officers, members, employees or agents. The amount of any indemnity payment hereunder shall be reduced (including, without limitation, retroactively) by any insurance proceeds or other amounts actually recovered by the indemnified party in respect of the indemnified action, claim, demand, cost, damage or liability. The obligations of each Customer to indemnify the ISO and Transmission Owners shall be several, and not joint or joint and several.

**Interruption**: A reduction in non-firm transmission service due to economic reasons pursuant to Section I. 2 g).

**Local Network Upgrade**: Modifications or additions to the Local Network of a PTO, made in accordance with this Schedule 21, that are not Direct Assignment Facilities.

## I. LOCAL POINT-TO-POINT SERVICE

### Preamble

Eligible Customers seeking Local Point-To-Point Service on a specific Local Network shall refer to the applicable Local Service Schedule to determine any PTO-specific rates, terms, and conditions applicable to such service. Except as otherwise provided in the Local Service Schedules, Firm and Non-Firm Local Point-To-Point Service will be provided pursuant to the rates, terms and conditions set forth below. Local Point-To-Point Service is for the receipt of capacity and/or energy at designated Point(s) of Receipt and the transfer of such capacity and energy to designated Point(s) of Delivery.

A Local Point-To-Point Service Customer is not excused from any requirements of state law, or any order or regulation issued pursuant to state law, to arrange for Local Delivery Service with the PTO and distribution company providing such service and to pay all applicable charges associated with such service, including charges for stranded costs.

### 1) Nature of Firm Local Point-To-Point Service

a) **Term**: The minimum term of Firm Local Point-To-Point Service shall be one day and the maximum term shall be specified in the Local Service Agreement.

b) Reservation Priority: Local Long-Term Firm Point-To-Point Service shall be available on a first-come, first-served basis, i.e., in the chronological sequence in which each Transmission Customer has reserved service. Reservations for Local Short-Term Firm Point-To-Point Service will be conditional based upon the length of the requested transaction. However, Pre-Confirmed Requests for Local Short-Term Point-to-Point Service will receive priority over earlier-submitted requests that are not pre-confirmed and that have equal or shorter duration. Among requests with the same duration and, as relevant, pre-confirmation status (pre-confirmed or not pre-confirmed), priority will be given to a Transmission Customer's request that offers the highest price, followed by the date and time of the request. If the Local Network becomes oversubscribed, requests for service may preempt competing reservations up to the following conditional reservation deadlines: one day before the commencement of daily service, one week before the commencement of weekly service, and one month before the commencement of monthly service. Before the conditional reservation deadline, if available transfer capability is insufficient to satisfy all requests and reservations, a Transmission Customer with a reservation for shorter term service or equal duration service and lower price has the right of first refusal

to match any longer term request or equal duration service with a higher price before losing its reservation priority. A longer term competing request for Local Short-Term Firm Point-To-Point Service will be granted if the Transmission Customer with the right of first refusal does not agree to match the competing request within 24 hours (or earlier if necessary to comply with the scheduling deadlines provided in Section I.1.h of this Schedule 21) from being notified by the PTO of a longer-term competing request for Local Short-Term Firm Point-To-Point Service. When a longer duration request preempts multiple shorter duration reservations, the shorter duration requests shall have simultaneous opportunities to exercise the right of first refusal. Duration, price and time of response will be used to determine the order by which the multiple shorter duration reservations will be able to exercise the right of first refusal. After the conditional reservation deadline, service will commence pursuant to the terms of this Schedule 21. Firm Local Point-To-Point Service will always have a reservation priority over Non-Firm Local Point-To-Point Service will always have a reservation priority over Non-Firm Local Point-To-Point Service will always have a reservation priority over Non-Firm Local Point-To-Point Service will always have a reservation priority over Non-Firm Local Point-To-Point Service will always have a reservation priority over Non-Firm Local Point-To-Point Service will always have a reservation priority over Non-Firm Local Point-To-Point Service will always have a reservation priority over Non-Firm Local Point-To-Point Service will have equal reservation priority with Native Load Customers and Network Customers. Reservation priorities for existing firm service customers are provided in the Local Service Schedules of this Schedule 21.

c) Use of Firm Local Point-to-Point Service by the PTO: The PTO will be subject to the rates, terms and conditions of this Schedule 21 when making Third-Party Sales under agreements executed on or after the effective date of the Tariff. The PTO will maintain separate accounting for any use of the Local Point-To-Point Service to make Third-Party Sales.

d) Service Agreements: After consultation with the PTO, the ISO shall forward a standard form of Local Service Agreement (Attachment A to this Schedule 21) to an Eligible Customer after an Eligible Customer submits a Completed Application for Local Point-To-Point Service to the ISO. Local Service Agreements executed by the Eligible Customer that contain the information required under this Schedule 21 shall also be executed by the PTO and returned to the ISO for execution and filing and/or reporting by the ISO with the Commission in compliance with applicable Commission regulations. An Eligible Customer that uses Local Point-to-Point Service at a Point of Receipt or Point of Delivery that it has not reserved and that has not executed a Local Service Agreement will be deemed, for purposes of assessing any appropriate charges and penalties, to have executed the appropriate Local Service Agreement.

e) Transmission Customer Obligations for Facility Additions Costs: In cases where the PTO, in consultation with the ISO, determines that the Local Network is not capable of providing Firm Local Point-To-Point Service without (1) degrading or impairing the reliability of service to Native Load Customers, Network Customers and other Transmission Customers taking Firm Local Point-To-Point

Service, or (2) interfering with the PTO's ability to meet prior firm contractual commitments to others, the PTO will be obligated to expand or upgrade its Local Network pursuant to the terms of Section I.3.d of this Schedule 21. The Transmission Customer must agree to compensate the PTO for any necessary transmission facility additions pursuant to the terms of Section I.14 of this Schedule 21. Any Local Network Upgrade or Direct Assignment Facilities costs to be charged to the Transmission Customer on an incremental basis under the Tariff will be specified in the Local Service Agreement prior to initiating service.

f) Curtailment of Firm Local Point-To-Point Service: In the event that a Curtailment on the PTO's Local Network, or a portion thereof, is required to maintain reliable operation of such system, Curtailments will be made on a non-discriminatory basis to the transaction(s) that effectively relieve the constraint. If multiple transactions require Curtailment, to the extent practicable and consistent with Good Utility Practice, the PTO will curtail service to Network Customers and Transmission Customers taking Firm Local Point-To-Point Service on a basis comparable to the curtailment of service to the PTO's Native Load Customers. All Curtailments will be made on a non-discriminatory basis, however, Non-Firm Local Point-To-Point Service shall be subordinate to Firm Local Point-To-Point Service and Local Network Service. When the PTO determines that an electrical emergency exists on the Non-PTF and the PTO implements emergency procedures to Curtail Firm Local Service, the Transmission Customer shall make the required reductions upon request of the PTO. The PTO reserves the right to Curtail, in whole or in part, any Local Service when, in the PTO's sole discretion, an emergency or other unforeseen condition impairs or degrades the reliability of its Local Network. The PTO will notify all affected Transmission Customers in a timely manner of any scheduled Curtailments. Penalties for failure to Curtail shall be assessed pursuant to the applicable Local Service Schedule.

### g) Classification of Firm Local Point-To-Point Service:

(i) The Transmission Customer taking Firm Local Point-To-Point Service may (1) change its Receipt and Delivery Points to obtain service on a non-firm basis consistent with the terms of Section I.10.a of this Schedule 21 or (2) request a modification of the Points of Receipt or Delivery on a firm basis pursuant to the terms of Section I.10.b of this Schedule 21.

(ii) The Transmission Customer may purchase transmission service to make sales of capacity and energy from multiple generating units that are on the PTO's Local Network. For such a purchase of transmission service, the resources will be designated as multiple Points of Receipt, unless the multiple generating units are at the same generating plant in which case the units would be treated as a single Point of Receipt.

(iii) The PTO shall provide firm deliveries of capacity and energy from the Point(s) of Receipt to the Point(s) of Delivery. For Long-Term Firm Point-To-Point Service, each Point of Receipt at which firm transfer capability is reserved by the Transmission Customer shall be set forth in the Local Service Agreement along with a corresponding capacity reservation associated with each Point of Receipt. For Short-Term Firm Point-To-Point Service, Points of Receipt and corresponding capacity reservations shall be as mutually agreed upon by the Parties. For Long-Term Firm Point-To-Point Service, each Point of Delivery at which firm transfer capability is reserved by the Transmission Customer shall be set forth in the Service Agreement along with a corresponding capacity reservation associated with each Point of Delivery. For Short-Term Firm Point-To-Point Service, Points of Delivery and corresponding capacity reservations shall be as mutually agreed upon by the Parties. The greater of either (1) the sum of the capacity reservations at the Point(s) of Receipt, or (2) the sum of the capacity reservations at the Point(s) of Delivery shall be the Transmission Customer's Reserved Capacity. The Transmission Customer will be billed for its Reserved Capacity under the terms of the applicable Local Service Schedule. The Transmission Customer may not exceed its firm capacity reserved at each Point of Receipt and each Point of Delivery except as otherwise specified in the applicable Local Service Schedule. The Local Service Schedule shall specify the rate treatment and all related terms and conditions applicable in the event that a Transmission Customer (including Third-Party Sales by the PTO) exceeds its firm reserved capacity at any Point of Receipt or Point of Delivery or uses Local Point-to-Point Service at a Point of Receipt or Point of Delivery that it has not reserved.

h) Scheduling of Firm Local Point-To-Point Service: Schedules for the Transmission Customer's Firm Local Point-To-Point Service must be submitted to the PTO no later than 10:00 a.m. of the day prior to commencement of such service. Schedules submitted after 10:00 a.m. will be accommodated, if practicable. Hour-to-hour schedules of any capacity and energy that is to be delivered must be stated in increments of 10 kW per hour. Transmission Customers within the PTO's service area with multiple requests for Transmission Service at a Point of Receipt, each of which is under 10 kW per hour, may consolidate their service requests at a common point of receipt into units of 10 kW per hour for scheduling and billing purposes. Scheduling changes will be permitted up to twenty (20) minutes before the start of the next clock hour provided that the Delivering Party and Receiving Party also agree to the schedule modification. The PTO will furnish hour-to-hour schedules equal to those furnished by the

Receiving Party (unless reduced for losses) and shall deliver the capacity and energy provided by such schedules. Should the Transmission Customer, Delivering Party or Receiving Party revise or terminate any schedule, such party shall immediately notify the PTO, and the PTO shall have the right to adjust accordingly the schedule for capacity and energy to be received and to be delivered.

#### 2) Nature of Non-Firm Local Point-To-Point Service

a) Term: Non-Firm Local Point-To-Point Service will be available for periods ranging from one (1) hour to one (1) month. However, a purchaser of Non-Firm Local Point-To-Point Service will be entitled to reserve a sequential term of service (such as a sequential monthly term without having to wait for the initial term to expire before requesting another monthly term) so that the total time period for which the reservation applies is greater than one month, subject to the requirements of Section I.6.c of this Schedule 21.

b) **Reservation Priority**: Non-Firm Local Point-To-Point Service shall be available from transfer capability in excess of that needed for reliable service to Native Load Customers, Network Customers, Excepted Transactions and other Transmission Customers taking Local Long-Term and Local Short-Term Firm Point-To-Point Service. Individual Local Service Schedules may contain other applicable services. A higher priority will be assigned first to requests or reservations with a longer duration of service and second to Pre-Confirmed Requests. In the event the Local Network is constrained, competing requests of the same pre-confirmation status and equal duration will be prioritized based on the highest price offered by the Transmission Customer for the Transmission Service, or in the event the price for all Transmission Customers is the same, will be prioritized on a first-come, first-served basis, i.e., in the chronological sequence in which each customer has requested service. Transmission Customers that have already reserved shorter term service have the right of first refusal to match any longer term request before being preempted. A longer term competing request for Non-Firm Local Point-To-Point Service will be granted if the Transmission Customer with the right of first refusal does not agree to match the competing request: (a) immediately for hourly Non-Firm Local Point-To-Point Service after notification by the PTO; and, (b) within 24 hours (or earlier if necessary to comply with the scheduling deadlines provided in Section I.2.f of this Schedule 21) for Non-Firm Local Point-To-Point Service other than hourly transactions after notification by the PTO. Non-Firm Local Point-To-Point Service over secondary Point(s) of Receipt and Point(s) of Delivery will have the lowest reservation priority under the OATT.

c) Use of Non-Firm Local Point-To-Point Service by the PTO: The PTO will be subject to the rates, terms and conditions of this Schedule 21 when making Third-Party Sales under (i) agreements executed on or after the effective date of the Tariff. The PTO will maintain separate accounting for any use of Non-Firm Local Point-To-Point Service to make Third-Party Sales.

d) Service Agreements: After consultation with the PTO, the ISO shall forward a standard form of Local Service Agreement (Attachment A to this Schedule 21) to an Eligible Customer after an Eligible Customer submits a Completed Application for Local Point-To-Point Service to the ISO. Local Service Agreements executed by the Eligible Customer that contain the information required under this Schedule 21 shall also be executed by the PTO and returned to the ISO for execution and filing and/or reporting by the ISO with the Commission in compliance with applicable Commission regulations. An Eligible Customer that uses Local Point-to-Point Service at a Point of Receipt or Point of Delivery that it has not reserved and that has not executed a Local Service Agreement will be deemed, for purposes of assessing any appropriate charges and penalties, to have executed the appropriate Local Service Agreement.

e) Classification of Non-Firm Local Point-To-Point Service: The PTO and the ISO undertake no obligation under the Tariff to plan the Local Network in order to have sufficient capacity for Non-Firm Local Point-To-Point Service. Parties requesting Non-Firm Local Point-To-Point Service for the transmission of firm power do so with the full realization that such service is subject to availability and to Curtailment or Interruption under the terms of the Tariff. The Local Service Schedules shall specify the rate treatment and all related terms and conditions applicable in the event that a Transmission Customer (including Third-Party Sales by the PTO) exceeds its non-firm capacity reservation. Non-Firm Local Point-To-Point Service shall include transmission of energy on an hourly basis and transmission of scheduled short-term capacity and energy on a daily, weekly or monthly basis, but not to exceed one month's reservation for any one Application.

f) Scheduling of Non-Firm Local Point-To-Point Service: Schedules for Non-Firm Local Point-To-Point Service must be submitted to the PTO no later than 2:00 p.m. of the day prior to commencement of such service. Schedules submitted after these times will be accommodated, if practicable. Hour-to-hour schedules of energy that is to be delivered must be stated in increments of 10 kW per hour. Transmission Customers within the PTO's service area with multiple requests for Transmission Service at a Point of Receipt, each of which is under 10 kW per hour, may consolidate their schedules at a common Point of Receipt into units of 10 kW per hour. Scheduling changes will be permitted up to twenty (20) minutes before the start of the next clock hour provided that the Delivering Party and Receiving Party

also agree to the schedule modification. The PTO will furnish hour-to-hour schedules equal to those furnished by the Receiving Party (unless reduced for losses) and shall deliver the capacity and energy provided by such schedules. Should the Transmission Customer, Delivering Party or Receiving Party revise or terminate any schedule, such party shall immediately notify the PTO and the PTO shall have the right to adjust accordingly the schedule for capacity and energy to be received and to be delivered.

Curtailment or Interruption of Service: The PTO reserves the right to Curtail, in whole or in g) part, Non-Firm Local Point-To-Point Service provided under the Tariff for reliability reasons when, an emergency or other unforeseen condition threatens to impair or degrade the reliability of the Local Network. The PTO reserves the right to Interrupt, in whole or in part, Non-Firm Local Point-To-Point Service provided under the Tariff for economic reasons in order to accommodate (1) a request for Firm Local Transmission Service, (2) a request for Non-Firm Local Point-To-Point Service of greater duration, (3) a request for Non-Firm Local Point-To-Point Service of equal duration with a higher price, or (4) transmission service for Network Customers from non-designated resources. The PTO also will discontinue or reduce service to the Transmission Customer to the extent that deliveries for transmission are discontinued or reduced at the Point(s) of Receipt. Where required, Curtailments or Interruptions will be made on a non-discriminatory basis to the transaction(s) that effectively relieve the constraint, however, Non-Firm Local Point-To-Point Service shall be subordinate to Firm Local Transmission Service. If multiple transactions require Curtailment or Interruption, to the extent practicable and consistent with Good Utility Practice, Curtailments or Interruptions will be made to transactions of the shortest term (e.g., hourly non-firm transactions will be Curtailed or Interrupted before daily non-firm transactions and daily non-firm transactions will be Curtailed or Interrupted before weekly non-firm transactions). Transmission service for Network Customers from resources other than designated Network Resources will have a higher priority than any Non-Firm Local Point-To-Point Service under the Tariff. Non-Firm Local Point-To-Point Service over secondary Point(s) of Receipt and Point(s) of Delivery will have a lower priority than any Non-Firm Local Point-To-Point Service under the Tariff. The PTO will provide advance notice of Curtailment or Interruption where such notice can be provided consistent with Good Utility Practice and in accordance with the applicable Local Service Schedule. Penalties for failure to Curtail or Interrupt shall be assessed pursuant to the applicable Local Service Schedule.

### 3) Service Availability

a) General Conditions: The PTO will provide Firm Local and Non-Firm Local Point-To-Point Service to any Transmission Customer that has met the requirements of Section I.4 of this Schedule 21.

b) **Determination of Available Transfer Capability**: The PTO shall determine available transfer capability in accordance with its respective Attachment setting forth its Methodology to Assess Available Transfer Capability.

c) Initiating Service in the Absence of an Executed Service Agreement: If the PTO and the Transmission Customer requesting Firm Local or Non-Firm Local Point-To-Point Service cannot agree on all of the terms and conditions of the Local Service Agreement, the ISO shall file with the Commission, within thirty (30) days after the date the Transmission Customer provides written notification to both the PTO and the ISO directing the ISO to file, an unexecuted Local Service Agreement containing terms and conditions deemed by the PTO (in consultation with the ISO) to be appropriate for such requested service. The PTO shall commence providing Transmission Service subject to the Transmission Customer agreeing to (i) compensate the PTO at whatever rate the Commission ultimately determines to be just and reasonable, and (ii) comply with the terms and conditions of the Tariff including posting appropriate security deposits in accordance with the terms of Section I.5.c of this Schedule 21.

d) Obligation to Provide Transmission Service that Requires Expansion or Modification of the Local Network: If the PTO, in consultation with the ISO, determines that a Completed Application for Firm Local Point-To-Point Service cannot be accommodated because of insufficient capability on the Local Network, the PTO will use due diligence to expand or modify its Local Network to provide the requested Firm Local Point-To-Point Service, consistent with its planning obligations in Attachment K, provided the Transmission Customer agrees to compensate the PTO for such costs. The PTO, in consultation with the ISO, will conform to Good Utility Practice and its planning obligations in Attachment K, in determining the need for new facilities and in the design and construction of such facilities. The obligation of the PTO to expand or modify its Local Network obligation to provide the requested Firm Local Point-To-Point Service applies only to those facilities that the PTO has the right to expand or modify.

e) **Deferral of Service**: The PTO may defer providing service until it completes construction of new transmission facilities or upgrades needed to provide Firm Local Point-To-Point Service whenever

the PTO determines that providing the requested service would, without such new facilities or upgrades, impair or degrade reliability to any existing firm services.

**f) Other Transmission Service Schedules**: Eligible Customers receiving transmission service under other agreements on file with the Commission may continue to receive transmission service under those agreements until such time as those agreements may be modified by the Commission.

**g) Real Power Losses**: "Real Power Losses" those losses associated with transmission service as determined in accordance with Section 15.3, Section 31.6 and Schedule 21 of the OATT. Neither the ISO nor the PTOs are obligated to provide Real Power Losses. Non-PTF Real Power Losses shall be calculated and charged for in accordance with the applicable Schedule 21 Local Service Schedule.

**h**) **Load Shedding**: Load Shedding shall occur in accordance with the applicable Local Service Schedule to the extent provided for in such Local Service Schedule.

## 4) Transmission Customer Responsibilities

a) Conditions Required of Transmission Customers: Firm Local and Non-Firm Local Point-To-Point Service shall be provided only if the following conditions are satisfied by the Transmission Customer:

(i) The Transmission Customer has pending a Completed Application for service;

(ii) The Transmission Customer meets the creditworthiness procedures in Attachment L to the applicable PTO's Local Service Schedule;

(iii) The Transmission Customer will have arrangements in place for any other transmission service necessary to effect the delivery from the generating source to the PTO prior to the time service commences;

(iv) The Transmission Customer agrees to pay for any facilities constructed and chargeable to such Transmission Customer, whether or not the Transmission Customer takes service for the full term of its reservation;

(v) The Transmission Customer provides the information required by the PTO's planning process established in Attachment K; and

(vi) The Transmission Customer has executed a Local Service Agreement or has requested the filing of an unexecuted Local Service Agreement pursuant to Section I.3.c of this Schedule 21.

b) Transmission Customer Responsibility for Third-Party Arrangements: Any scheduling arrangements that may be required by other electric systems shall be the responsibility of the Eligible Customer requesting service. The Transmission Customer shall provide, unless waived by the ISO and the PTO, notification to the ISO and the PTO identifying such systems and authorizing them to schedule the capacity and energy to be transmitted pursuant to this Schedule 21 on behalf of the Receiving Party at the Point of Delivery or the Delivering Party at the Point of Receipt. However, the ISO and the PTO will undertake reasonable efforts to assist the Transmission Customer in making such arrangements, including without limitation, providing any information or data required by such other electric system pursuant to Good Utility Practice.

## 5) Procedures for Arranging Firm Local Point-To-Point Service

### a) Pre-RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, or make upgrades (i.e., increase MWs served) within the terms of its existing Firm Local Point-to-Point Service Agreement that is in effect prior to February 1, 2005 ("Pre-RTO Local Service Agreement"), shall not be required to complete an Application or execute a Local Service Agreement under this Schedule 21, however, modifications to the existing Firm Local Point-to-Point Service Agreement may be required. Instead, the Transmission Customer shall contact the associated PTO to discuss and, if appropriate, modify its existing Firm Local Point-to-Point Service Agreement.

(ii) A Transmission Customer who wishes to request an alternate Firm Point of Receipt or Point of Delivery or make upgrades (i.e., increase MWs served) beyond the terms of its existing Firm Local Point-to-Point Service Agreement, shall contact the PTO to make arrangements to terminate the Transmission Customer's existing Local Service Agreement and shall complete (and submit to the ISO) an Application for Local Service and then execute a Local Service Agreement under this Schedule 21.

## b) RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, or make upgrades (i.e., increase MWs served) within the terms of the existing Firm Local Point-to-Point Service Agreement under this Schedule 21, shall not be required to execute a Local Service Agreement under this Schedule 21, however, modifications to the existing Firm Local Point-to-Point Service Agreement under this Schedule 21 may be required. Such modifications to an existing Local Service Agreement typically do not require an additional local or regional System Impact Study to be completed. The Transmission Customer shall complete (and submit to the ISO) an application for Local Transmission Service that reflects the requested modifications to the Local Service Agreement to facilitate revision of its existing Schedule 21 Local Service Agreement.

(ii) Transmission Customers who wish to request an alternate Firm Point of Receipt or Point of Delivery or make upgrades (i.e., increase MWs served) beyond the terms of the existing Firm Local Point-to-Point Service Agreement under this Schedule 21, shall contact the ISO to discuss and, if appropriate, terminate the Transmission Customer's existing Local Service Agreement under this Schedule 21 and shall complete (and submit to the ISO) an Application for Local Service and then execute a new Local Service Agreement under this Schedule 21.

c) Application: A request for Firm Local Point-To-Point Service for periods of one year or longer must be made in a completed Application submitted to the ISO at least sixty (60) days in advance of the calendar month in which service is to commence. The PTO will consider requests for such firm service on shorter notice when feasible. Requests for firm service for periods of less than one year shall be subject to expedited procedures that shall be negotiated between the PTO and the Eligible Customer within the time constraints provided in the applicable Local Service Schedule. A Completed Application may be submitted by transmitting the required information to the ISO by telefax. This method will provide a time-stamped record for establishing the priority of the Application.

**d**) **Completed Application**: A Completed Application shall provide all of the information included in 18 C.F.R. § 2.20 including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

(ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under the Tariff;

(iii) The location of the Point(s) of Receipt and Point(s) of Delivery and the identities of the Delivering Parties and the Receiving Parties;

(iv) The location of the generating facility(ies) supplying the capacity and energy and the location of the load ultimately served by the capacity and energy transmitted. The ISO and the PTO will treat this information as confidential except to the extent that disclosure of this information is required by the Tariff, by regulatory or judicial order, for reliability purposes pursuant to Good Utility Practice or pursuant to the Information Policy;

(v) A description of the supply characteristics of the capacity and energy to be delivered;

(vi) An estimate of the capacity and energy expected to be delivered to the Receiving Party;

(vii) The Service Commencement Date and the term of the requested Transmission Service;

(viii) The transmission capacity requested for each Point of Receipt and each Point of Delivery on the PTO's Local Network; customers may combine their requests for service in order to satisfy the minimum transmission capacity requirement;

(ix) A statement indicating that if the Transmission Customer submits a Pre-Confirmed Request, then the Transmission Customer will take and pay for the requested Local Service upon acceptance on OASIS by the PTO that can provide the requested Local Service; and

(x) Any additional information required by the PTO's planning process established in Attachment K.

The ISO and the PTO shall treat this information consistent with the standards of conduct contained in Part 37 of the Commission's regulations.

e) **Deposit**: Except as is otherwise provided in the Local Service Schedule, a Completed Application for Firm Local Point-To-Point Service also shall include a deposit of either one month's charge for Reserved Capacity or the full charge for Reserved Capacity for service requests of less than one month. If the Application is rejected because it does not meet the conditions for service as set forth herein, in the Local Service Schedule or, in the case of requests for service arising in connection with losing bidders, in a Request For Proposals (RFP), said deposit shall be returned with interest less any reasonable costs incurred by the PTO in connection with the review of the losing bidder's Application. The deposit also will be returned with interest less any reasonable costs incurred by the PTO if the PTO is unable to complete new facilities needed to provide the service. If an Application is withdrawn or the Eligible Customer decides not to enter into a Local Service Agreement for Firm Local Point-To-Point Service, the deposit shall be refunded in full, with interest, less reasonable costs incurred by the PTO to the extent such costs have not already been recovered by the PTO from the Eligible Customer. The PTO will provide to the Eligible Customer a complete accounting of all costs deducted from the refunded deposit, which the Eligible Customer may contest if there is a dispute concerning the deducted costs. Deposits associated with construction of new facilities are subject to the provisions of Section I.5.c of this Schedule 21. If a Local Service Agreement for Firm Local Point-To-Point Service is executed, the deposit, with interest, will be returned to the Transmission Customer upon expiration or termination of the Local Service Agreement. Applicable interest shall be computed in accordance with the Commission's regulations at 18 C.F.R. § 35.19a(a)(2)(iii), and shall be calculated from the day the deposit check is credited to the PTO's account.

**f**) **Notice of Deficient Application**: If an Application fails to meet the requirements of the Tariff, the PTO shall notify the ISO within ten (10) days of the Application's receipt of the reasons for such failure, and the ISO shall, in turn, so notify the entity requesting service within five (5) days of the receipt of notice from the PTO of the reasons for such failure. The PTO will attempt to remedy minor deficiencies in the Application through informal communications with the Eligible Customer. If such efforts are unsuccessful, the ISO shall return the Application. The PTO shall return any deposit, with interest, to the Eligible Customer. Upon receipt of a new or revised Application that fully complies with the requirements of this Schedule 21, the Eligible Customer shall be assigned a new priority consistent with the date of the new or revised Application.

**g) Response to a Completed Application**: Following receipt of a Completed Application for Firm Local Point-To-Point Service, the PTO shall make a determination of available transfer capability as required in Section I.3.b of this Schedule 21. Within twenty-five (25) days after the date of receipt of a Completed Application, the PTO shall notify the ISO either (i) if it will be able to provide service without performing a System Impact Study or (ii) if such a study is needed to evaluate the impact of the Application. The ISO shall so notify the Eligible Customer within five (5) days of the ISO's receipt of such notice from the PTO. Responses by the PTO and the ISO must be made as soon as practicable to all Completed Applications and the timing of such responses must be made on a non-discriminatory basis.

h) Execution of Service Agreement: Whenever the PTO, in consultation with the ISO, determines that a System Impact Study is not required and that the service can be provided, it shall notify the Eligible Customer as soon as practicable but no later than thirty (30) days after receipt of the Completed Application. Where a System Impact Study is required, the provisions of Section I.7 of this Schedule 21 will govern the execution of a Local Service Agreement. Failure of an Eligible Customer to execute and return the Local Service Agreement or request the filing of an unexecuted service agreement pursuant to Section I.3.c of this Schedule 21 within fifteen (15) days after the Local Service Agreement is tendered will be deemed a withdrawal and termination of the Application and any deposit submitted shall be refunded with interest. Nothing herein limits the right of an Eligible Customer to file another Application after such withdrawal and termination.

i) Extensions for Commencement of Service: The Transmission Customer can obtain, subject to availability, up to five (5) one-year extensions for the commencement of service. The Transmission Customer may postpone service by paying to the PTO a non-refundable annual reservation fee equal to one-month's charge for Firm Local Point-To-Point Service for each year or fraction thereof within 15 days of notifying the PTO it intends to extend the commencement of service. If during any extension for the commencement of service an Eligible Customer submits a Completed Application for Firm Local Point-To-Point Service, and such request can be satisfied only by releasing all or part of the Transmission Customer's Reserved Capacity, the original Reserved Capacity will be released unless the following condition is satisfied. Within thirty (30) days, the original Transmission Customer agrees to pay the rate for its Reserved Capacity concurrent with the new Service Commencement Date. In the event the Transmission Customer elects to release the Reserved Capacity, the reservation fees or portions thereof previously paid will be forfeited.

### 6) Procedures for Arranging Non-Firm Local Point-To-Point Service

### a) **Pre-RTO Local Service Agreements**

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Non-Firm Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of their existing Non-Firm Local Point-to-Point Service Agreement that is in effect prior to February 1, 2005 ("Pre-RTO Local Service Agreement"), shall not be required to complete an Application or execute a Local Service Agreement under this Schedule 21, however, modifications to the existing Non-Firm Local Point-to-Point Service Agreement may be required. The Transmission Customer shall contact the associated PTO to discuss and, if appropriate, modify the existing Non-Firm Local Point-to-Point Service Agreement.

(ii) A Transmission Customer who wishes to make upgrades (i.e., increase MWs served) beyond the terms of its existing Non-Firm Local Point-to-Point Service Agreement that is in effect prior February 1, 2005 ("Pre-RTO Local Service Agreement"), shall contact the PTO to make arrangements to terminate the Transmission Customer's existing Local Service Agreement and shall complete (and submit to the ISO) an Application for Local Service and then execute a Local Service Agreement under this Schedule 21.

### b) RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Non-Firm Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of the existing Non-Firm Local Point-to-Point Service Agreement under this Schedule 21, shall not be required to execute a new Local Service Agreement under this Schedule 21, however, modifications to the existing Non-Firm Local Point-to-Point Service Agreement under this Schedule 21 may be required.

Such modifications to an existing Local Service Agreement typically do not require an additional local or regional System Impact Study to be completed. The Transmission Customer shall complete (and submit to the ISO) an application for Local Transmission Service that reflects the

requested modifications to the Local Service Agreement to facilitate revision of its existing Non-Firm Local Point-to-Point Service Agreement under this Schedule 21.

(ii) A Transmission Customer who wishes to request an upgrade (i.e., increase MWs served) beyond the terms of the existing Non-Firm Local Point-to-Point Service Agreement under this Schedule 21, shall contact the ISO to discuss and, if appropriate, terminate the Transmission Customer's existing Local Service Agreement under this Schedule 21 and shall complete (and submit to the ISO) a new Application for Local Service and then execute a new Local Service Agreement under this Schedule 21.

c) Application: Eligible Customers seeking Non-Firm Local Point-To-Point Service must submit a Completed Application to the ISO. A Completed Application may be submitted by transmitting the required information to the ISO by telefax. This method will provide a time-stamped record for establishing the service priority of the Application.

**d**) **Completed Application**: A Completed Application shall provide all of the information included in 18 C.F.R. § 2.20 including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

(ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under the Tariff;

(iii) The Point(s) of Receipt and the Point(s) of Delivery;

(iv) The maximum amount of capacity requested at each Point of Receipt and Point of Delivery; and

(v) The proposed dates and hours for initiating and terminating transmission service hereunder.

In addition to the information specified above, when required to properly evaluate system conditions, the ISO and the PTO also may ask the Transmission Customer to provide the following:

(vi) The electrical location of the initial source of the power to be transmitted pursuant to the Transmission Customer's request for service;

(vii) The electrical location of the ultimate load; and

(viii) A statement indicating that if the Transmission Customer submits a Pre-Confirmed Request, then the Transmission Customer will take and pay for the requested Local Point-to-Point Service upon acceptance on OASIS by the PTO that can provide the requested Local Service.

The ISO and the PTO will treat this information in (vi) and (vii) as confidential at the request of the Transmission Customer except to the extent that disclosure of this information is required by the Tariff, by regulatory or judicial order, for reliability purposes pursuant to Good Utility Practice, or pursuant to the ISO New England Information Policy. The ISO and the PTO shall treat this information consistent with the standards of conduct contained in Part 37 of the Commission's regulations.

e) Reservation of Non-Firm Local Point-To-Point Service: Requests for monthly service shall be submitted no earlier than sixty (60) days before service is to commence; requests for weekly service shall be submitted no earlier than fourteen (14) days before service is to commence, requests for daily service shall be submitted no earlier than two (2) days before service is to commence, and requests for hourly service shall be submitted no earlier than noon the day before service is to commence. Requests for service received later than 2:00 p.m. prior to the day service is scheduled to commence will be accommodated if practicable.

**f**) **Determination of Available Transfer Capability**: The PTO shall determine available transfer capability in accordance with its respective Attachment setting forth its Methodology to Assess Available Transfer Capability.

## 7) Additional Study Procedures For Firm Local Point-To-Point Service Requests

a) Notice of Need for System Impact Study: After receiving a request for Firm Local Point-To-Point Service, a determination shall be made on a non-discriminatory basis as to whether a System Impact Study is needed. The ISO shall review the request to determine whether the provision of the requested service would have an impact on facilities other than Non-PTF, and if so, whether a System Impact Study is necessary to accommodate the requested service. If so, the ISO shall so inform the Eligible Customer as soon as practicable and will (in consultation with the PTO) perform a System Impact Study, as necessary, with respect to the request. A description of the ISO's methodology for completing a System Impact Study is provided in OATT Attachment D. If the ISO determines that the service would not have an impact on facilities other than Non-PTF, the PTO shall determine whether a System Impact Study is necessary to accommodate the requested service and shall so inform the Eligible Customer as soon as practicable and will (in consultation with the ISO) perform a System Impact Study, as necessary, with respect to the application. In such cases, the ISO or the PTO, as applicable, shall within thirty (30) days of receipt of a Completed Application, tender a System Impact Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the ISO or the PTO, as applicable, for performing the required System Impact Study. For a service request to remain a Completed Application, the Eligible Customer shall execute the System Impact Study Agreement and return it to the ISO or the PTO, as applicable, within fifteen (15) days. If the Eligible Customer elects not to execute the System Impact Study Agreement, its Application shall be deemed withdrawn and its deposit, pursuant to Section I.5.c of this Schedule 21, shall be returned with interest. A description of the PTO's methodology for completing a System Impact Study is provided in its Local Service Schedules.

### b) System Impact Study Agreement and Cost Reimbursement:

(i) The System Impact Study Agreement will clearly specify an estimate of the cost and time for completion of the System Impact Study. The charge shall not exceed the actual cost of the study. The System Impact Study shall rely on existing transmission planning studies to the extent reasonably practicable. The Eligible Customer will not be assessed a charge for such existing studies; however, the Eligible Customer will be responsible for charges associated with any modifications to existing planning studies that are reasonably necessary to evaluate the impact of the Eligible Customer's request for service on the Local Network.

(ii) If in response to multiple Eligible Customers requesting service in relation to the same competitive solicitation, a single System Impact Study is sufficient to accommodate the requests for service, the costs of that study shall be pro-rated among the Eligible Customers.

(iii) For System Impact Studies that the PTO conducts on its own behalf, the PTO shall record the cost of the System Impact Studies pursuant to Section II.8.5 of the Tariff.

(iv) In response to multiple Eligible Customers within the same geographical or electrically interconnected area requesting that a System Impact Study for Local Service be clustered, the PTO will cluster such multiple requests if it can reasonably do so. The costs of that study shall be divided equally among the Eligible Customers, unless otherwise agreed to by the PTO and the Eligible Customers.

(v) Once a clustered study is initiated by the PTO, as evidenced by an executed System Impact Study Agreement, Eligible Customers opting out of a clustered study regarding Non-PTF facilities shall be liable for their share of the study costs as set forth in Section 7(b)(iv) above, unless otherwise agreed to by the parties to such System Impact Study Agreement.

c) System Impact Study Procedures: Upon receipt of an executed System Impact Study Agreement, the ISO or the PTO, as applicable, will use due diligence to complete the required System Impact Study within a sixty (60) day period. The System Impact Study shall identify any system constraints identified with specificity by a transmission element or flowgate, and additional Direct Assignment Facilities or Local Network Upgrades required to provide the requested service. In the event that the ISO or the PTO, as applicable, is unable to complete the required System Impact Study within such time period, it shall so notify the Eligible Customer and provide an estimated completion date along with an explanation of the reasons why additional time is required to complete the required studies. A copy of the completed System Impact Study and related work papers shall be made available to the Eligible Customer as soon as the System Impact Study is complete. The PTO will use the same due diligence in completing the System Impact Study for an Eligible Customer as it uses when completing studies for itself. The ISO or the PTO, as applicable, shall notify the Eligible Customer immediately upon completion of the System Impact Study if the Local Network will be adequate to accommodate all or part of a request for service or that no costs are likely to be incurred for new transmission facilities or upgrades. In order for a request to remain a Completed Application, within fifteen (15) days of completion of the System Impact Study, the Eligible Customer must execute a Local Service Agreement or request the filing of an unexecuted Local Service Agreement pursuant to Section I.3.c of this Schedule 21 or the Application shall be deemed terminated and withdrawn.

d) **Facilities Study Procedures**: If a System Impact Study indicates that additions or upgrades to facilities other than Non-PTF are needed to supply the Eligible Customer's service request or to mitigate indirect impacts on the MTF facilities, the ISO, within thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study Agreement pursuant to which the

Eligible Customer shall agree to reimburse the ISO for performing the required Facilities Study. If a System Impact Study indicates that additions or upgrades to Non-PTF facilities are needed to supply the Eligible Customer's service request or to mitigate indirect impacts on facilities other than Non-PTF, the PTO, within thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the PTO for performing the required Facilities Study. For clustered studies, the cost of such studies shall be divided equally among the Eligible Customers, unless otherwise agreed to by the PTO and the Eligible Customers. Once a clustered study is initiated by the PTO, as evidenced by an executed Facilities Study Agreement, Eligible Customers opting out of a clustered study regarding Non-PTF facilities shall be liable for their share of the study costs as set forth in this Section 7(d) above, unless otherwise agreed to by the parties to such Facilities Study Agreement. For a service request to remain a Completed Application, the Eligible Customer shall execute the Facilities Study Agreement and return it within fifteen (15) days. If the Eligible Customer elects not to execute the Facilities Study Agreement, its Application shall be deemed withdrawn and its deposit, pursuant to Section I.5.c of this Schedule 21, shall be returned with interest. Upon receipt of an executed Facilities Study Agreement, the ISO or the PTO, as applicable, will use due diligence to complete the required Facilities Study within a sixty (60) day period. If the Facilities Study cannot be completed in the allotted time period, the Transmission Customer shall be notified and provided an estimate of the time needed to reach a final determination along with an explanation of the reasons that additional time is required to complete the study. When completed, the Facilities Study will include a good faith estimate of (i) the cost of Direct Assignment Facilities to be charged to the Transmission Customer, (ii) the Transmission Customer's appropriate share of the cost of any required Local Network Upgrades, and (iii) the time required to complete such construction and initiate the requested service. The Transmission Customer shall provide a letter of credit or other reasonable form of security acceptable to the PTO equivalent to the costs of new facilities or upgrades consistent with commercial practices as established by the Uniform Commercial Code. The Transmission Customer shall have thirty (30) days to execute a Local Service Agreement or request the filing of an unexecuted Local Service Agreement and provide the required letter of credit or other form of security or the request will no longer be a Completed Application and shall be deemed terminated and withdrawn.

e) Facilities Study Modifications: Any change in design arising from the inability to site or construct facilities as proposed will require development of a revised good faith estimate. New good faith estimates also will be required in the event of new statutory or regulatory requirements that are effective before the completion of construction or other circumstances beyond the control of the ISO and/or the

PTO that significantly affect the final cost of new facilities or upgrades to be charged to the Transmission Customer.

**f) Due Diligence in Completing New Facilities**: The PTO shall use due diligence to add necessary facilities or upgrade its Local Network within a reasonable time. The PTO will not upgrade its existing or planned Local Network in order to provide the requested Firm Local Point-To-Point Service if doing so would impair system reliability or otherwise impair or degrade existing firm service.

**g) Partial Interim Service**: If the PTO determines that it will not have adequate transfer capability to satisfy the full amount of a Completed Application for Firm Local Point-To-Point Service, the PTO nonetheless shall be obligated to offer and provide the portion of the requested Firm Local Point-To-Point Service that can be accommodated without addition of any facilities. However, the PTO shall not be obligated to provide the incremental amount of requested Firm Local Point-To-Point Service that requires the addition of facilities or upgrades to the Local Network until such facilities or upgrades have been placed in service.

h) Expedited Procedures for New Facilities: In lieu of the procedures set forth above, the Eligible Customer shall have the option to expedite the process by requesting the ISO (in consultation with the PTO) to tender at one time, together with the results of required studies, an "Expedited Local Service Agreement" pursuant to which the Eligible Customer would agree to compensate the PTO for all costs incurred. In order to exercise this option, the Eligible Customer shall request in writing an expedited Local Service Agreement covering all of the above-specified items within thirty (30) days of receiving the results of the System Impact Study identifying needed facility additions or upgrades or costs incurred in providing the requested service. While the PTO agrees to provide the Eligible Customer with its best estimate of the new facility costs and other charges that may be incurred, such estimate shall not be binding and the Eligible Customer must agree in writing to compensate the PTO for all costs incurred. The Eligible Customer shall execute and return such an Expedited Local Service Agreement within fifteen (15) days of its receipt or the Eligible Customer's request for service will cease to be a Completed Application and will be deemed terminated and withdrawn.

Penalties for Failure to Meet Study Deadlines: Sections I.7.c and I.7.d of this Schedule 21 require a Transmission Provider to use due diligence to meet 60-day study completion deadlines for System Impact Studies and Facilities Studies.

(i) The PTO is required to file a notice with the Commission in the event that more than twenty (20) percent of non-Affiliates' System Impact Studies and Facilities Studies completed by the PTO in any two consecutive calendar quarters are not completed within the 60-day study completion deadlines. Such notice must be filed within thirty (30) days of the end of the calendar quarter triggering the notice requirement.

(ii) For the purposes of calculating the percent of non-Affiliates' System Impact Studies and Facilities Studies processed outside of the 60-day study completion deadlines, the PTO shall consider all System Impact Studies and Facilities Studies that it completes for non-Affiliates during the calendar quarter. The percentage should be calculated by dividing the number of those studies which are completed on time by the total number of completed studies. The PTO may provide an explanation in its notification filing to the Commission if it believes there are extenuating circumstances that prevented it from meeting the 60-day study completion deadlines.

(iii) The PTO is subject to an operational penalty if it completes ten (10) percent or more of non-Affiliates' System Impact Studies and Facilities Studies outside of the 60-day study completion deadlines for each of the two calendar quarters immediately following the quarter that triggered its notification filing to the Commission. The operational penalty will be assessed for each calendar quarter for which an operational penalty applies, starting with the calendar quarter immediately following the quarter that triggered the PTO's notification filing to the Commission. The operational penalty will continue to be assessed each quarter until the PTO completes at least ninety (90) percent of all non-Affiliates' System Impact Studies and Facilities Studies within the 60-day deadline.

(iv) For penalties assessed in accordance with subsection (iii) above, the penalty amount for each System Impact Study or Facilities Study shall be equal to \$500 for each day the PTO takes to complete that study beyond the 60-day deadline.

**j) Claims or Disputes**: Any claim or dispute between the PTO and the Transmission Customer with respect to a System Impact Study or Facilities Study shall be governed by the provisions of Section I.6 of the Tariff.

# 8) Procedures if The PTO is Unable to Complete New Transmission Facilities for Firm Local Point-To-Point Service

a) Delays in Construction of New Facilities: If any event occurs that will materially affect the time for completion of new facilities, or the ability to complete them, the PTO shall promptly notify the Transmission Customer. In such circumstances, the PTO shall within, thirty (30) days of notifying the Transmission Customer of such delays, convene a technical meeting with the Transmission Customer to evaluate the alternatives available to the Transmission Customer. The PTO also shall make available to the Transmission Customer studies and work papers related to the delay, including all information that is in the possession of the PTO that is reasonably needed by the Transmission Customer to evaluate any alternatives.

b) Alternatives to the Original Facility Additions: When the review process of Section I.8.a of this Schedule 21 determines that one or more alternatives exist to the originally planned construction project, the PTO shall present such alternatives for consideration by the Transmission Customer. If, upon review of any alternatives, the Transmission Customer desires to maintain its Completed Application subject to construction of the alternative facilities, it may request that the ISO file a revised Local Service Agreement for Firm Local Point-To-Point Service. If the alternative approach solely involves Non-Firm Local Point-To-Point Service, the PTO shall so inform the ISO, and the ISO (in consultation with the PTO) shall thereafter promptly tender to the Transmission Customer a Local Service Agreement for Non-Firm Local Point-To-Point Service providing for the service. In the event the PTO concludes that no reasonable alternative exists and the Transmission Customer disagrees, the Transmission Customer may seek relief under the dispute resolution procedures of Section I.6 of the Tariff.

c) Refund Obligation for Unfinished Facility Additions: If the PTO and the Transmission Customer mutually agree that no other reasonable alternatives exist and the requested Firm Local Point-To-Point Service cannot be provided out of existing capability, the obligation to provide the requested service shall terminate and any deposit made by the Transmission Customer shall be returned with interest pursuant to Commission regulations 35.19a(a)(2)(iii). However, the Transmission Customer shall be responsible for all prudently incurred costs by the ISO and the PTO through the time construction was suspended, including costs for removal of unfinished facilities and any ongoing operating expenses of the unfinished facilities until they are removed.

# 9) Provisions Relating to Transmission Construction and Services on the Systems of Other Utilities

a) **Responsibility for Third-Party System Additions**: The PTO shall not be responsible for making arrangements for any necessary engineering, permitting, and construction of transmission or distribution facilities on the system(s) of any other entity or for obtaining any regulatory approval for such facilities. The PTO will undertake reasonable efforts to assist the Transmission Customer in obtaining such arrangements, including without limitation, providing any information or data required by such other electric system pursuant to Good Utility Practice.

b) Coordination of Third-Party System Additions: In circumstances where the need for transmission facilities or upgrades is identified, and if such upgrades further require the addition of transmission facilities on other systems, the PTO shall have the right to coordinate construction on its own system with the construction required by others. The PTO, after consultation with the Transmission Customer and representatives of such other systems, may defer construction of its new transmission facilities, if the new transmission facilities on another system cannot be completed in a timely manner. The PTO shall notify the Transmission Customer in writing of the basis for any decision to defer construction and the specific problems which must be resolved before it will initiate or resume construction of new facilities. Within sixty (60) days of receiving written notification by the PTO of its intent to defer construction, the Transmission Customer may challenge the decision in accordance with Section I.6 of the Tariff.

## 10) Changes in Service Specifications

a) Modifications On a Non-Firm Basis: The Transmission Customer taking Firm Local Point-To-Point Service from a PTO may request transmission service on a non-firm basis over Receipt and Delivery Points of the same PTO other than those specified in the Local Service Agreement ("Secondary Receipt and Delivery Points") in amounts not to exceed its firm capacity reservation, without incurring an additional Non-Firm Local Point-To-Point Service charge or executing a new Local Service Agreement, subject to the following conditions. A Transmission Customer may request a modification to its Non-Firm Local Point-to-Point Service by making such a request to the PTO and the ISO, which must be made pursuant to Sections I.6. (a) and (b), as appropriate.

(a) Service provided over Secondary Receipt and Delivery Points will be non-firm only, on an as-available basis and will not displace any firm or non-firm service reserved or scheduled by third-parties under the Tariff or by the PTO on behalf of its Native Load Customers. (b) The sum of all Firm Local and Non-Firm Local Point-To-Point Service provided to the Transmission Customer at any time pursuant to this section shall not exceed the Reserved Capacity in the relevant Local Service Agreement under which such services are provided.

(c) The Transmission Customer shall retain its right to schedule Firm Local Point-To-Point Service at the Receipt and Delivery Points specified in the relevant Local Service Agreement in the amount of its original capacity reservation.

 (d) Service over Secondary Receipt and Delivery Points on a non-firm basis shall not require the filing of an Application for Non-Firm Local Point-To-Point Service under the Tariff.
 However, all other requirements of this Schedule 21 (except as to transmission rates) shall apply to transmission service on a non-firm basis over Secondary Receipt and Delivery Points.

b) Modification On a Firm Basis: Any request by a Transmission Customer to modify the Firm Local Point-to-Point Service it receives from a PTO to obtain service between different Receipt and Delivery Points on the Local Network of the same PTO on a firm basis shall be treated as a new request for service, except that such Transmission Customer shall not be obligated to pay any additional deposit if the capacity reservation does not exceed the amount reserved in the existing Local Service Agreement. While such new request is pending, the Transmission Customer shall retain its priority for service at the existing firm Receipt and Delivery Points specified in its Local Service Agreement. A Transmission Customer may request a modification to its Firm Local Point-to-Point Service by making such a request to the PTO and the ISO, which must be made pursuant to Sections I.5. (a) and (b), as appropriate.

### 11) Sale or Assignment of Transmission Service

a) **Procedures for Assignment or Transfer of Service**: A Transmission Customer may sell, assign, or transfer all or a portion of its rights under its Local Service Agreement, but only to another Eligible Customer (the Assignee). The Transmission Customer that sells, assigns or transfers its rights under its Local Service Agreement is hereafter referred to as the "Reseller" as the term used throughout this Schedule 21. Compensation to Resellers shall be at rates established by agreement between the Reseller and the Assignee. The Assignee must execute a service agreement with the PTO governing reassignments of transmission service prior to the date on which the reassigned service commences. The PTO shall charge the Reseller, as appropriate, at the rate stated in the Reseller's Local Service Agreement with the PTO or the associated OASIS schedule and credit the Reseller with the price reflected in the

Assignee's Service Agreement with the PTO or the associated OASIS schedule; provided that, such credit shall be reversed in the event of non-payment by the Assignee. If the Assignee does not request any change in the Point(s) of Receipt or the Point(s) of Delivery, or a change in any other term or condition set forth in the original Local Service Agreement, the Assignee will receive the same services as did the Reseller and the priority of service for the Assignee will be the same as that of the Reseller. The Assignee will be subject to all terms and conditions of the Tariff. If the Assignee requests a change in service, the reservation priority of service will be determined by the PTO pursuant to Section I.1.b of this Schedule 21. A Transmission Customer may request a modification to its Firm Local Point-to-Point Service by making such a request to the PTO and the ISO must be made pursuant to sections I.5. (a) and (b) and I.6. (a) and (b), as appropriate.

**b) Limitations on Assignment or Transfer of Service**: If the Assignee requests a change in the Point(s) of Receipt or Point(s) of Delivery, or a change in any other specifications set forth in the original Local Service Agreement, the PTO will consent to such change subject to the provisions of the Tariff, provided that the change will not impair the operation and reliability of the New England Transmission System or the PTO's distribution system, as applicable. The Assignee shall compensate the ISO and/or the PTO, as applicable, for performing any System Impact Study needed to accommodate the proposed change and any additional costs resulting from such change. The Reseller shall remain liable for the performance of all obligations under the Local Service Agreement, except as specifically agreed to by the PTO and Reseller through an amendment to the Local Service Agreement

c) Information on Assignment or Transfer of Service: In accordance with Section I.11 of this Schedule 21 and applicable provisions of the Local Service Schedules, all sales or assignments of capacity must be conducted through or otherwise posted on the PTO's OASIS on or before the date the reassigned Local Point-to-Point Service commences and are subject to Section I.11.a of this Schedule 21. Resellers may also use the OASIS to post transmission capacity available for resale.

### **12)** Metering and Power Factor Correction at Receipt and Delivery Points(s)

a) Transmission Customer Obligations: Unless otherwise provided in the applicable Local Service Schedule, the Transmission Customer shall be responsible for installing and maintaining compatible metering and communications equipment to accurately account for the capacity and energy being transmitted through Local Point-To-Point Service and to communicate the information to the PTO, Local Control Centers and the ISO. Such equipment shall remain the property of the Transmission Customer.

**b) PTO Access to Metering Data**: The PTO shall have access to metering data, which may reasonably be required to facilitate measurements and billing under the Local Service Agreement.

**Power Factor**: In accordance with Good Utility Practice and any applicable Local Service
 Schedule, the Transmission Customer is required to maintain a power factor within the same range as the
 PTO. The power factor requirements are specified in the Local Service Agreement where applicable.

# **13)** Compensation for Local Point-To-Point Service:

Rates for Firm Local and Non-Firm Local Point-To-Point Service are set forth in the Local Service Schedules.

# 14) Compensation for New Facilities Costs:

Whenever a System Impact Study performed in connection with the provision of Firm Local Point-To-Point Service identifies the need for new facilities, the Transmission Customer shall be responsible for the costs of the new facilities to the extent consistent with Commission policy.

# II. LOCAL NETWORK SERVICE

## Preamble

Eligible Customers seeking Local Network Service on a specific Local Network shall refer to the applicable Local Service Schedule to determine any PTO-specific rates, terms, and conditions applicable to such service. Except as otherwise provided in the Local Service Schedules, Local Network Service will be provided pursuant to the applicable rates, terms and conditions set forth below.

# 1) Nature of Local Network Service

Local Network Service is provided to Network Customers to serve their loads. It includes transmission service for the delivery to a Network Customer of its energy and capacity from Network Resources and delivery to or by Network Customers of energy and capacity from New England Markets transactions.

# 2) Availability of Local Network Service

a) Eligibility to Receive Local Network Service: Transmission Customers taking Regional Network Service must also take Local Service.

**b) Compliance With State Law**: A Network Customer is not excused from any requirements of state law, or any order or regulation issued pursuant to state law, to arrange for Local Delivery Service with the PTO and distribution company providing such service and to pay all applicable charges associated with such service, including charges for stranded costs.

c) Scope of Service: Local Network Service allows Network Customers to efficiently and economically utilize their resources and Interchange Transactions to serve their Local and Regional Network Load and any additional load that may be designated pursuant to the Tariff. The Network Customer taking Local Network Service must obtain or provide Ancillary Services.

d) **PTO Responsibilities**: The PTO in accordance with the TOA will plan, construct, operate and maintain its Local Network in accordance with Good Utility Practice and its planning obligations in Attachment K in order to provide the Network Customer with Local Network Service. Each PTO, on behalf of its Native Load Customers, shall be required to designate resources and loads in the same manner as any Network Customer. This information must be consistent with the information used by the PTO to calculate available transfer capability. The PTO in accordance with the TOA shall include the Network Customer's Local Network Load in Local Network planning and shall, consistent with Good Utility Practice and Attachment K, endeavor to construct and place into service sufficient transfer capability to deliver Network Resources to serve the Network Customer's Local and Regional Network Load on a basis comparable to the PTO's delivery of its own generating and purchased resources to its Native Load Customers.

e) Comparability of Service: Local Network Service will be provided to the Network Customer for the delivery of energy and/or capacity from its resources to serve its Local and Regional Network Loads on a basis that is comparable to the PTO's use of its Local Network to reliably serve Native Load Customers.

**f) Real Power Losses**: "Real Power Losses" those losses associated with transmission service as determined in accordance with Section 15.3, Section 31.6 and Schedule 21 of the OATT. The PTOs are not obligated to provide Real Power Losses. Non-PTF Real Power Losses shall be calculated and charged for in accordance with the applicable Schedule 21 Local Service Schedule.

**g) Secondary Service**: The Network Customer may use the Local Network to deliver energy to its Local Network Loads from resources that have not been designated as Network Resources. Such energy shall be transmitted, on an as available basis, at no additional charge. Secondary service shall not require the filing of an Application for Local Network Service under Section II of this Schedule 21. However, all other requirements of Section II of this Schedule 21 (except for transmission rates) shall apply to secondary service. Deliveries from resources other than Network Resources will have a higher priority than any Non Firm Local Point To Point Service.

h) Restrictions on Use of Service: The Network Customer shall not use Local Network Service for (i) sales of capacity and energy to non designated loads, or (ii) direct or indirect provision of transmission service by the Network Customer to third parties. All Network Customers taking Local Network Service shall use Local Point To Point Service for any Third Party Sale, which requires use of the Local Network. The PTO shall specify any appropriate charges and penalties and all related terms and conditions applicable in the event that a Network Customer uses Local Network Service or secondary service pursuant to Section II.2.g of this Schedule 21 to facilitate a wholesale sale that does not serve Local Network Load.

### 3) Initiating Service

a) Condition Precedent for Receiving Service: Local Network Service shall be provided only if the following conditions are satisfied by the Eligible Customer: (i) the Eligible Customer completes an Application to the ISO for service, (ii) the Eligible Customer and the PTO complete the technical arrangements, and (iii) the Eligible Customer executes a Local Service Agreement with the PTO and the ISO or requests in writing that the ISO file an unexecuted Local Service Agreement containing terms and conditions deemed by the PTO (in consultation with the ISO) to be appropriate for such requested service with the Commission.

### 4) **Procedures for Arranging Local Network Service**

### a) Pre-RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Point of Receipt or Point

of Delivery, or make upgrades (i.e., increase MWs served) within the terms of their existing Local Service Agreement that is in effect prior to February 1, 2005 ("Pre-RTO Local Service Agreement"), shall not be required to complete an Application or execute a Local Service Agreement under this Schedule 21, however, modifications to the existing Local Service Agreement may be required. The Transmission Customer shall contact the PTO to discuss and, if appropriate, modify the existing Local Service Agreement.

(ii) A Transmission Customer who wishes to make upgrades (i.e., increase MWs served) beyond the terms of its existing Local Service Agreement that is in effect prior to February 1, 2005 ("Pre-RTO Local Service Agreement"), shall contact the PTO to make arrangements to terminate the Transmission Customer's existing Local Service Agreement and shall complete (and submit to the ISO) an Application for Local Service and then execute a Local Service Agreement under this Schedule 21.

### b) RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternative Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of the existing Local Service Agreement under this Schedule 21, shall not be required execute a new Local Service Agreement under this Schedule 21, however, modifications to the existing Local Service Agreement under this Schedule 21 may be required. Such modifications to an existing Local Service Agreement typically do not require an additional Local or Regional System Impact Study to be completed. The Transmission Customer shall complete (and submit to the ISO) an application for Local Transmission Service that reflects the requested modifications to the Local Service Agreement to facilitate revision of its existing Schedule 21 Local Service Agreement. (ii) A Transmission Customer who wishes to make upgrades (i.e., increase MWs served) beyond the terms of the existing Local Service Agreement under this Schedule 21, shall contact the ISO to discuss and, if appropriate, terminate the Transmission Customer's existing Local Service Agreement under this Schedule 21 and shall complete (and submit to the ISO) a new Application for Local Service and then execute a new Local Service Agreement under this

Schedule 21.

c) Application Procedures: An Eligible Customer requesting Local Network Service must submit an Application, with a deposit equal to the charge for one month of service, unless another charge is specified in the applicable Local Service Schedule, to the ISO as far as possible in advance of the month in which service is to commence. Completed Applications for Local Network Service will be assigned a reservation priority according to the date and time the Application is received, with the earliest Application receiving the highest priority. A Completed Application shall provide all of the information included in 18 C.F.R. §2.20 including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the party requesting service;

(ii) A statement that the party requesting service is, or will be upon commencement of service, an Eligible Customer;

(iii) A description of the Local Network Load at each delivery point. This description should separately identify and provide the Eligible Customer's best estimate of the total loads to be served at each transmission voltage level, and the loads to be served from each substation at the same transmission voltage level. The description should include a ten-year forecast of summer and winter load resource requirements beginning with the first year after the service is scheduled to commence;

(iv) The amount and location of any interruptible loads included in the Local Network Load. This shall include the summer and winter capacity requirements for each interruptible load (had such load not been interruptible), that portion of the load subject to interruption, the conditions under which an interruption can be implemented and any limitations on the amount and frequency of interruptions. An Eligible Customer should identify the amount of interruptible customer load (if any) included in the ten-year load forecast provided in response to (iii) above;

(v) A description of Network Resources (current and ten-year projection), which shall include, for each Network Resource, if the description is not otherwise available to the ISO and the PTOs:

- Unit size and amount of capacity from that unit to be designated as Network Resource

- VAR capability (both leading and lagging) of all generators

- Operating restrictions
- Any periods of restricted operations throughout the year
- Maintenance schedules
- Minimum loading level of unit
- Normal operating level of unit
- Any must-run unit designations required for system reliability or contract reasons
- Approximate variable dispatch price (\$/MWH), consistent with Market Rule 1, for redispatch computations
- Arrangements governing sale and delivery of power to third parties from generating facilities located in the New England Control Area, where only a portion of unit output is designated as a Network Resource
- Description of external purchased power designated as a Network Resource including source of supply, control area location, transmission arrangements and delivery point(s);
- (vi) Description of Eligible Customer's transmission system:
- Load flow and stability data, such as real and reactive parts of the load, lines, transformers, reactive devices and load type, including normal and emergency ratings of all transmission equipment in a load flow format compatible with that used by the ISO and the PTOs
- Operating restrictions needed for reliability
- Operating guides employed by system operators
- Contractual restrictions or committed uses of the Eligible Customer's transmission system, other than the Eligible Customer's Local Network Loads and Resources
- Location of Network Resources described in subsection (v) above
- ten-year projection of system expansions or upgrades
- transmission system maps that include any proposed expansions or upgrades
- Thermal ratings of Eligible Customer's Control Area ties with other Control Areas;

(vii) Service Commencement Date and the term of the requested service. The minimum term for service is one year; and

(viii) Any additional information required of the Transmission Customer as specified in the PTO's planning process established in Attachment K.

Unless the Eligible Customer and the ISO agree to a different time frame, the ISO must acknowledge the request within ten (10) days of receipt. The acknowledgment must include a date by which a response, including a Local Service Agreement, will be sent to the Eligible Customer. If an Application fails to meet the requirements of this Section, the PTO shall notify the ISO within ten (10) days of the Application's receipt of the reasons for such failure, and the ISO shall, in turn, so notify the entity requesting service within five (5) days of the receipt of notice from the PTO of the reasons for such failure. Wherever possible, the ISO and the PTO will attempt to remedy deficiencies in the Application through informal communications with the Eligible Customer. If such efforts are unsuccessful, the ISO shall return the Application without prejudice to the Eligible Customer, who may thereafter file a new or revised Application that fully complies with the requirements of this Section. The Eligible Customer will be assigned a new reservation priority consistent with the date of the new or revised Application. The ISO and the PTO shall treat this information consistent with the standards of conduct contained in Part 37 of the Commission's regulations.

d) Technical Arrangements to be Completed Prior to Commencement of Service: Local Network Service shall not commence until the PTO and the Network Customer, or a third party, have completed installation of all equipment specified under the Local Service Agreement consistent with Good Utility Practice and any additional requirements reasonably and consistently imposed to ensure the reliable operation of the Non-PTF. The PTO shall exercise reasonable efforts, in coordination with the Network Customer, to complete such arrangements as soon as practicable taking into consideration the Service Commencement Date.

e) Network Customer Facilities: The provision of Local Network Service shall be conditioned upon the Network Customer's constructing, maintaining and operating the facilities on its side of each delivery point or interconnection necessary to reliably deliver capacity and energy from the Non-PTF to the Network Customer. The Network Customer shall be solely responsible for constructing or installing and operating and maintaining all facilities on the Network Customer's side of each such delivery point or interconnection.

**f) Filing of Service Agreement**: The ISO shall file Local Service Agreements with the Commission in compliance with applicable Commission regulations.

## 5) Network Resources

a) Designation of Network Resources: The Network Customer shall designate those Network Resources which are owned, purchased or leased by it. The Network Resources so designated may not include resources, or any portion thereof, that are committed for sale to non-designated third party load or otherwise cannot be called upon to meet the Network Customer's Local Network Load on a noninterruptible basis. Any owned, purchased or leased resources that were serving the Network Customer's loads under firm agreements entered into on or before the Compliance Effective Date shall be deemed to continue to be so owned, purchased or leased by it until the Network Customer informs the ISO and the PTO of a change.

b) Designation of New Network Resources: The Network Customer shall identify any new Network Resources which are owned, purchased or leased by it with as much advance notice as practicable. A designation of any new Network Resource as owned, purchased or leased by the Customer must be made by a notice to the ISO and the PTO.

c) Termination of Network Resources: The Network Customer may terminate the designation of all or part of a Network Resource as owned, purchased or leased by it at any time but shall provide notification to the ISO and the PTO as soon as reasonably practicable.

d) Network Customer Redispatch Obligation: As a condition to receiving Local Network Service, the Network Customer agrees to redispatch its Network Resources as requested by the ISO and the PTO. The ISO will redispatch all Resources subject to its control, pursuant to Market Rule 1, in order to meet load and to accommodate External Transactions. The Network Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with Market Rule 1.

e) Transmission Arrangements for Network Resources Not Physically Interconnected with the PTO's Non-PTF: The Network Customer shall be responsible for any arrangements necessary to deliver capacity and energy from a Network Resource not physically interconnected with the PTO's Non-PTF. The applicable PTO will undertake reasonable efforts to assist the Network Customer in obtaining such arrangements, including without limitation, providing any information or data required by such other entity pursuant to Good Utility Practice.

**f**) **Limitation on Designation of Network Resources**: The Network Customer must demonstrate that it owns or has committed to purchase generation pursuant to an executed contract in order to

designate a generating resource as a Network Resource. Alternatively, the Network Customer may establish that execution of a contract is contingent upon the availability of transmission service under this Schedule 21.

g) Network Customer Owned Transmission Facilities: The Network Customer that owns existing transmission facilities that are integrated with the PTO's Local Network may be eligible to receive consideration either through a billing credit or some other mechanism. In order to receive such consideration, the Network Customer must demonstrate that its transmission facilities are integrated into the planning and operations of the PTO to serve all of its power and transmission customers. For facilities added by the Network Customer subsequent to the effective date of a Final Rule in RM05-25-000, the Network Customer shall receive credit for such transmission facilities added if such facilities are integrated into the operations of the PTO's facilities; provided however, the Local Network Customer's transmission facilities shall be presumed to be integrated if such transmission facilities, if owned by the PTO, would be eligible for inclusion in the PTO's annual transmission revenue requirement as specified in the PTO's respective Local Service Schedule. Calculation of any credit under this subsection shall be addressed in either the Network Customer's Service Agreement or any other agreement between the Parties.

### 6) Designation of Local Network Load

a) Local Network Load: The Network Customer must designate the individual Local Network Loads which it expects to have served through Local Network Service. The Local Network Loads shall be specified in the Local Service Agreement.

b) New Local Network Loads Within the New England Control Area: The Network Customer shall provide the ISO and the PTO with as much advance notice as reasonably practicable of the designation of new Local Network Load that will be added to the Non-PTF. A designation of new Local Network Load must be made through a modification of service pursuant to a new Application. The PTO will use due diligence to install or cause to be installed any transmission facilities required to interconnect a new Local Network Load designated by the Network Customer. The costs of new facilities required to interconnect a new Local Network Load shall be determined in accordance with the procedures provided in this Schedule 21 and shall be charged to the Network Customer in accordance with Commission policy and this Schedule 21. c) Local Network Load Not Physically Interconnected with the PTO: This Section applies to both initial designation and the subsequent addition of new Local Network Load not physically interconnected with the PTO's Non-PTF. To the extent that the Network Customer desires to obtain transmission service for a load outside the Local Network, the Network Customer shall have the option of (1) electing to include the entire load as Local Network Load for all purposes under this Schedule 21 and designating Network Resources in connection with such additional Local Network Load, or (2) excluding that entire load from its Local Network Load and purchasing Local Point To Point Service under this Schedule 21. To the extent that the Network Customer gives notice of its intent to add a new Local Network Load as part of its Local Network Load pursuant to this Section the request must be made through a modification of service pursuant to a new Application.

**New Interconnection Points**: To the extent the Network Customer desires to add a new
 Delivery Point or interconnection point between the Non-PTF and a Local Network Load, the Network
 Customer shall provide the ISO and the PTO with as much advance notice as reasonably practicable.

e) Changes in Service Requests: Under no circumstances shall the Network Customer's decision to cancel or delay a requested change in Local Network Service (the addition of a new Network Resource, if any, or designation of a new Local Network Load) in any way relieve the Network Customer of its obligation to pay the costs of transmission facilities constructed by the PTOs and charged to the Network Customer as reflected in the applicable Local Service Agreement or other appropriate agreement. However, the PTO must treat any requested change in Local Network Service in a non-discriminatory manner.

f) Annual Load and Resource Information Updates: The Network Customer shall provide the ISO and the PTO with annual updates of Local Network Load and Network Resource forecasts consistent with those included in its Application including, but not limited to, any information provided under Section II.3.b of this Schedule 21 pursuant to the PTO's planning process in Attachment K. The Network Customer also shall provide the ISO and the PTO with timely written notice of material changes in any other information provided in its Application relating to the Network Customer's Local Network Load, Network Resources, its transmission system or other aspects of its facilities or operations affecting the ability of the PTO to provide reliable service.

## 7) Additional Study Procedures For Local Network Service Requests

a) Notice of Need for System Impact Study: After receiving a request for Local Network Service, a determination shall be made on a non-discriminatory basis as to whether a System Impact Study is needed. The ISO shall review the request to determine whether the provision of the requested service would have an impact on facilities other than Non-PTF, and if so, whether a System Impact Study is necessary to accommodate the requested service. If so, the ISO shall so inform the Eligible Customer as soon as practicable and will (in consultation with the PTO) perform a System Impact Study, as necessary, with respect to the request. A description of the ISO's methodology for completing a System Impact Study is provided in OATT Attachment D. If the ISO determines that the service would not have an impact on facilities other than Non-PTF, the PTO shall determine whether a System Impact Study is necessary to accommodate the requested service and shall so inform the Eligible Customer as soon as practicable and will (in consultation with the ISO) perform a System Impact Study, as necessary, with respect to the application. In such cases, the ISO or the PTO, as applicable, shall within thirty (30) days of receipt of a Completed Application, tender a System Impact Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the ISO or the PTO, as applicable, for performing the required System Impact Study. For a service request to remain a Completed Application, the Eligible Customer shall execute the System Impact Study Agreement and return it to the ISO or the PTO, as applicable, within fifteen (15) days. If the Eligible Customer elects not to execute the System Impact Study Agreement, its Application shall be deemed withdrawn and its deposit shall be returned with interest. A description of the PTO's methodology for completing a System Impact Study is provided in its Local Service Schedule.

### b) System Impact Study Agreement and Cost Reimbursement:

(i) The System Impact Study Agreement will clearly specify an estimate of the cost and time for completion of the System Impact Study. The charge shall not exceed the actual cost of the study. The System Impact Study shall rely on existing transmission planning studies to the extent reasonably practicable. The Eligible Customer will not be assessed a charge for such existing studies; however, the Eligible Customer will be responsible for charges associated with any modifications to existing planning studies that are reasonably necessary to evaluate the impact of the Eligible Customer's request for service on the Local Network.

(ii) If in response to multiple Eligible Customers requesting service in relation to the same competitive solicitation, a single System Impact Study is sufficient to accommodate the requests for service, the costs of that study shall be pro-rated among the Eligible Customers.

(iii) For System Impact Studies that the PTO conducts on its own behalf, the PTO shall record the cost of the System Impact Studies pursuant to Section II.8.5 of the Tariff.

(iv) In response to multiple Eligible Customers within the same electrically interconnected area requesting clustering of system Impact Study analysis for Local Service, the PTO will accommodate such multiple requests if it can reasonable do so. The costs of such studies shall be pro-rated among the Eligible Customers on an agreed upon basis.

c) **System Impact Study Procedures:** Upon receipt of an executed System Impact Study Agreement, the ISO or the PTO, as applicable, will use due diligence to complete the required System Impact Study within a sixty (60) day period. The System Impact Study shall identify any system constraints, additional Direct Assignment Facilities or Local Network Upgrades required to provide the requested service. In the event that the ISO or the PTO, as applicable, is unable to complete the required System Impact Study within such time period, it shall so notify the Eligible Customer and provide an estimated completion date along with an explanation of the reasons why additional time is required to complete the required studies. A copy of the completed System Impact Study and related work papers shall be made available to the Eligible Customer as soon as the System Impact Study is complete. The PTO will use the same due diligence in completing the System Impact Study for an Eligible Customer as it uses when completing studies for itself. The ISO or the PTO, as applicable, shall notify the Eligible Customer immediately upon completion of the System Impact Study if the Local Network will be adequate to accommodate all or part of a request for service or that no costs are likely to be incurred for new transmission facilities or upgrades. In order for a request to remain a Completed Application, within fifteen (15) days of completion of the System Impact Study, the Eligible Customer must execute a Local Service Agreement or request the filing of an unexecuted Local Service Agreement pursuant to Section II.3.a of this Schedule 21 or the Application shall be deemed terminated and withdrawn.

d) Facilities Study Procedures: If a System Impact Study indicates that additions or upgrades to facilities other than Non-PTF are needed to supply the Eligible Customer's service request or to mitigate indirect impacts on the MTF facilities, the ISO, within thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the ISO for performing the required Facilities Study. If a System Impact Study indicates that additions or upgrades to Non-PTF facilities are needed to supply the Eligible Customer's service request or to mitigate indirect impacts on the MTF facilities, the PTO, within

thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the PTO for performing the required Facilities Study. For clustered studies, the cost of such studies shall be pro-rated among the Eligible Customers on an agreed upon basis. For a service request to remain a Completed Application, the Eligible Customer shall execute the Facilities Study Agreement and return it within fifteen (15) days. If the Eligible Customer elects not to execute the Facilities Study Agreement, its Application shall be deemed withdrawn and its deposit shall be returned with interest. Upon receipt of an executed Facilities Study Agreement, the ISO or the PTO, as applicable, will use due diligence to complete the required Facilities Study within a sixty (60) day period. If the Facilities Study cannot be completed in the allotted time period, the Eligible Customer shall be notified and provided an estimate of the time needed to reach a final determination along with an explanation of the reasons that additional time is required to complete the study. When completed, the Facilities Study will include a good faith estimate of (i) the cost of Direct Assignment Facilities to be charged to the Eligible Customer, (ii) the Eligible Customer's appropriate share of the cost of any required Local Network Upgrades, and (iii) the time required to complete such construction and initiate the requested service. The Eligible Customer shall provide a letter of credit or other reasonable form of security acceptable to the PTO equivalent to the costs of new facilities or upgrades consistent with commercial practices as established by the Uniform Commercial Code. The Eligible Customer shall have thirty (30) days to execute a Local Service Agreement or request the filing of an unexecuted Local Service Agreement and provide the required letter of credit or other form of security or the request will no longer be a Completed Application and shall be deemed terminated and withdrawn.

In addition to the foregoing, each Facilities Study shall, if requested by the Eligible Customer, contain a non-binding estimate from the ISO of the Incremental ARRs, if any, resulting from the construction of the new facilities. After completion of the transmission upgrade or expansion, the ISO shall determine the Incremental ARRs, if any, resulting from the upgrade or expansion.

e) Facilities Study Modifications: Any change in design arising from the inability to site or construct facilities as proposed will require development of a revised good faith estimate. New good faith estimates also will be required in the event of new statutory or regulatory requirements that are effective before the completion of construction or other circumstances beyond the control of the ISO and/or the PTO that significantly affect the final cost of new facilities or upgrades to be charged to the Transmission Customer.

**f**) **Due Diligence in Completing New Facilities**: The PTO shall use due diligence to add necessary facilities or upgrade its Local Network within a reasonable time. The PTO will not upgrade its existing or planned Local Network in order to provide the requested Local Network Service if doing so would impair system reliability or otherwise impair or degrade existing firm service.

**g)** Claims or Disputes: Any claim or dispute between the PTO and the Transmission Customer with respect to a System Impact Study or Facilities Study shall be governed by the provisions of Section I.6 of the Tariff.

Penalties for Failure to Meet Study Deadlines: Section I.7.i of this Schedule 21 defines
 penalties that apply for failure to meet the 60-day study completion due diligence deadlines for System
 Impact Studies and Facilities Studies under Section I of this Schedule 21. These same requirements and
 penalties apply to service under Section II of this Schedule 21.

# 8) Load Shedding and Curtailments

a) **Procedures**: The PTO shall establish Load Shedding and Curtailment procedures (consistent with those of the ISO and the Local Control Center) with the objective of responding to contingencies on the Non-PTF. The PTO will notify all affected Local Network Service Customers in a timely manner of any scheduled Curtailment.

**b) Transmission Constraints**: During any period when a PTO or the Local Control Center determines that a transmission constraint exists on the Non-PTF, and such constraint may impair the reliability of the New England Transmission System, the PTO or the Local Control Center will so inform the ISO. The ISO will take whatever actions, consistent with Good Utility Practice, that are reasonably necessary to maintain the reliability of the system. To the extent the ISO determines that the reliability of the New England Transmission System can be maintained by redispatching resources, The ISO will initiate procedures to redispatch all resources on a least-cost basis without regard to the ownership of such resources.

c) Cost Responsibility for Relieving Transmission Constraints: Whenever the ISO implements least-cost redispatch procedures in response to a transmission constraint, the Transmission Customer will bear the costs of such redispatch in accordance with Market Rule 1.

d) **Curtailments of Scheduled Deliveries**: If a transmission constraint on the Non-PTF cannot be relieved through the implementation of least-cost redispatch procedures and the PTO determines that it is necessary to effect a Curtailment of scheduled deliveries, such schedule shall be curtailed in accordance with the terms of the Tariff.

e) Allocation of Curtailments: The ISO, the Transmission Owner or the Local Control Center shall on a non-discriminatory basis, effect a Curtailment of the transaction(s) that effectively relieves the constraint. However, to the extent practicable and consistent with Good Utility Practice, any Curtailment will be shared by the customers taking MTF Service and OTF Service and/or Through or Out Service and Network Customers on a non-discriminatory basis. Notwithstanding the preceding provisions of this Section, External Transactions shall be scheduled and curtailed in accordance with Section II.44 of the OATT.

**f**) **Load Shedding**: Load Shedding also may occur in accordance with the applicable Local Service Schedule to the extent provided for in such Local Service Schedule.

g) **System Reliability**: Notwithstanding any other provisions of this Schedule, The ISO, the PTO and the Local Control Centers reserve the right, consistent with Good Utility Practice and on a not unduly discriminatory basis, to effect a Curtailment of service without liability on the part of the ISO, the PTO or the Local Control Centers for the purpose of making necessary adjustments to, changes in, or repairs on the PTO's lines, substations and facilities, and in cases where the continuance of service would endanger persons or property. In the event of any adverse condition(s) or disturbance(s) on the Non-PTF or on any other system(s) directly or indirectly interconnected with the Non-PTF, the ISO, the PTO and the Local Control Centers, consistent with Good Utility Practice, also may effect a Curtailment of service in order to (i) limit the extent or damage of the adverse condition(s) or disturbance(s), (ii) prevent damage to generating or transmission facilities, or (iii) expedite restoration of service. The ISO, the PTO or the Local Control Centers will give the Network Customer as much advance notice as is practicable in the event of such Curtailment. Any Curtailment of Local Network Service will be not unduly discriminatory relative to the PTO's use of the New England Transmission System on behalf of their Native Load Customers. The Local Service Schedules shall specify the rate treatment and all related terms and conditions applicable in the event that the Network Customer fails to respond to established Load Shedding and Curtailment procedures.

### 9) Rates and Charges

The Network Customer shall pay all applicable charges for Local Network Service set forth in this Schedule 21, including the Local Service Schedules, and for any Direct Assignment Facilities and its share of the cost of any required Local Network Upgrades and applicable study costs consistent with Commission policy, along with any additional charges imposed under the Tariff. In the event the Network Customer serves Local Network Load located on more than one Local Network, the amount to be paid by it shall be separately computed for each Local Network.

# 10) Determination of Network Customer's Monthly Network Load

For purposes of Local Network Service, the Network Customer's "Monthly Network Load" shall be determined in accordance with the applicable Local Service Schedule.

# **11) Operating Arrangements**

The Network Customer shall plan, construct, operate and maintain its facilities in accordance with Good Utility Practice and in conformance with the terms of the Tariff. The terms and conditions under which the Network Customer taking Local Network Service shall operate its facilities and the technical and operational matters associated with the implementation of Local Network Service shall be specified in Section II.22 of the Tariff and/or the Local Service Schedules.

# SCHEDULE 21 ATTACHMENT A FORM OF LOCAL SERVICE AGREEMENT

This LOCAL SERVICE AGREEMENT, dated as of \_\_\_\_\_\_, is entered into, by and between \_\_\_\_\_\_, a \_\_\_\_\_\_organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_\_, a \_\_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_,

# PART I – General Terms and Conditions

- 1. Service Provided (Check applicable):
- \_\_\_\_ Local Network Service
- \_\_\_ Local Point-To-Point Service
  - \_\_\_ Firm
  - \_\_\_ Non-Firm

Regional Network Service customers must take either Local Network Service or Local Point-To-Point Service.

- The Transmission Customer is an Eligible Customer under the Tariff and is a party to either a Market Participant Service Agreement or a Transmission Service Agreement.
- 3. The Transmission Customer has submitted a Completed Application and the required deposit, if applicable, for service under this Local Service Agreement and the Tariff.
- 4. The Transmission Customer agrees to supply information to the Transmission Owner that the Transmission Owner deems reasonably necessary in accordance with Schedule 21 and Good Utility Practice in order for it to receive the requested service.
- 5. The Transmission Owner agrees to provide and the Transmission Customer agrees to take and pay for service in accordance with the provisions of the Tariff and this Local Service Agreement.

- Service may be subject to some combination of the charges detailed in Schedule 21 of the OATT. The appropriate charges will be determined in accordance with the terms and conditions of Schedule 21.
- Any notice or request made to or by either party regarding this Local Service Agreement shall be made to the representative of the other party as indicated below.
   Transmission Customer:

Transmission Owner:

The ISO:

- 8. The ISO New England Inc. Transmission, Markets and Services Tariff (the "Tariff") is incorporated herein and made a part hereof. Capitalized terms used in this Local Service Agreement shall have the meanings ascribed in the Tariff.
- 9. Nothing contained in this Local Service Agreement shall be construed as affecting in any way the right of the Transmission Owner to file with the Commission under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of this Local Service Agreement. Nothing contained in this Local Service Agreement shall be construed as affecting in any way the ability of the Transmission Customer to file with the Commission under Section 206 of the Federal Power Act

and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of this Local Service Agreement.

10. Nothing contained in this Local Service Agreement shall be construed as affecting or enlarging, in whole or in part, the limited responsibility of the ISO under the Transmission Operating Agreement ("TOA") to coordinate the Transmission Owner's provision of Local Service and to determine whether the provision of Local Service would have an impact on facilities used for the provision of Regional Transmission Service.

# **PART II – Local Network Service**

- 1. The Transmission Customer has been determined by the Transmission Owner and the ISO to have a Completed Application for Local Network Service under the Tariff.
- Service shall commence on the later of: (1) \_\_\_\_\_\_, or (2) the date on which construction of all interconnection equipment, any Direct Assignment Facilities and/or facility or Local Network Upgrades are completed, or (3) such other date as it is permitted to become effective by the Commission. Service shall terminate on \_\_\_\_\_.
- 3. Specifications for Local Network Service.
  - a. Term of Service:
  - b. List of Network Resources and Point(s) of Receipt:
  - c. Description of capacity and energy to be transmitted:
  - d. Description of Local Network Load:
  - e. List of Point(s) of Delivery and metering point(s) when they differ from Point(s) of Delivery:
  - f. List of non-Network Resource(s), to the extent known:

- g. Ancillary Services requested or proof of satisfactory arrangements for Ancillary Services:
- h. Identity of Designated Agent:

Authority of Designated Agent:

Term of Designated Agent's authority:

Division of responsibilities and obligations between Transmission Customer and Designated Agent:

- i. Interconnection facilities and associated equipment:
- j. Project name:
- k. Interconnecting Transmission Customer:
- l. Location:
- m. Transformer nameplate rating:
- n. Interconnection point:
- o. Additional facilities and/or associated equipment:
- p. Service under this Local Service Agreement shall be subject to the following charges:
- q. Additional terms and conditions:
- 4. Planned work schedule.

Estimated Time

MilestonePeriod For Completion(Activity)(# of months)

5. Payment schedule and costs.

(Study grade estimate, +\_\_\_% accuracy, year \$s) Milestone Amount (\$) Policy and practices for protection requirements for new or modified load interconnections.

7. Insurance requirements.

6.

# PART III – Local Point-To-Point Service

1. The Transmission Customer has been determined by the Transmission Owner and the ISO to have a Completed Application for Local Point-To-Point Service under the Tariff.

2. Service shall commence on the later of: (1) \_\_\_\_\_\_, or (2) the date on which construction of any Direct Assignment Facilities and/or Local Network Upgrades are completed, or (3) such other date as it is permitted to become effective by the Commission. Service shall terminate on

3. Non-firm Local Point-To-Point Service shall be provided by the Transmission Owner upon request by an authorized representative of the Transmission Customer.

4. Specifications for Local Point-To-Point Service.

a. Term of Transaction:

b. Description of capacity and energy to be transmitted by the Transmission Owner including the electric Control Area in which the transaction originates:

- c. Point(s) of Receipt:
- d. Delivering Party:
- e. Point(s) of Delivery:
- f. Receiving Party:

- g. Maximum amount of capacity and energy to be transmitted (Reserved Capacity):
- h. Designation of party(ies) subject to reciprocal service obligation:
- i. Name(s) of any intervening Control Areas providing transmission service:
- j. Service under this Local Service Agreement shall be subject to the following charges:
- k Interconnection facilities and associated equipment:
- 1. Project name:
- m. Interconnecting Transmission Customer:
- n. Location:
- o. Transformer nameplate rating:
- p. Interconnection point:
- q. Additional facilities and/or associated equipment:
- r. Additional terms and conditions:
- 5. Planned work schedule.
   Estimated Time
   Milestone
   (Activity)
   (#

Period For Completion (# of months)

6. Payment schedule and costs.
(Study grade estimate, +\_\_\_% accuracy, year \$s)
Milestone Amount (\$)

7. Policy and practices for protection requirements for new or modified load interconnections.

8. Insurance requirements.

IN WITNESS WHEREOF, the Parties have caused this Local Service Agreement to be executed by their respective authorized officials.

Transmission Customer:

By:			
Name	Title	Date	
Print Name			
Transmission Owner:			
By:	·····		
Name	Title	Date	
Print Name			
The ISO:			
By:			
Name	Title	Date	
			Print Name

#### **ATTACHMENT A-1**

# Form of Local Service Agreement For The Resale, Reassignment or Transfer of Point-To-Point Transmission Service

("Assignee") and ISO New England, Inc., a non-stock corporation organized and existing under the laws of the State of Delaware ("ISO"). Under this Agreement the Transmission Owner, Assignee, and the ISO each may be referred to as a "Party" or collectively as the "Parties."

2.0 The Assignee has been determined by the Transmission Owner to be an Eligible Customer under the Tariff pursuant to which the transmission service rights to be transferred were originally obtained.

3.0 The terms and conditions for the transaction entered into under this Local Service Agreement shall be subject to the terms and conditions of Part I of Schedule 21 and the Transmission Owner's Local Service Schedule of Tariff, except for those terms and conditions negotiated by the Reseller of the reassigned transmission capacity (pursuant to Section I.11.a of this Tariff) and the Assignee, to include: contract effective and termination dates, the amount of reassigned capacity or energy, point(s) of receipt and delivery. Changes by the Assignee to the Reseller's Points of Receipt and Points of Delivery will be subject to the provisions of Section I.11.b of this Tariff.

4.0 The Transmission Owner shall credit the Reseller for the price reflected in the Assignee's Local Service Agreement or the associated OASIS schedule.

5.0 Any notice or request made to or by either Party regarding this Local Service Agreement shall be made to the representative of the other Party as indicated below.

Transmission Owner:

The ISO:

Assignee:

6.0 The Tariff is incorporated herein and made a part hereof.

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\_

\_\_\_\_\_

\_\_\_\_\_

IN WITNESS WHEREOF, the Parties have caused this Local Service Agreement to be executed by their respective authorized officials.

Transmission Owner:		
By:		
Print Name:	Title:	Date:
The ISO:		
By:		
Print Name:	Title:	Date:
Assignee:		
By:		
Print Name:	Title:	Date:

# Specifications For The Resale, Reassignment Or Transfer of Long-Term Firm Point-To-Point

Transmission Service

1.0 Term of Transaction: \_\_\_\_\_

Start Date: \_\_\_\_\_\_

Termination Date: \_\_\_\_\_

2.0 Description of capacity and energy to be transmitted by Transmission Owner including the electric Control Area in which the transaction originates.

 3.0
 Point(s) of Receipt:\_\_\_\_\_

 Delivering Party:\_\_\_\_\_

5.0 Maximum amount of reassigned capacity: \_\_\_\_\_

6.0 Designation of party(ies) subject to reciprocal service obligation:

7.0 Name(s) of any Intervening Systems providing transmission service:

(Name of Transmission Owner) Open Access Transmission Tariff

8.0 Service under this Agreement may be subject to some combination of the charges detailed below. (The appropriate charges for individual transactions will be determined in accordance with the terms and conditions of the Tariff.)

0.1 ITalisilission Charge	8.1	Transmission Charge
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8.2 System Impact and/or Facilities Study Charge(s):

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8.3 Direct Assignment Facilities Charge:\_\_\_\_\_

8.4 Ancillary Services Charges: \_\_\_\_\_

9.0 Name of Reseller of the reassigned transmission capacity:

# SCHEDULE 21 - FG&E

# FITCHBURG GAS AND ELECTRIC LIGHT COMPANY LOCAL SERVICE SCHEDULE

#### SCHEDULE 21-FG&E

## Fitchburg Gas and Electric Light Company Local Service Schedule

## I. <u>COMMON SERVICE PROVISIONS</u>

Fitchburg Gas and Electric Light Company ("FG&E") is a participant in the New England Control Area and has agreed to provide transmission and ancillary services over PTF pursuant to the Tariff. The services provided under this Schedule 21-FG&E apply only to Non-PTF, except in the case of service to Network Customers that have all or part of their Network Load directly connected to the PTF in the Local Network. These Network Customers shall pay for Local Network Service pursuant to Attachment H to this Schedule 21-FG&E. Provisions of this Schedule 21-FG&E shall have priority over any conflicting provisions in the Tariff.

## 1 Definitions

**1.0 Annual Transmission Costs**: The total annual cost of the Local Network for purposes of Local Network Service shall be the amount specified in Attachment H until amended by FG&E or modified by the Commission.

**1.1 Curtailment**: A reduction in firm or non-firm transmission service in response to a transmission capacity shortage as a result of system reliability conditions.

**1.2** Load Ratio Share: Ratio of a Transmission Customer's Non-PTF Network Load to FG&E's total load computed in accordance with Sections II.10 and II.10(a) of this Schedule under Sections Supplementing Section 21 of the OATT and calculated on a rolling twelve month basis.

**1.3.1** Local Network: The transmission facilities owned, controlled, or operated by FG&E that are used to provide transmission service under Schedule 21 of the OATT.

**1.4** Local Network Service: The transmission service provided under Schedule 21 of the OATT and this Schedule.

**1.5** Network Load: The load directly interconnected to the PTF or Non-PTF facilities of FG&E. A Network Customer may elect to designate less than its total load as Network Load but

may not designate only part of the load at a discrete Point of Delivery. Where a Eligible Customer has elected not to designate a particular load at discrete points of delivery as Network Load, the Eligible Customer is responsible for making separate arrangements under Schedule 21 of the OATT for any Local Point-to-Point Service that may be necessary for such non-designated load. For purposes of establishing rates and charges under this Tariff, the Network Load will be subdivided into one of two categories:

**A.** PTF Network Load shall be the load over FG&E's PTF facilities and shall equal the load of Network Customers directly interconnected with FG&E's PTF or indirectly utilizing FG&E's PTF through Non-PTF facilities of FG&E.

**B**. Non-PTF Network Load shall be the load over FG&E's Non-PTF directly interconnected with FG&E's Non-PTF facilities.

**1.6** Network Upgrades: Modifications or additions to transmission-related facilities that are integrated with and support FG&E's overall Local Network for the general benefit of all users of such Local Network.

**1.7 Parties**: FG&E and the Transmission Customer receiving service under this Schedule and the OATT.

# SECTIONS SUPPLEMENTING THE BODY OF THE TARIFF

# Preamble

The following provisions supplement the provisions of the Tariff. Provisions of this Schedule 21-FG&E shall have priority over any conflicting provisions in the Tariff. The section numbers of this Schedule 21-FG&E correspond to or are consecutive to the section numbers in the body of the Tariff that are affected by the additional provisions herein.

# Sections Supplementing Section 1: General Terms and Conditions

**1.7 Creditworthiness**: For the purpose of determining the ability of the Transmission Customer to meet its obligations related to service hereunder, FG&E may require reasonable credit review procedures in accordance with Attachment L to Schedule 21-FG&E.

## Sections Supplementing Section II of the Tariff: Open Access Transmission Tariff (OATT)

## II.A. COMMON SERVICE PROVISIONS

## II.4 Ancillary Services

Ancillary Services are needed with transmission service to maintain reliability within and among the Control Areas affected by the transmission service. FG&E is required to provide (or offer to arrange with the ISO as discussed below), and the Transmission Customer is required to purchase Scheduling, System Control and Dispatch Service.

The following Ancillary Services are available pursuant to Section II.4 of the Tariff only to the Transmission Customer serving load within the New England Control Area: (i) Reactive Supply and Voltage Control Service, (ii) Regulation and Frequency Response, (iii) Energy Imbalance, (iv) Ten-Minute Spinning Reserve Service, (v) Ten-Minute Non-Spinning Reserve Service and (vi) Thirty-Minute Operating Reserve Service.

## II.8 Billing and Invoicing; Accounting

**8.2 Invoicing**: Within a reasonable time after the first day of each month, FG&E shall submit an invoice to the Transmission Customer for the charges for all services furnished under the OATT during the preceding month. The invoice shall be paid by the Transmission Customer within twenty (20) days of receipt. All payments shall be made in immediately available funds payable to FG&E, or by wire transfer to a bank named by FG&E.

**8.4 Customer Default**: In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to FG&E on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after FG&E notifies the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, FG&E may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission So approves any such request. In the event of a billing dispute between FG&E and the Transmission Customer, FG&E will continue to provide service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute,

pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then FG&E may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy.

## **II.10.2 Stranded Cost Recovery**

FG&E may seek to recover stranded costs from the Transmission Customer pursuant to this OATT in accordance with the terms, conditions and procedures set forth in FERC Order No. 888. However, FG&E must separately file any specific proposed stranded cost charge under Section 205 of the Federal Power Act.

## SECTIONS SUPPLEMENTING SCHEDULE 21 OF THE OATT

## I. Local Point-to-Point Service Over the Local Network Owned by FG&E

## Preamble

In addition to the provisions set forth in Schedule 21 of the OATT, the provisions of this Schedule 21-FG&E shall govern Local Point-To-Point transactions using the Local Network owned by FG&E. Provisions of this Schedule 21-FG&E shall have priority over any conflicting provisions in the Tariff. The section numbers of this Schedule 21-FG&E correspond to or are consecutive to the sections of Schedule 21 of the OATT that are affected by the additional provisions herein. To the extent not otherwise covered in the OATT, the then-current ISO New England Operating Documents, or the TOA, or the rules adopted thereunder, whenever FG&E implements least-cost redispatch procedures in response to a transmission constraint, FG&E and the Transmission Customer(s) taking Local Point-To-Point Service will each bear a proportionate share of the total redispatch cost.

## 3) Service Availability

**b) Determination of Available Transfer Capability (ATC)**: A description of FG&E's specific methodology for assessing ATC is contained in Attachment C of this Schedule. In the event sufficient transfer capability may not exist to accommodate a service request, FG&E will respond by performing a System Impact Study.

g) Real Power Losses: Real power losses are associated with all transmission service.

FG&E is not obligated to provide real power losses. The Transmission Customer is responsible for replacing losses associated with all transmission service as calculated by FG&E. The applicable real power loss factors tabulated below will be applied to metered loads and Reserved Capacity amounts to account for losses on FG&E's system. The applicable real power loss factors are as follows:

Firm Local Point-to-Point Service = 0.72% at 69 kV subtransmission. Non-firm Local Point-to-Point Service = 0.72% at 69 kV subtransmission.

#### 6) **Procedures for Arranging Non-Firm Local Point-To-Point Service**

**f) Determination of Available Transfer Capability**: Following receipt of a tendered schedule FG&E will make a determination on a non-discriminatory basis of ATC pursuant to Attachment C of this Schedule. Such determination shall be made as soon as reasonably practicable after receipt, but not later than the following time periods for the following terms of service (i) thirty (30) minutes for hourly service, (ii) thirty minutes for daily service, (iii) four (4) hours for weekly service, and (iv) two (2) days for monthly service (during FG&E's normal business hours of 8:00 a.m. to 4:30 p.m., Monday to Friday).

## 11) Sale or Assignment of Local Point-to-Point Service

c) Information on Assignment or Transfer of Service: FG&E currently has waiver from the obligations of FERC Order No. 889 to maintain an OASIS. In the future, upon implementation of any FG&E OASIS site, resellers may use FG&E's OASIS site to post transmission capacity available for resale.

## II. Local Network Service using Non-PTF Owned by FG&E

#### Preamble

In addition to the provisions set forth in Schedule 21 of the OATT, the provisions of this Schedule 21-FG&E shall govern Local Network Service using Non-PTF owned by FG&E. Provisions of this Schedule 21-FG&E shall have priority over any conflicting provision in the Tariff. The section numbers of this Schedule 21-FG&E correspond to the sections of Schedule 21 of the OATT that are affected by the additional provisions herein. Local Network Service allows the Network Customer to integrate, economically dispatch, and regulate its current and planned Network Resources to serve its Network Load in a manner comparable to that in which FG&E utilizes its Non-PTF to serve its Native Load Customers. Local Network Service also may be used by the Network Customer to deliver economy energy purchases to its Network Load from non-designated resources on an as-available basis without additional charge. Transmission service for sales to non-designated loads will be provided pursuant to the applicable terms and conditions of Schedule 21 of the OATT.

#### 2) Availability of Local Network Service

**f) Real Power Losses**: The Network Customer is responsible for replacing losses associated with all transmission service as calculated by FG&E. The applicable real power loss factors tabulated below will be applied to metered loads and Reserved Capacity amounts to account for losses on FG&E's system. The applicable real power loss factors are as follows:

Local Network Service = 0.72% at 69 kV subtransmission.

#### 8) Load Shedding and Curtailments

a) **Procedures**: Prior to the Service Commencement Date, FG&E and the Network Customer shall establish Load Shedding and Curtailment procedures pursuant to Section II.20 of the Tariff, with the objective of responding to contingencies on the Non-PTF. The Parties will implement such programs during any period when the ISO, the Local Control Center or FG&E determines that a system contingency exists and such procedures are necessary to alleviate such contingency. FG&E will notify all affected Network Customers in a timely manner of any scheduled Curtailment.

b) Transmission Constraints: During any period when FG&E determines that a transmission constraint exists on the Local Network, and such constraint may impair the reliability of FG&E's system, FG&E will take whatever actions, consistent with then-current ISO New England Operating Documents or the TOA, and the rules adopted thereunder, and with Good Utility Practice, that are reasonably necessary to maintain the reliability of FG&E's system. To the extent ISO determines that the reliability of the ISO New England transmission system can be maintained by redispatching resources, FG&E will initiate procedures pursuant to the OATT,

the then-current ISO New England Operating Documents, or the TOA, and the rules adopted thereunder to redispatch all Network Resources and FG&E's own resources on a least-cost basis without regard to the ownership of such resources. Any redispatch under this section may not unduly discriminate between FG&E's use of the Local Network on behalf of its Native Load Customers and any Network Customer's use of the Local Network to serve its designated Network Load.

c) Cost Responsibility for Relieving Transmission Constraints: To the extent not otherwise covered in the OATT, the then-current ISO New England Operating Documents, or the TOA, or the rules adopted thereunder, whenever FG&E implements least-cost redispatch procedures in response to a transmission constraint, FG&E and the Network Customer(s) will each bear a proportionate share of the total redispatch cost based on their respective Load Ratio Shares.

**d**) **Curtailments of Scheduled Deliveries**: If a transmission constraint on FG&E's Local Network cannot be relieved through the implementation of least-cost redispatch procedures and FG&E determines that it is necessary to Curtail scheduled deliveries, the Parties shall Curtail such schedules in accordance with Section II.22 of the Tariff.

e) Allocation of Curtailments: The ISO, the Local Control Center or FG&E shall, on a non-discriminatory basis, Curtail the transaction(s) that effectively relieve the constraint. However, to the extent practicable and consistent with Good Utility Practice, any Curtailment will be shared by FG&E and Network Customers in proportion to their respective Load Ratio Shares. Neither the ISO, the Local Control Center, nor FG&E shall direct the Network Customer to Curtail schedules to an extent greater than either would Curtail FG&E's schedules under similar circumstances.

f) Load Shedding: To the extent that a system contingency exists on FG&E's Local Network and the ISO, the Local Control Center or FG&E determines that it is necessary for FG&E and the Network Customers to shed load, the Parties shall shed load in accordance with previously established procedures in accordance with Section II.22 of the Tariff, the then-current ISO New England Operating Documents, or the TOA, and the rules adopted thereunder.

g) System Reliability: Notwithstanding any other provisions of this Schedule, FG&E

reserves the right, consistent with Good Utility Practice and on a not unduly discriminatory basis, to Curtail Local Network Service without liability on the part of FG&E for the purpose of making necessary adjustments to, changes in, or repairs on FG&E's lines, substations, and facilities, and in cases where the continuance of Local Network Service would endanger persons or property. In the event of any adverse conditions or disturbances on FG&E's Local Network or on any other system(s) directly or indirectly interconnected with FG&E's Local Network, FG&E, consistent with Good Utility Practice, also may Curtail Local Network Service in order to (i) limit the extent or damage of the adverse condition(s) or disturbance(s), (ii) prevent damage to generating or transmission facilities, or (iii) expedite restoration of service. FG&E will give the Network Customer as much advance notice as is practicable in the event of such Curtailment. Any Curtailment of Local Network Service will not be unduly discriminatory relative to FG&E's use of its Local Network on behalf of its Native Load Customers. FG&E shall specify the rate treatment and all related terms and conditions applicable in the event that the Network Customer fails to respond to established Load Shedding and Curtailment procedures.

#### 9) Rates and Charges

In addition to the above sections that correspond to sections in Schedule 21 of the OATT, the following additional provision shall apply to Local Network Service over FG&E's Local Network.

a) Monthly Demand Charge: The Network Customer shall pay a Monthly Demand Charge which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of FG&E's Annual Transmission Revenue Requirement as specified in Attachment H to this Schedule 21-FG&E.

**10) Determination of Network Customer's Local Monthly Network Load**: The Network Customer's local monthly Network Load is its hourly load (including its designated Network Load not physically interconnected with FG&E under Section II.5(c) of Schedule 21 of the OATT) coincident with the FG&E's Monthly Local Network Peak. Monthly revenue requirements not otherwise paid for through charges to Eligible Customers for Local Point-to-Point Service will be allocated among FG&E's Network Customers receiving service under the tariff on the basis of their loads during the hour in the month in which the total connected load to the local network is at its maximum, without any adjustment for credits for generation.

In addition to the above sections that correspond to sections in Schedule 21 of the OATT, the following

three provisions shall apply to Local Network Service over FG&E's local network.

**10a) Determination of FG&E's Monthly Local Network Load**: FG&E's monthly Local Network Load is FG&E's Monthly Local Network Peak minus the coincident peak usage of all firm Local Point-To-Point Service customers pursuant to Schedule 21 of the OATT plus the Reserved Capacity of all firm Local Point-To-Point Service customers.

**10b) Recovery of PTF Transmission Revenue Requirements**: The portion of FG&E's annual transmission revenue requirements with respect to PTF which is not recovered through the distribution of revenues from Regional Network Service or Local Point-to-Point Service shall be recovered from Eligible Customers taking Regional Network Service or Local Point-to-Point Service pursuant to Section II.12.2(b) of the Tariff.

#### Local Scheduling, System Control and Dispatch Service

This service is required to schedule the movement of power through, out of, within, or into FG&E's Local Network Control Area. Local Scheduling, System Control and Dispatch Service is to be provided directly by FG&E and the ISO. The Transmission Customer must purchase this service from FG&E. The charges for FG&E's Local Scheduling, System Control and Dispatch Service are to be based on the rates set forth below. To the extent that the ISO performs this service for FG&E, charges to the Transmission Customer are to reflect only a pass-through of the costs charged to FG&E by the ISO.

Each firm Local Point-To-Point Service Customer under this Tariff will be charged for Local Scheduling, System Control and Dispatch Services for the total Reserved Capacity specified in each reservation for firm Local Point-To-Point Service made under the Tariff at the rates set forth in Appendix A of this Schedule 1.

Each Network Customer under this Tariff will be charged a monthly Local Scheduling, System Control and Dispatch Service Demand Charge, which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of the Formula Requirements specified in Appendix B of this Schedule 1.

Each Transmission Customer with generation within the ISO's Control Area shall be required also to provide for Scheduling, System Control and Dispatch Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting with the ISO for these services on an unbundled basis. FG&E will make available Generation Scheduling, System Control and Dispatch Service at the rates set forth in Appendix C of this Schedule 1.

Each Transmission Customer with generation located outside of the ISO Control Area shall be required to provide for Scheduling, System Control and Dispatching Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting for these services from the provider of these services within the Control Area where the generation is located. FG&E shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule 1 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

#### Appendix A

## **Determination Of**

# FG&E's Local Network Point-To-Point Formula Rate For Local Scheduling, System Control And Dispatch Service

FG&E's Formula Rate for Point-To-Point Local Scheduling, System Control and Dispatch Service ("Formula Rate") is an annual rate determined from the following formula.

FORMULA RATE<sub>i</sub> =  $A_{i-1} - B_{i-1}$ ..... $C_{i-1}$ 

## WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

•  $A_{i-1}$  is the Annual Control Center Expenses (expressed in dollars) of FG&E for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule 1.

•  $B_{i-1}$  is the actual local scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual local scheduling and dispatch revenues shall be those recorded on the books of FG&E in FERC Account No. 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

•  $C_{i-1}$  is the single annual coincident peak transmission load (expressed in kilowatts) of FG&E for the calendar year prior to the Service Year, as reported in FERC Form No. 1.

# Schedule 1 Appendix A Exhibit 1

# **Determination of Annual Control Center Expenses**

The rate formula for determination of the annual control center expenses revenue requirements for FG&E is determined as follows:

A. ANNUAL CONTROL CENTER EXPENSES = Sum of FG&E's (Account 556 System Control and Load Dispatching Expense) + (Account 557 Other Expense) X .50\* for the calendar year prior to the Service Year.

\* This factor reflects allocation to the transmission function of a portion (50 percent) of the costs recorded in Accounts 556 and 557 associated with dispatching transmission and generating facilities. This 50 percent allocation of control center costs is based on two functions performed by the control center (i) control of generation and (ii) control of transmission.

## Appendix B

# Determination of FG&E's Network Formula Requirements For Local Scheduling, System Control And Dispatch Service

FG&E's formula requirements for Network Local Scheduling, System Control and Dispatch Service is determined from the following formula.

Formula Requirements<sub>i</sub> =  $A_{i-1} - B_{i-1}$ 

## WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

•  $A_{i-1}$  is the Annual Control Center Expenses (expressed in dollars) of FG&E for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to Appendix A of Schedule 1.

•  $B_{i-1}$  is the actual local scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual local scheduling, system control and dispatch revenues shall be those recorded on the books of FG&E in FERC Account No. 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

## Appendix C

# Determination Of FG&E's Formula Rate For Generation Scheduling, System Control And Dispatch Service

FG&E's Formula Rate for Generation Scheduling, System Control and Dispatch Service ("Formula Rate") shall be calculated using the Formula Rate for Point-to-Point Local Scheduling, System Control and Dispatch Service in Appendix A of Schedule 21 - FG&E.

## Long-Term Firm Local and Short-Term Firm Local Point-to-Point Service

The Transmission Customer shall compensate FG&E each month for firm Reserved Capacity at the sum of the applicable charges set forth below:

## 1) Yearly delivery:

The Yearly Delivery Charge per kW shall be FG&E's Annual Transmission Revenue Requirement (determined in accordance with Attachment H of this Tariff) divided by FG&E's Total Peak Load for the corresponding calendar year. Total Peak Load, calculated based on the monthly average for the year, shall be FG&E's peak load, minus the coincident peak of all firm local point-to-point customers, plus the contract demand reservation for firm local point-to-point customers.

## 2) Monthly delivery:

The Monthly Delivery Charge per kW shall be determined by dividing the Yearly Delivery Charge by 12.

## **3) Weekly delivery**:

The Weekly Delivery Charge per kW shall be determined by dividing the Yearly Delivery Charge by 52.

## 4) Daily delivery:

The Daily Delivery Charge per kW shall be determined by dividing the Yearly Delivery Charge by 365.

The total delivery charge in any week, pursuant to a reservation for daily delivery, shall not exceed the Weekly Delivery Charge specified in section (3) above times the highest amount in kilowatts of firm Reserved Capacity in any day during such week.

5) **Discounts**: Three principal requirements apply to discounts for transmission service as follows (1) any offer of a discount made by FG&E must be announced to all Eligible Customers solely by posting on Unitil.com, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on Unitil.com, and (3) once a discount is negotiated, details must be immediately posted on Unitil.com. For any discount agreed upon for service on a path from point(s) of receipt to point(s) of delivery, FG&E must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all

unconstrained transmission paths that go to the same point(s) of delivery on FG&E's Local Network.

6) **Resales**: The rates and rules governing charges and discounts stated above shall not apply to resales of transmission service, compensation for which shall be governed by section I.11 (a) of Schedule 21 of the OATT.

#### Non-Firm Local Point-to-Point Service

The Transmission Customer shall compensate FG&E for non-firm Local Point-To-Point Service for non-firm Reserved Capacity up to the sum of the applicable charges set forth below:

#### 1) Monthly delivery:

The Monthly Delivery Charge shall be determined by multiplying the Monthly Delivery Charge as described on Schedule 7 by .75.

## 2) Weekly delivery:

The Weekly Delivery Charge shall be determined by multiplying the Weekly Delivery Charge as described on Schedule 7 by .75.

#### 3) Daily delivery:

The Daily Delivery Charge shall be determined by multiplying the Daily Delivery Charge as described on Schedule 7 by .75.

The total delivery charge in any week, pursuant to a reservation for Daily delivery, shall not exceed the Weekly Delivery Charge specified in section (2) above times the highest amount in kilowatts of non-firm Reserved Capacity in any day during such week.

4) Hourly delivery: The basic charge shall be that agreed upon by the Parties at the time this service is reserved and in no event shall exceed the Daily Delivery Charge specified in section (3) above divided by 24. The total delivery charge in any day, pursuant to a reservation for Hourly delivery, shall not exceed the Daily Delivery Charge specified in section (3) above times the highest amount in kilowatts of non-firm Reserved Capacity in any hour during such day. In addition, the total delivery charge in any week, pursuant to a reservation for Hourly or Daily delivery, shall not exceed the Weekly Delivery Charge specified in section (2) above times the highest amount in kilowatts of non-firm Reserved Capacity in any hour times the highest amount in kilowatts of non-firm Reserved Capacity in section (2) above times the highest amount in kilowatts of non-firm Reserved Capacity in any hour times the highest amount in kilowatts of non-firm Reserved Capacity in section (2) above times the highest amount in kilowatts of non-firm Reserved Capacity in any hour during such week.

5) **Discounts**: Three principal requirements apply to discounts for transmission service as follows (1) any offer of a discount made by FG&E must be announced to all Eligible Customers solely by posting on Unitil.com, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on Unitil.com, and (3) once a

discount is negotiated, details must be immediately posted on Unitil.com. For any discount agreed upon for service on a path from point(s) of receipt to point(s) of delivery, FG&E must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on FG&E's Local Network.

6) **Resales**: The rates and rules governing charges and discounts stated above shall not apply to resales of transmission service, compensation for which shall be governed by section I.11 (a) of Schedule 21 of the OATT.

## **DISTRIBUTION ADDER UNDER TARIFF**

In the case where distribution facilities of FG&E are employed in providing service under Schedule 21 of the OATT, the Transmission Customer shall compensate FG&E for the use of such facilities. In addition to the charges contained in this Tariff, the compensation for such distribution facilities will be determined on a case-by-case basis.

All such charges shall be subject to appropriate regulatory approval.

#### ATTACHMENT C

#### Methodology To Assess Available Transfer Capability

#### 1. Introduction

ISO is the regional transmission organization (RTO) for the New England Control Area. The New England Control Area includes the transmission system located in the states of Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island, and Vermont, but does not include the transmission system in northern Maine (i.e., Aroostook and parts of Penobscot and Washington Counties) that is radially connected to New Brunswick and administered by the Northern Maine Independent System Administrator. The New England Control Area is comprised of PTF, non-PTF, OTF, MTF, and is interconnected to three neighboring Balancing Authority Areas ("BAA") with various interface types.

As part of its RTO responsibilities, the ISO is registered with the North American Electric Reliability Corporation ("NERC") as several functional model entities that have responsibilities related to the calculation of ATC as defined in the following NERC Standards: MOD-001 – Available Transmission System Capability ("MOD-001"). MOD-004 – Capacity Benefit Margin ("MOD-004"), and MOD-008 – Transmission Reliability Margin Calculation Methodology ("MOD-008"). The extent of those responsibilities is based on various Commission approved transmission operating agreements and the provisions of the ISO New England Operating Documents.

While the ISO is the Transmission Service Provider for regional transmission service ("Regional Transmission Service") associated with Pool Transmission Facilities, the Participating Transmission Owners ("PTOs") provide local transmission service over Non-Pool Transmission Facilities within the RTOP footprint and are responsible for calculating TTC and ATC associated with Local Transmission Service provided under Schedule 21 pursuant to the Transmission Operating Agreement ("TOA"). Pursuant to CFR § 37.6(b)<sup>2</sup> of the FERC Regulations, Transmission Provider's are obligated to calculate and post TTC and ATC for each Posted Path. The ISO is not responsible for the calculation of these values.

Posted Path is defined as any control area to control area interconnection; any path for which service is

<sup>2</sup> Section §37.6(b) Posting transfer capability. The available transfer capability on the Transmission Provider's system (ATC) and the total transfer capability (TTC) of that system shall be calculated and posted for each Posted Path as set out in this section.

denied, curtailed or interrupted for more than 24 hours in the past 12 months; and any path for which a customer requests to have ATC or TTC posted. For this last category, the posting must continue for 180 days and thereafter until 180 days have elapsed from the most recent request for service over the requested path. For purposes of this definition, an hour includes any part of any hour during which service was denied, curtailed or interrupted.<sup>3</sup>

FG&E does not currently have any Posted Paths based on the above definition. However, to the extent that FG&E does in the future have a Posted Path, FG&E will calculate TTC using the NERC Standard MOD-029 – Rated System Path Methodology ("MOD-029") as outlined below.

# **1.1 Scope of Document**

The scope of this document is limited to those functions performed by FG&E as the Transmission Service Provider of Schedule 21-FG&E Point-to Point transmission service over Local Facilities pursuant to the PTOs' Transmission Operating Agreement and the ISO OATT:

- Methodology for calculating Total Transfer Capability (TTC)
- Methodology for calculating Available Transfer Capability (ATC)
- Existing Transmission Commitment (ETC)
- Use of Transmission Reliability Margin (TRM)
- Use of Capacity Benefit Margin (CBM)
- Use of Rollover Rights (ROR) in the calculation of ETC

TTC and ATC are required to be calculated only for certain non-PTF internal Posted Paths over which Local Point-to-Point transmission service is provided under Schedule 21-FG&E. TTC and ATC is not calculated by FG&E for Local Network Service because ISO employs a market model for economic, security constrained dispatch of generation, and FG&E does not require advance reservation for such network service.

# 2. Transmission Service in the New England Markets

Since the inception of the OATT for New England, the process by which generation located inside New England supplies energy to the bulk electric system has differed from the Commission pro forma OATT.

<sup>3</sup> Section § 37.6(b)(1)(i).

The fundamental difference is that internal generation is dispatched in an economic, security constrained manner by the ISO rather than utilizing a system of physical rights, advance reservations and point-to-point transmission service. Through this process, internal generation provides offers that are utilized by the ISO in the Real-Time Energy Market dispatch software. This process provides the least-cost dispatch to satisfy Real-Time load on the system.

In addition to offers from generation within New England, entities may submit External Transactions to move energy into the New England Control Area, out of the New England Control Area or through the New England Control Area. The Real-Time Energy Market clears these External Transactions based on forecast Locational Marginal Pricing (LMPs) and the transfer capability of the associated external interfaces. With those External Transactions in place, the Real-Time Energy Market dispatches internal generation in an economic, security constrained manner to meet Real-Time load within the region.

The process for submitting External Transactions into the Real-Time Energy Market does not require an advance physical reservation for use of the PTF. In the event that the net of the economic External Transactions is greater than the transfer capability of the associated external interface, the External Transactions selected to flow are selected based on the rules specified in the Tariff. For any External Transactions that are confirmed to flow in Real-Time based on the economics of the system, a transmission reservation for RNS or Through or Out Service is created after-the-fact to satisfy the transparency needs of the market.

The process described above is applicable to the PTF within the ISO Area, and non-PTF Local Facilities where utilized for Local Network Service by generation or load. However, FG&E owns Local Facilities over which an advance transmission service reservation for firm or non-firm transmission service may be required. On those Local Facilities, the market participant may obtain a transmission service reservation from FG&E under Schedule 21-FG&E prior to delivery of energy into the Real-Time Energy Market.<sup>4</sup> This document addresses the calculation of ATC and TTC for these non-PTF internal paths.

## 3. Schedule 21-FG&E Total Transfer Capability (TTC)

The TTC on FG&E's non-PTF Local Facilities that require Point-to-Point transmission service reservations are relatively static values and are calculated using the NERC Standard MOD-029 – Rated System Path Methodology. TTC is the amount of electric power that can be moved or transferred reliably from one area to another area of the interconnected transmission systems by way of all transmission lines

<sup>4</sup> See n - 2, 3 and 6, supra.

(or paths) between those areas under specified system conditions. FG&E calculates TTC according to this definition applying the process as described below.

# **3.1** Guidelines and Principles

When estimating TTC, FG&E will apply the following, as amended and/or adopted from time to time

- Good Utility Practice
- NERC criteria and guidelines
- ISO New England criteria, rules and reliability standards
- Northeast Power Coordinating Council (NPCC) criteria and guidelines
- Fitchburg Gas and Electric Light Company guides

## 3.2 Transmission System Model Representation

FG&E will estimate TTC using transmission system load flow models developed for FG&E's system. The models may include representations of other neighboring systems. FG&E will use system models that it deems appropriate for study of the request for firm transmission service. Additional system models and operating conditions, including assumptions specific to a particular analysis, may be developed for conditions not available in the library of load flow cases. The system models may be modified, if necessary, to include additional system information on load, transfers and configuration, as it becomes available.

## **3.3** Contingency Analysis

FG&E will perform, if necessary, power flow and transient stability analysis to ensure that the interface's physical limits will not be violated for credible system contingencies per NERC, NPCC and ISO reliability criteria. TTC, based on contingency analysis, is the incremental transfer capability of the transmission system following the loss of the most critical element while maintaining thermal, and stability performance of the system within acceptable regional practices and consistent with guidelines of Item 3.1 of this Attachment.

## 3.4 Posting TTCs

When necessary, FG&E will estimate TTC as outlined above and post on its website.

## 4. Capacity Benefit Margin (CBM)

CBM is defined as the amount of firm transmission transfer capability set aside by a TSP for use by the

Load Serving Entities. The ISO does not set aside any CBM for use by the Load Serving Entities, because of the New England approach to capacity planning requirements in the ISO New England Operating Documents. Load Serving Entities operating within the New England Control Area are required to arrange for their Capacity Requirements prior to the beginning of any given month in accordance with ISO Tariff, Section III.13.7.3.1 (Calculation of Capacity Requirement and Capacity Load Obligation). Load Serving Entities do not utilize CBM to ensure that their capacity needs are met; therefore, CBM is not applicable within the New England market design. Accordingly, for purposes of ATC calculation, CBM for the New England Control Area is set to zero (0).

#### Existing Transmission Commitments, Firm (ETC<sub>F</sub>)

The ETC<sub>F</sub> are those confirmed firm transmission reservations (PTP<sub>F</sub>) plus any rollover rights for firm transmission reservations (ROR<sub>F</sub>) that have been exercised. There are no allowances necessary for Native Load forecast commitments (NL<sub>F</sub>), Network Integration Transmission Service (NITS<sub>F</sub>), grandfathered Transmission Service (GF<sub>F</sub>) and other service(s), contract(s) or agreement(s) (OS<sub>F</sub>) to be considered in the ETC<sub>F</sub> calculation.

## Existing Transmission Commitments, Non-Firm(ETC<sub>NF</sub>)

The  $(\text{ETC}_{NF})$  are those confirmed non-firm transmission reservations  $(\text{PTP}_{NF})$ . There are no allowances necessary for non-firm Network Integration Transmission Service (NITS<sub>NF</sub>), non-firm grandfathered Transmission Service (GF<sub>NF</sub>) or other service(s), contract(s) or agreement(s) (OS<sub>NF</sub>).

#### 5. Transmission Reliability Margin (TRM)

TRM is the amount of transmission transfer capability set aside to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as system conditions change. It is used only for external interfaces under the New England market design. FG&E, under Schedule 21, does not have any external interfaces, and therefore, TRM for FG&E's non-PTF facilities is zero.

#### 6. Calculation of ATC for FG&E's Local Facilities

#### **General Description**

This section defines the ATC calculations performed by FG&E pursuant to MOD-029 for its non-PTF internal interfaces. Consistent with the NERC definition, the equation for Available Transfer Capability is: ATC = (TTC - CBM - TRM - Existing Transmission Commitments + Postbacks + counterflows). As discussed above, the CBM and TRM for the PTF interfaces for which FG&E calculates ATC are zero (0). As consistent with the ISO calculation, the equations for firm and non-firm Available Transfer Capability are:

Firm ATC = (TTC - CBM - TRM - firm ETC)Non-firm ATC =  $(TTC - CBM - TRM - firm and non-firm ETC)^5$ 

As discussed above, the TRM and CBM for FG&E's non-PTF paths are zero. The purpose of the Existing Transmission Commitments ("ETC") component of the ATC equation is for FG&E to reduce the amount of ATC by the amount of existing firm transmission commitments that are not otherwise included in CBM or TRM. There is no requirement to purchase transmission service in advance of flowing energy in Real-Time, and there is no MW amount set aside by FG&E on any interface. One such example is point-to-point service commitments. Point-to-point service commitments sharing common transmission paths would be combined through system modeling to calculate the net existing transmission capacity (ETC) impact. This ETC value is then used in the ATC calculation shown above. Therefore there are no Existing Transmission Commitments to be applied in the ATC equation. For this reason, ETC equals zero (0) for the purposes of ATC calculation. Because Postbacks and counterflows are related to ETC and ETC is zero (0), both Postbacks and counterflows also are equal to zero (0).

As described in Section 2, under Schedule 21-FG&E, FG&E requires the purchase of transmission service in advance of delivery of energy to the New England Wholesale Market over certain non-PTF paths, and those existing transmission commitments would be applied to the ATC equation for the specific posted path. As a practical matter, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

Entities submit their bids and offers to move energy into, out of and through the Energy Market through External Transactions. As Real-Time approaches, the ISO determines which of the submitted External Transactions will be scheduled in the coming hour in accordance with the rules set forth in the ISO New

<sup>5</sup> Existing Transmission Commitments ("ETC")

England Operating Documents. Basically, the ATC of the non-PTF assets in the New England market is almost always positive. The ATC is equal to the amount of External Transactions that the ISO will schedule on an interface for the designated hour. With this simplified version of ATC, there is no detailed algorithm to be described or posted other than: ATC equals TTC. Thus, for those non-PTF facilities that serve as a path for the FG&E's Schedule 21-FG&E Point-to-Point Transmission Customers, FG&E would post the ATC as 9999, consistent with industry practice. ATC on these paths varies depending on the time of day. However, it would be posted with an ATC of "9999" to reflect the fact that there are no restrictions on these paths for commercial transactions.

## 6.1 Calculation of Schedule 21-FG&E Firm ATC (ATC<sub>F</sub>)

6.1.1 Calculation of ATC<sub>F</sub> in the Planning Horizon (PH)

For purposes of this Attachment C, PH is any period before the Operating Horizon.

Consistent with the NERC definition,  $ATC_F$  is the capability for firm transmission reservations that remain after allowing for TRM, CBM,  $ETC_F$ , Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM are zero. Firm Transmission Service under Schedule 21-FG&E that is available in the Planning Horizon (PH) includes: Yearly, Monthly, Weekly, and Daily. Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-FG&E transmission reservations are not considered in the ATC calculation. Therefore, ATC<sub>F</sub> in the PH is equal to the TTC minus  $ETC_F$ 

**6.1.2** Calculation of ATC<sub>F</sub> in the Schedule 21-FG&E Operating Horizon (OH)

For purposes of this Attachment C, OH is noon eastern prevailing time each day. At that time, the OH spans from noon through midnight of the next day for a total of 36 hours. As time progresses the total hours remaining in the OH decreases until noon the following day when the OH is once again reset to 36 hours.

Consistent with the NERC definition,  $ATC_F$  is the capability for firm transmission reservations that remain after allowing for  $ETC_F$ , CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM is zero. Daily firm Transmission Service under Schedule 21-FG&E

is the only firm service offered in the Operating Horizon (OH). Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-FG&E transmission reservations are not considered in the  $ATC_F$  calculation. Therefore,  $ATC_F$  in the OH is equal to the TTC minus ETC<sub>F</sub>.

**6.1.3** Because firm Schedule 21-FG&E transmission service is not offered in the Scheduling Horizon (SH): ATC<sub>F</sub> in the SH is zero.

# 6.2 Calculation of Schedule 21-FG&E Non-Firm ATC (ATC<sub>NF</sub>)

**6.2.1** Calculation of ATC<sub>NF</sub> in the PH

 $ATC_{NF}$  is the capability for non-firm transmission reservations that remain after allowing for ETC <sub>F</sub>, ETC<sub>NF</sub>, scheduled CBM (CBM<sub>S</sub>), unreleased TRM (TRM<sub>U</sub>), non-firm Postbacks (Postbacks<sub>NF</sub>) and non-firm counterflows (counterflows<sub>NF</sub>).

As discussed above, the TRM and CBM for Schedule 21-FG&E are zero. Non-firm ATC available in the PH includes: Monthly, Weekly, Daily and Hourly. TRM <sub>U</sub>, Postbacks<sub>NF</sub> and counterflows<sub>NF</sub> of Schedule 21-FG&E transmission reservations are not considered in this calculation. Therefore,  $ATC_{NF}$  in the PH is equal to the TTC minus ETC <sub>F</sub> and ETC<sub>NF</sub>.

**6.2.2** Calculation of ATC<sub>NF</sub> in the OH

ATC<sub>NF</sub> available in the OH includes: Daily and Hourly.

As discussed above TRM and CBM for Schedule 21-FG&E are zero.  $TRM_U$ , counterflows and  $ETC_{NF}$  are not considered in this calculation. Therefore, ATC <sub>NF</sub> in the OH is equal to the TTC minus ETC <sub>F</sub>, plus postbacks of PTP<sub>F</sub> in OH as PTP<sub>NF</sub> (Postbacks <sub>NF</sub>).

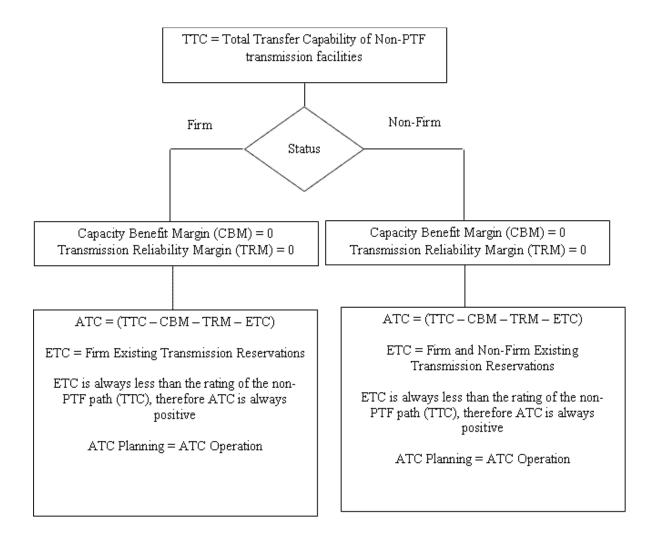
# 6.3 Negative ATC

As stated above, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

As stated above, FG&E's non-PTF facilities are primarily radial paths that provide transmission service to directly interconnected generators. It is possible, in the future, that a particular radial path may interconnect more nameplate capacity generation than the path's TTC. However, due to the ISO's security constrained dispatch methodology, the ISO will only dispatch an amount of generation interconnected to such path so as not to incur a reliability or stability violation on the subject path. Therefore, ATC in the PH, OH and SH may become zero, but will not become negative.

#### ATC Process Flow Diagram for Non-PTF Interfaces

The process flow diagram illustrates the steps through which ATC is calculated both on an operating and planning horizon.



### 7. Posting of Schedule 21-FG&E ATC

#### 7.1 Location of ATC Posting.

When necessary, FG&E will estimate ATC values for these internal paths as outlined above and post on its website, http://www.unitil.net/nepool/ma/pdf/atc\_cbm\_ttc\_trm\_fge.pdf.

#### 7.2 Updates To ATC

When any of the variables in the ATC equations change, the ATC values are recalculated and immediately posted.

#### 7.3 Coordination of ATC Calculations

Schedule 21-FG&E non-PTF has no external interfaces. Therefore it is not necessary to coordinate the values.

#### 7.4 Mathematical Algorithms

A link to the actual mathematical algorithm for the calculation of ATC for FG&E's non-PTF internal interfaces is located at http://www.unitil.com/sites/default/files/pdfs/fge\_atc\_algorithms\_3\_11.pdf.

#### ATTACHMENT D

#### Methodology for Completing a System Impact Study

FG&E will perform System Impact Studies for the purpose of determining the feasibility of integrating Network Load and Network Resources into FG&E's Local Network under Schedule 21 of the OATT, or for the purpose of determining the feasibility of providing Local Point-To-Point Service under this Tariff. All System Impact Studies will be completed using the same method employed by FG&E to integrate into FG&E's Local Network (i) generation resources owned or acquired to serve its Native Load Customers, and (ii) its Native Load Customers' load. Specifically, System Impact Studies will be performed by applying the applicable criteria, rules, standards and operating procedures. In addition to applying the applicable criteria, rules, standards and operating procedures, to determine the feasibility of providing service to Network Load and/or Local Point-To-Point Service, System Impact Studies will also be performed by applying Unitil Service Corp.'s "Electric System Planning Guide".

#### ATTACHMENT E

# Index Of Local Point-To-Point Service Customers

Customer Fitchburg Gas and Electric Light

Company

Pinetree Power Fitchburg Inc.

Date of <u>Service Agreement</u> September 10, 1996

March 9, 1999

#### ATTACHMENT H

#### Annual Transmission Revenue Requirement For Local Network Service

The Transmission Revenue Requirement for FG&E will reflect FG&E's costs with respect to transmission facilities not related to PTF ("Non PTF"). Except as provided below for the transitional implementation of this formula rate, the Transmission Revenue Requirement will be an annual calculation, effective June 1, based on the previous year's calendar data as reported in FG&E's FERC Form 1 report for that year, or other reasonable documentation, using end-of-year balances for each rate base item, as set forth below. The initial Transmission Revenue Requirement shall be effective October 1, 2003 through May 31, 2004 based on calendar year 2002 data as adjusted, as approved by the Commission. Further, the Transmission Revenue Requirement to be effective June 1, 2004, based on calendar year 2003 data, shall include an adjustment to annualize the impact on 2003 depreciation expense of revised depreciation rates effective October 1, 2003, as approved by the Commission. Depreciation expense shall be calculated according to Appendix A of this attachment, as approved by the Commission.

Beginning July 31, 2004, FG&E shall make an annual informational filing on or before July 31 of each year showing the Transmission Revenue Requirement in effect for the period beginning June 1 of that year through May 31 of the subsequent year. If there are corrections made to the information reflected in the informational filing after it has been submitted, FG&E will file corrections to the informational filing.

#### I. FORMULA

A. The Transmission Revenue Requirement for FG&E's Non-PTF shall equal the sum of the following: (A) Non-PTF Return and Associated Income Taxes, plus (B) Non-PTF Depreciation Expense, plus (C) Non-PTF Amortization of Intangible Plant and Other Regulatory Assets/Liabilities, plus (D) Non-PTF Amortization of Rate Case Expense, plus (E) Non-PTF Amortization of Loss on Reacquired Debt, minus (F) Non-PTF Amortization of Investment Tax Credits, plus (G) Non-PTF Property Tax Expense, plus (H) Non-PTF Payroll Tax Expense, plus (I) Non-PTF Transmission Operation and Maintenance Expense, plus (J) Non-PTF Customer Accounting Bad Debts Expense, plus (K) Non-PTF Administrative and General Expense, plus (L) Non-PTF Transmission Related Taxes and Fees Charge, minus (M) Non-PTF Transmission Rents Received from Electric Property, minus (N) Non-PTF Revenue for Through or Out Service.

B. Each of the components of A. above shall be calculated by subtracting the related PTF costs and revenues from the same calendar year, as included in ISO-NE's OATT, from the total transmission costs and revenues as described in Section III. Support Expense included in PTF shall only be included in this computation to the extent these costs are included in the determination of total transmission costs.

#### II. DEFINITIONS

#### A. ALLOCATION FACTORS

1. <u>Transmission Wages and Salaries Allocation Factor</u> shall equal the ratio of Transmission–related direct wages and salaries to FG&E's total direct wages and salaries, excluding administrative and general wages and salaries.

2. <u>Transmission Plant Allocation Factor</u> shall equal the ratio of the sum of (1) Transmission Plant, (2) Transmission Related Intangible Plant, (3) Transmission Related General Plant, and (4) Transmission Related Common Plant, to Total Plant in Service.

3. <u>Transmission Revenue Allocation Factor</u> shall equal the ratio of Total Internal Transmission Revenue to Total Billed Revenue from Sales to Ultimate Customers.

#### B. TERMS

<u>Administrative and General Expense</u> shall equal FG&E's expenses as recorded in FERC Account Nos. 920-935, excluding FERC Account Nos. 924, 928 and 930.1.

<u>Amortization of Intangible Plant and Common Plant</u> shall equal FG&E's expenses related to Intangible Plant and Common Plant as recorded in FERC Account No. 404.

<u>Amortization of Investment Tax Credits</u> shall equal FG&E's credits as recorded in FERC Account No. 411.4.

<u>Amortization of Loss on Reacquired Debt</u> shall equal FG&E's expenses as recorded in FERC Account No. 428.1.

<u>Amortization of Other Regulatory Assets/Liabilities-FAS 109</u> shall equal FG&E's expenses related to Other Regulatory Assets/Liabilities–FAS 109 as recorded in FERC Account No. 407.

<u>Amortization of Rate Case Expenses</u> shall equal FG&E's expenses related to the deferred costs of regulatory rate proceedings related to transmission service as approved by FERC and as recorded in FERC Account No. 407.

<u>Common Plant</u> shall equal FG&E's gross balance of the plant common to both electric and gas operations as recorded in FERC Account Nos. 303, 310, 389-399, excluding capital leases.

<u>Common Plant Amortization Reserve</u> shall equal FG&E's Common Plant reserve balances as recorded in FERC Account No. 111.

<u>Common Plant Depreciation Expense</u> shall equal FG&E's Common Plant expenses as recorded in FERC Account No. 403.

<u>Common Plant Depreciation Reserv</u>e shall equal FG&E's Common Plant reserve balance as recorded in FERC Account No. 108.

<u>Customer Accounting Bad Debts Expense</u> shall equal FG&E's expenses as recorded in FERC Account No. 904.

General Plant shall equal FG&E's gross plant balance as recorded in FERC Account Nos. 389-399.

<u>General Plant Depreciation Expense</u> shall equal FG&E's General Plant expenses as recorded in FERC Account No. 403.

<u>General Plant Depreciation Reserve</u> shall equal FG&E's General Plant reserve balance as recorded in FERC Account No. 108.

<u>Intangible Plant</u> shall equal FG&E's gross plant balance as recorded in FERC Account No. 303 (consisting of investments in computer systems and software).

Intangible Plant Amortization Reserve shall equal FG&E's Intangible Plant reserve balance as recorded in FERC Account No. 111.

<u>Other Regulatory Assets/Liabilities–FAS 106</u> shall equal the net of FG&E's FAS 106 balance as recorded in FERC Account No. 182.3 and any FAS 106 balance as recorded in FG&E's FERC Account No. 254.

<u>Other Regulatory Assets/Liabilities–FAS 109</u> shall equal the net of FG&E's FAS 109 balance as recorded in FERC Account No. 182.3 and any FAS 109 balance as recorded in FG&E's FERC Account No. 254.

<u>Payroll Tax Expense</u> shall equal those payroll tax expenses as recorded in FG&E's FERC Account Nos. 408.1 and 409.1.

Plant Held for Future Use shall equal FG&E's balance in FERC Account No. 105.

<u>Prepayments</u> shall equal FG&E's electric prepayment balance as recorded in FERC Account No. 165. The electric portion shall be determined by multiplying the balance in FERC Account No. 165 by the ratio of electric utility plant to total utility plant as reported in FG&E's FERC Form 1.

Property Insurance Expense shall equal FG&E's expenses as recorded in FERC Account No. 924.

<u>Property Tax Expense</u> shall equal FG&E's property tax expenses as recorded in FERC Account Nos. 408.1 and 409.1.

Support Expense shall equal Transmission Support Expense as defined in the OATT Attachment F.

<u>Total Accumulated Deferred Income Taxes</u> shall equal the net of the deferred tax balances as recorded in FERC Account Nos. 281-283 and FERC Account No. 190.

<u>Total Billed Revenue from Sales to Ultimate Customers</u> shall equal FG&E's total electric service revenues as recorded in FERC Account Nos. 440, 442, 444, 445, 446, 448, and 449.

<u>Total Internal Transmission Revenue</u> shall equal FG&E's internal transmission revenues as recorded in FERC Account Nos. 440, 442, 444, 445, 446, 448 and 449.

Total Loss on Reacquired Debt shall equal FG&E's expenses as recorded in FERC Account No. 189.

Total Plant in Service shall equal FG&E's total electric gross plant balance as recorded in FERC Account

Nos. 301-399 (inclusive of electric Common Plant).

<u>Transmission Operation and Maintenance Expense</u> shall equal FG&E's electric expenses as recorded in FERC Account Nos. 560-564 and 566-576.5 and shall exclude expenses already included in PTF Transmission Support Expense, costs billed to Select Energy, Inc. under a generation related entitlement sales agreement and Account Nos. 561.4 and 575.7.

<u>Transmission Plant</u> shall equal FG&E's gross plant balance as recorded in FERC Account Nos. 350-359 excluding joint owned unit costs.

<u>Transmission Plant Depreciation Expense</u> shall equal FG&E's Transmission Plant expenses as recorded in FERC Account No. 403 less joint owned unit costs.

<u>Transmission Plant Depreciation Reserve</u> shall equal FG&E's Transmission Plant reserve balance as recorded in FERC Account 108 less joint owned unit reserves.

<u>Transmission Plant Held for Future Use</u> shall equal the transmission-related balance of electric Plant Held for Future Use.

<u>Transmission Plant Materials and Supplies</u> shall equal FG&E's balance as assigned to transmission, as recorded in FERC Account No. 154.

<u>Transmission Prepayments</u> shall equal FG&E's Prepayments multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Accumulated Deferred Income Taxes</u> shall equal FG&E's electric balance of Total Accumulated Deferred Income Taxes multiplied by the Transmission Plant Allocation Factor.

<u>Transmission Related Administrative and General Expense</u> shall equal the sum of (1) electric Administrative and General Expenses multiplied by the Transmission Wages and Salaries Allocation Factor, plus (2) electric Property Insurance Expense reduced by amounts billed to Select Energy Inc. under a generation related entitlement sales agreement and multiplied by the Transmission Plant Allocation Factor, plus (3) electric expenses included in FERC Account No. 928 related to FERC fees and assessments, plus (4) any other electric transmission related expenses included in FERC Account No. 928 plus (5) specific electric transmission related expenses included in FERC Account No. 930.1 and minus (6) any Administrative and General Expense amounts billed to Select Energy Inc. and not already deducted elsewhere, multiplied by the Transmission Wages and Salaries Allocation Factor.

Transmission Related Amortization of Intangible Plant and Other Regulatory Assets/Liabilities shall equal the sum of (1) electric Amortization of Intangible Plant and Common Plant multiplied by the Transmission Wages and Salaries Allocation Factor and (2) electric Amortization of Other Regulatory Assets/Liabilities-FAS 109 multiplied by the Transmission Plant Allocation Factor. This component shall include additional regulatory assets/liabilities as established by regulatory authority and relevant to transmission services.

<u>Transmission Related Amortization of Investment Tax Credits</u> shall equal FG&E's electric Amortization of Investment Tax Credits multiplied by the Transmission Plant Allocation Factor.

<u>Transmission Related Amortization of Loss on Reacquired Debt</u> shall equal FG&E's electric Amortization of Loss on Reacquired Debt multiplied by the Transmission Plant Allocation Factor.

<u>Transmission Related Cash Working Capital</u> shall be 12.5% allowance (45 days/360 days) of the sum of Transmission Operation and Maintenance Expense, plus Transmission Related Customer Accounting Bad Debts Expense and plus Transmission Related Administrative and General Expense.

<u>Transmission Related Common Plant</u> shall equal FG&E's electric Common Plant multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Customer Accounting Bad Debts Expense</u> shall equal FG&E's electric Customer Accounting Bad Debts Expense multiplied by the Transmission Revenue Allocation Factor.

<u>Transmission Related Depreciation & Amortization Reserve</u> shall equal the sum of (1) Transmission Plant Depreciation Reserve plus (2) electric Intangible Plant and electric Common Plant Amortization Reserves multiplied by the Transmission Wages and Salaries Allocation Factor and (3) electric General Plant and electric Common Plant Depreciation Reserves multiplied by the Transmission Wages and Salaries Allocation Factor.

Transmission Related Depreciation Expense shall equal the sum of (1) Transmission Plant Depreciation

Expense, (2) electric General Plant Depreciation Expense multiplied by the Transmission Wages and Salaries Allocation Factor and (3) electric Common Plant Depreciation Expense multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related General Plant</u> shall equal FG&E's electric General Plant multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Intangible Plant</u> shall equal FG&E's electric Intangible Plant multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Loss on Reacquired Debt</u> shall equal FG&E's electric balance of Total Loss on Reacquired Debt multiplied by the Transmission Plant Allocation Factor.

<u>Transmission Related Other Regulatory Assets/Liabilities</u> shall equal the sum of (1) FG&E's electric balance of Other Regulatory Assets/Liabilities-FAS 106 multiplied by the Transmission Wages and Salaries Allocation Factor, and (2) FG&E's electric balance of Other Regulatory Assets/Liabilities-FAS 109 multiplied by the Transmission Plant Allocation Factor. This component shall include additional regulatory assets/liabilities as established by regulatory authority and relevant to transmission services.

<u>Transmission Related Payroll Tax</u> shall equal FG&E's electric Payroll Tax Expense multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Property Tax</u> shall equal FG&E's electric Property Tax Expense, reduced by amounts billed to Select Energy, Inc. under a generation related entitlement sales agreement, multiplied by the Transmission Plant Allocation Factor.

#### III. CALCULATION OF TRANSMISSION REVENUE REQUIREMENT

This section describes the calculation of the components of the Transmission Revenue Requirement for FG&E's Non-PTF as provided in Section I.

A. <u>Non-PTF Return and Associated Income Taxes</u> shall equal the product of the Total Internal Transmission Investment Base and the Cost of Capital Rate, reduced by the amount recovered as PTF. For purposes of this computation, the PTF amount shall be calculated using the Cost of Capital Rate defined in III.A.2 below.

#### 1. <u>Total Internal Transmission Investment Base</u>

The Total Internal Transmission Investment Base shall be the sum of the year end balances of the following items as defined in Section II.: (a) Transmission Plant, plus (b) Transmission Related Intangible Plant, plus (c) Transmission Related General Plant, plus (d) Transmission Related Common Plant, plus (e) Transmission Plant Held for Future Use, minus (f) Transmission Related Depreciation & Amortization Reserve, minus (g) Transmission Related Accumulated Deferred Income Taxes, plus (h) Transmission Related Loss on Reacquired Debt, plus (i) Transmission Related Other Regulatory Assets/Liabilities, plus (j) Transmission Prepayments, plus (k) Transmission Plant Materials and Supplies, plus (l) Transmission Related Cash Working Capital.

#### 2. <u>Cost of Capital Rate</u>

The Cost of Capital Rate will equal (a) FG&E's Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.

(a) <u>The Weighted Cost of Capital</u> will be calculated based upon the capital structure at the end of each year and will equal the sum of:

- (i) <u>the long-term debt component</u>, which equals the product of the actual weighted average embedded cost to maturity of FG&E's long-term debt then outstanding and the ratio that long-term debt is to FG&E's total capital.
- (ii) <u>the preferred stock component</u>, which equals the product of the actual weighted average embedded cost to maturity of FG&E's preferred stock then outstanding and the ratio that preferred stock is to FG&E's total capital.
- (iii) <u>the return on equity component</u>, which equals the product of the cost of equity of 10.57% and the ratio that common equity is to FG&E's total capital.
- (b) <u>Federal Income Tax</u> shall equal  $\frac{(A+[(C+B)/])x FT}{1-FT}$

Where FT is the Federal Income Tax Rate; A is the sum of the preferred stock component and the return on equity component, as determined in Sections III.A.2.(a)(ii) and (iii) above; B is Transmission Related Amortization of Investment Tax Credits, as defined in Section II above, C is the equity AFUDC component of Transmission Related Depreciation Expense, as defined in Section II above, and D is Total Internal Transmission Investment Base, as determined in Section III.A.1., above.

(c) <u>State Income Tax</u> shall equal

Where ST is the State Income Tax Rate; A is the sum of the preferred stock component and return on equity component as determined in Sections III.A.2. (a)(ii) and (iii) above; B is the Transmission Related Amortization of Investment Tax Credits as defined in Section II. above; C is the equity AFUDC component of Transmission Related Depreciation Expense, as defined in Section II above; D is the Total Internal Transmission Investment Base, as determined in Section III.A.1. above; and Federal Income Tax is the rate determined in Section III.A.2.(b) above.

B. <u>Non-PTF Depreciation Expense</u> shall equal FG&E's Transmission Related Depreciation Expense reduced by the amount recovered as PTF.

C. <u>Non-PTF Amortization of Intangible Plant and Other Regulatory Assets/Liabilities</u> shall equal FG&E's Transmission Related Amortization of Intangible Plant and Other Regulatory Assets/Liabilities reduced by the amount recovered as PTF.

D. <u>Non-PTF Amortization of Rate Case Expenses</u> shall equal the Amortization of Rate Case Expenses reduced by the amount recovered as PTF.

E. <u>Non-PTF Amortization of Loss on Reacquired Debt</u> shall equal FG&E's Transmission Related Amortization of Loss on Reacquired Debt reduced by the amount recovered as PTF.

F. <u>Non-PTF Amortization of Investment Tax Credits</u> shall equal FG&E's Transmission Related Amortization of Investment Tax Credits reduced by the amount recovered as PTF.

G. <u>Non-PTF Property Tax Expense</u> shall equal FG&E's Transmission Related Property Tax Expense reduced by the amount recovered as PTF.

H. <u>Non-PTF Payroll Tax Expense</u> shall equal FG&E's Transmission Related Payroll Tax Expense

reduced by the amount recovered as PTF.

I. <u>Non-PTF Transmission Operation and Maintenance Expense</u> shall equal Transmission Operation and Maintenance Expenses reduced by the amount recovered as PTF.

J. <u>Non-PTF Customer Accounting Bad Debts Expense</u> shall equal the Transmission Related Customer Accounting Bad Debts Expense reduced by the amount recovered as PTF.

K. <u>Non-PTF Administrative and General Expenses</u> shall equal the Transmission Related Administrative and General Expenses reduced by the amount recovered as PTF.

L. <u>Non-PTF Transmission Related Taxes and Fees Charge</u> shall include any fee or assessment imposed by any governmental authority on service provided hereunder which is not specifically identified under any other section. This amount shall be reduced by the amount recovered as PTF.

M. <u>Non-PTF Transmission Rents Received from Electric Property</u> shall equal any amount in FERC Account No. 454, Rents from Electric Property, associated with Transmission Plant. This amount shall be reduced by the amount recovered as PTF.

N. <u>Non-PTF Revenue for Through or Out Service</u> shall equal distributions received by FG&E from ISO out of revenues paid for Through or Out Service (as defined in the OATT), pursuant to Section II.12.2(d) of the Tariff.

# Appendix A PTF and non-PTF Depreciation Rates

	Ι	Depreciation Rates (%)	Depreciation Rates (%)				
Account	Description H	Eff. October 1, 2003	Eff. January 1, 2011				
Transmission Plant							
351.00 Clearing Land and Rights of Way		y 1.32	1.27				
352.00 Structures and Improvements		1.81	2.29				
353.00 Station Equipment		4.16	4.11				
355.00 Poles and Fixtures		6.48	5.38				
356.00 Overhead Conductors and Devices		s 5.14	3.92				
General Plant							
394.00 Tool	s, Shop and Garage Equipme	ent 2.73	3.11				
395.00 Labo	oratory Equipment	3.13	4.29				
397.00 Communication Equipment		6.32	10.38				
398.00 Misc	ellaneous Equipment	4.17	4.75				
Common Plant							
390.00 Struct	tures and Improvements	4.00	3.24				
390.20 Impro	ovements to Leased Service (	Center 2.89	3.23				
391.00 Offic	e Furniture and Equipment	13.84	3.33				
393.00 Stores Equipment		0.97	2.31				
394.00 Tools, Shop and Garage Equipment		nt 2.91	2.63				
396.00 Power Operated Equipment		4.28	0.90				
397.00 Communication Equipment		9.64	8.76				
398.00 Miscellaneous Equipment		N/A	Fully Depreciated				

# ATTACHMENT I

# Index Of Local Network Service Customers

Customer	Date of Service Agreement

Fitchburg Gas and ElectricSeptember 10, 1997Light Company

Massachusetts Bay Transportation April 17, 2000

Company

#### Attachment L

#### **Creditworthiness Policy**

#### 1. Introduction

This guide establishes creditworthiness standards for transmission service and/or interconnection service customers ("Customers") entering into new or amended service agreements with Fitchburg Gas and Electric Light Company ("FG&E") under the ISO New England Open Access Transmission Tariff ("ISO-NE OATT").<sup>6</sup> In accordance with the Federal Energy Regulatory Commission's Policy Statement on Credit-Related Issues for Electric OATT Transmission Providers, Independent System Operators and Regional Transmission Organizations ("Policy Statement"), this Creditworthiness Policy is intended to make FG&E's credit-related practices more transparent and comprehensive. The following describes FG&E credit review procedures and the types of security that are acceptable to FG&E to protect against the risk of non-payment.

#### 2. Creditworthiness

FG&E will evaluate the creditworthiness of Customers entering into new or amended transmission or interconnection service agreements with FG&E in order to assess a Customer's credit risk relative to the exposure of "Total Outstanding Obligation" as defined in Section 2.1 below, created by the transaction or transactions that FG&E has with the Customer. For purposes of determining the ability of a Customer to meet its obligations, FG&E may require the Customer to submit financial information for the credit review, including credit ratings, credit reports and audited financial statements for the last five years, including audited quarterly reports for the prior two years, if available. Further, the Customer will be expected to provide calculations of the following: Current Total Capitalization Ratio, Including Short-Term Debt; Tangible Net Worth for a period within sixty days of a Customer's request; Earnings Before Interest, Taxes, Depreciation and Amortization for twelve of the last fifteen consecutive months; and additional calculations and other information deemed necessary for the evaluation credit. In completing its evaluation, FG&E may consider other factors including but not limited to past billing history or the characteristics of service being requested.

#### 2.1 Total Outstanding Obligation

The Customer's Total Outstanding Obligation to FG&E will be the sum total of the following

<sup>6</sup> See ISO New England Inc., ISO New England Inc. Transmission, Markets and Services Tariff, Section II. This policy is applicable to transmission or interconnection service agreements established from time-to-time under Schedules 21 - FG&E of the ISO-NE OATT and to individually negotiated agreements for similar transmission or interconnection services.

components:

2.1.1 If the Customer is making payments to FG&E for ongoing expenses (including, but not limited to, O&M expenses related to interconnections or other monthly charges such as monthly transmission charges under Schedule 21 - FG&E) the Customer will be required to provide security pursuant to Section 2.2 below, for four months' worth of the Customer's average payment obligation for such charges.

2.1.2 In accordance with the provisions of the ISO-NE OATT, a Customer will pay a Contribution in Aid of Construction ("CIAC") or transfer ownership of facilities to FG&E for transmission or interconnection facilities that are to be constructed on behalf of a Customer at the Customer's sole expense. If FG&E determines in good faith that the receipt of CIAC payments or property from the Customer are non-taxable, FG&E will require a form of security from the customer pursuant to Section 2.2 below for the amount of the potential tax liability to FG&E that would occur if such facilities were deemed taxable.

2.1.3 In accordance with the provisions of Schedule 21 – FG&E to the ISO-NE OATT, a Customer will pay a formula rate over time for return of and on the cost of capital incurred by FG&E on behalf of a Customer at the Customer's sole expense. The Customer will also be required to provide security pursuant to Section 2.2 below, for the unamortized balance of plant in service reserved for the sole use of the Customer.

#### 2.2 Creditworthiness Requirements

A Customer will be considered creditworthy upon satisfying at least one of the following conditions or a combination of those conditions at the time that the customer enters into a transmission or interconnection service agreement and for so long as the Customer maintains satisfaction of at least one of these conditions for any outstanding obligations thereunder:

2.2.1 The Customer maintains a minimum credit rating from Standard & Poor's Long-term Issuer Credit Rating of BBB- or better or Moody's Investors Service Long-term Issuer Credit Rating of Baa3 or better so long as the Customer's Total Outstanding Obligation plus any other unsecured obligations with FG&E does not exceed the Credit Limits discussed in Section 4 below. When FG&E reviews a Customer's rating from two or more rating agencies and a split rating is present, the lower debt rating will apply. In the event that the Customer has no rating

from either Standard & Poor's or Moody's Investors Service, a rating from Fitch may also be used with acceptable ratings equivalent to those from either Standard and Poor's or Moody's Investors Service. If unrated, the Customer's financial statements will be reviewed to determine an equivalent rating based on the Customer's unsecured credit limits and/or financial statements.

If, at any time, the Customer's rating falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify FG&E within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to FG&E, as described in this Section 2.2.

2.2.2 The Customer provides and maintains in effect during the term of and until full and final payment and performance of the service agreement an unconditional and irrevocable standby letter of credit for the Total Outstanding Obligation in the form and substance and issued by a bank reasonably acceptable to FG&E. A draft, acceptable form letter of credit is attached. Any such bank must satisfy the creditworthiness criteria described in 2.2.1 above.

If, at any time, the bank's rating falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify FG&E within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to FG&E, as described in this Section 2.2.

2.2.3 If the Customer's parent or an affiliate company satisfies the creditworthiness criteria described in 2.2.1 above and, subject to the Credit Limits stated in Section 4 below, such company submits to FG&E and maintains in effect a letter of guaranty reasonably acceptable to FG&E as to amount, form and substance for the term of and until full and final payment and performance of the service agreement.

If, at any time, the credit rating of the Customer's parent or affiliate providing the guaranty falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify FG&E within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to FG&E, as described in this Section 2.

2.2.4 The Customer makes an advance payment to FG&E in immediately available funds for

the Total Outstanding Obligation.

#### 3. Customer Costs Requiring Prepayment

In accordance with the provisions of the ISO-NE OATT, a Customer will pay a Contribution in Aid of Construction ("CIAC") for transmission or interconnection facilities to be constructed by FG&E on behalf of a Customer at the Customer's sole expense. The Customer will have the option to (i) prepay the CIAC in immediately available funds to FG&E, or (ii) make periodic CIAC progress payments, as defined in the Customer's service agreement, to prepay in increments capital costs scheduled to be incurred by FG&E. If FG&E determines in good faith that such payments or property transfers made by the Customer should be reported as income subject to taxation, the Customer shall also prepay all costs associated with the cost consequences of the current tax liability imposed on FG&E by those facilities (the "Tax Gross- up").

#### 4. Determination of Credit Limits

FG&E reserves the right to limit the total amount of unsecured credit extended to a Customer under 2.2.1 and 2.2.3 above such that the sum of all unsecured credit that such Customer has with FG&E, including the Total Outstanding Obligation, shall not exceed the Credit Limits defined below. Such limitations are based on an assessment of the Customer's or its Guarantor's credit rating and the net worth of the Customer's or its Guarantor's assets.

	Unsecured Credit Limit as Percent
Standard and Poor's (or	of Customer's or Guarantor's
Equivalent) Rating	Tangible Net Worth
A and above	1.0%
A-	0.5%
BBB+	0.3%
BBB	0.2%
BBB-	0.1%

Once FG&E has evaluated or reevaluated and determined the maximum Credit limits for each Customer, it will inform the prospective Customer of the amount of such credit limits. A customer may request in writing a reevaluation of the maximum Credit limits, within 14 days from the date that they were informed by FG&E of such limits. Justification for such a reevaluation should be contained in the request. All requests for reevaluation must be submitted directly to the FG&E Contract Administrator.

From time to time, principally due to unknown factors such as changing market, economic, banking or other financial conditions, but not solely limited to these factors, FG&E may find it necessary to modify or amend its creditworthiness policies and guidelines after a 15 day notice period and require that present and future Transmission Customers fulfill any additional conditions contained in the modified Creditworthiness Guide. Transmission Customers will have 30 days after the notice period to cure any deficiency.

#### FORM LETTER OF CREDIT

(address)

#### IRREVOCABLE STANDBY LETTER OF CREDIT

DATE: \_\_\_\_\_

AMOUNT U.S. \$\_\_\_\_\_

#### FOR INTERNAL IDENTIFICATION PURPOSES ONLY

\_\_\_\_\_ \_\_\_

\_\_\_\_\_

\_\_\_\_

Our Number:

Beneficiary:

Applicant:

Attn: At the request of:

Ref:\_\_\_\_\_

LADIES AND GENTLEMEN;

WE HEREBY ESTABLISH THIS IRREVOCABLE, AND UNCONDITIONAL, EXCEPT AS STATED HEREIN, LETTER OF CREDIT NUMBER \_\_\_\_\_\_\_ (LETTER OF CREDIT), BY ORDER OF, FOR THE ACCOUNT OF, AND ON BEHALF OF [CUSTOMER NAME] (ACCOUNT PARTY) IN FAVOR OF FITCHBURG GAS AND ELECTRIC LIGHT COMPANY (BENEFICIARY) FOR DRAWINGS, IN ONE OF MORE DRAFTS, UP TO AN AGGREGATE AMOUNT NOT EXCEEDING U.S. \$\_\_\_\_\_\_ EFFECTIVE IMMEDIATELY. THE TERM 'BENEFICIARY' INCLUDES ANY SUCCESSOR OF THE NAMED BENEFICIARY.

THIS LETTER OF CREDIT CANNOT BE AMENDED, MODIFIED OR REVOKED WITHOUT THE PRIOR WRITTEN CONSENT OF BOTH THE BANK AND THE BENEFICIARY. THE BENEFICIARY SHALL NOT BE DEEMED TO HAVE WAIVED ANY RIGHTS UNDER THIS LETTER OF CREDIT, UNLESS AN OFFICER OF THE BENEFICIARY SHALL HAVE SIGNED A WRITTEN WAIVER EXPRESSLY REFERENCING THE RIGHT TO BE WAIVED. NO SUCH WAIVER SHALL BE EFFECTIVE AS TO ANY TRANSACTION THAT OCCURS SUBSEQUENT TO THE DATE OF THE WAIVER, NOT AS TO ANY CONTINUANCE OF A BREACH AFTER THE WAIVER.

WE HEREBY UNDERTAKE TO PROMPTLY HONOR YOUR DRAFT(S) DRAWN ON US, INDICATING OUR LETTER OF CREDIT NUMBER \_\_\_\_\_\_ IS ISSUED, PRESENTABLE AND PAYABLE AND WE GUARANTY TO THE DRAWERS, ENDORSERS, AND BONA FIDE HOLDERS OF THIS LETTER OF CREDIT, THAT DRAFTS UNDER AND IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT WILL BE HONORED. THIS LETTER OF CREDIT MAY NOT BE TRANSFERRED OR ASSIGNED BY US.

SUBJECT TO THE EXPRESS TERMS AND CONDITIONS HEREIN, FUNDS UNDER THIS LETTER OF CREDIT ARE AVAILABLE TO YOU BY PRESENTATION AT OUR OFFICES LOCATED AT [\_\_\_\_\_] OF BENEFICIARY'S DRAWING CERTIFICATE ISSUED SUBSTANTIALLY IN THE FORM OF ANNEX 1 ATTACHED HERETO AND WHICH FORMS AN INTEGRAL PART HEREOF, DULY COMPLETED AND PURPORTEDLY BEARING THE ORIGINAL SIGNATURE OF AN OFFICER OF THE BENEFICIARY. PRRESENTATION OF ANY DRAWING CERTIFICATE UNDER THIS LETTER OF CREDIT MAY BE MADE IN PERSON TO

US OR MAY BE SENT TO US BY TELEX TO [	] OR BY FACSIMILE
TRANSMISSION TO FACSIMILE TELEPHONE NUMBER [	].

ALL COMMISSIONS AND CHARGES WILL BE BORNE BY THE ACCOUNT PARTY. IF DOCUMENTS, IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT, ARE RECEIVED BEFORE 10:00 AM (EASTERN TIME) ON A BUSINESS DAY, PAYMENT WILL BE EFFECTED ON OR BEFORE 5:00 PM (EASTERN TIME) ON THE NEXT BUSINESS DAY. IF DOCUMENTS, IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT ARE RECEIVED AFTER 10:00 AM ON A BUSINESS DAY, PAYMENT WILL BE EFFECTED ON OR BEFORE 5:00 PM ON THE SECOND BUSINESS DAY FOLLOWING SUCH DATE OF RECEIPT.

EXCEPT AS EXPRESSLY STATED HEREIN, THIS UNDERTAKING IS NOT SUBJECT TO ANY AGREEMENT, CONDITION OR QUALIFICATION. THIS LETTER OF CREDIT DOES NOT INCORPORATE, AND SHALL NOT BE DEEMED MODIFIED OR AMENDED BY REFERENCE TO ANY DOCUMENT, INSTRUMENT OR AGREEMENT (A) THAT IS REFERRED TO HEREIN (EXCEPT FOR THE UNIFORM CUSTOMS, AS DEFINED BELOW), OR (B) IN WHICH THIS LETTER OF CREDIT IS REFERRED TO OR TO WHICH THIS LETTER OF CREDIT RELATES.

OUR OBLIGATION UNDER THIS LETTER OF CREDIT SHALL BE OUR INDIVIDUAL OBLIGATION AND IS IN NO WAY CONTINGENT UPON THE REIMBURSEMENT WITH RESPECT THERETO, OR UPON OUR ABILITY TO PERFECT ANY LIEN, SECURITY INTEREST OR ANY OTHER REIMBURSEMENT.

THIS LETTER OF CREDIT EXPIRES WITH OUR CLOSE OF BUSINESS ON [364 days from effective date]; HOWEVER, IT IS A CONDITION OF THIS LETTER OF CREDIT THAT IT SHALL BE DEEMED AUTOMATICALLY EXTENDED WITHOUT AMENDMENT FOR 364 DAYS FROM THE PRESENT OR ANY FUTURE EXPIRATION DATE HEREOF, UNLESS AT LEAST SIXTY (60) DAYS BEFORE ANY SUCH EXPIRATION DATE WE NOTIFY YOU BY REGISTERED MAIL ADDRESSED TO: [address of beneficiary, ATTN: \_\_\_\_\_], THAT WE ELECT NOT TO RENEW THIS LETTER FOR SUCH ADDITIONAL PERIOD.

THIS LETTER OF CREDIT IS SUBJECT TO THE UNIFORM CUSTOMS AND PRACTICE FOR DOCUMENTARY CREDITS (1993 REVISION) INTERNATIONAL CHAMBER OF COMMERCE, PUBLICATION NO. 500. IF THIS LETTER OF CREDIT EXPIRES DURING THE INTERRUPTION OF BUSINESS AS DESCRIBED IN ARTICLE 17 THEREOF WE HEREBY SPECIFICALLY AGREE TO EFFECT PAYMENT IF THE LETTER OF CREDIT IS DRAWN AGAINST WITHIN 30 DAYS AFTER THE RESUMPTION OF BUSINESS.

# ANNEX 1 TO [BANKNAME] IRREVOCABLE LETTER OF CREDIT NO.

[INSERT DATE]

[BANK NAME] [ATTENTION] [BANK ADDRESS 1] [BANK ADDRESS 2]

LADIES AND GENTLEMEN:

THE UNDERSIGNED \_\_\_\_\_\_, A DULY ELECTED AND ACTING OFFICER OF FITCHBURG GAS AND ELECTRIC LIGHT COMPANY (THE "BENEFICIARY"), HEREBY CERTIFIES TO [INSERT BANK NAME] (THE "BANK"), WITH REFERENCE TO IRREVOCABLE LETTER OF CREDIT NO. \_\_\_\_\_ DATED \_\_\_\_\_, ISSUED BY THE BANK IN FAVOR OF THE BENEFICIARY (THE "LETTER OF CREDIT"), AS FOLLOWS AS OF THE DATE THEREOF:

1.THE BENEFICIARY IS A PARTY TO THAT CERTAIN [INTERCONNECTIONAGREEMENT], EFFECTIVE \_\_\_\_\_\_, BETWEEN THE BENEFICIARY AND[CUSTOMER NAME] (THE "AGREEMENT").

2. BENEFICIARY IS MAKING A DRAWING UNDER THE LETTER OF CREDIT IN THE AMOUNT OF \$\_\_\_\_\_\_BECAUSE [CHECK APPLICABLE PROVISION]:

[\_\_\_\_] (A) THERE CURRENTLY EXIST ONE OR MORE UNPAID AMOUNTS WHICH [CUSTOMER NAME] IS OBLIGATED TO PAY PURSUANT TO THE TERMS OF THE AGREEMENT.

[\_\_\_\_] (B) THE BENEFICIARY HAS RECEIVED NOTICE FROM THE BANK OF ITS INTENTION NOT TO RENEW THE LETTER OF CREDIT BEYOND THE CURRENT EXPIRATION DATE AND [CUSTOMER NAME] HAS FAILED, PRIOR TO THE CLOSE OF BUSINESS ON

[INSERT DATE WHICH IS NOT MORE THAN THIRTY (30) DAYS BEFORE

THE PRESENT EXPIRATION DATE], TO DELIVER TO BENEFICIARY A REPLACEMENT LETTER OF CREDIT SATISFYING THE REQUIREMENTS OF THE AGREEMENT.

4. FUNDS PAID PURSUANT TO THE PROVISIONS OF THE LETTER OF CREDIT SHALL BE WIRE TRANSFERRED TO THE BENEFICIARY IN ACCORDANCE WITH THE FOLLOWING INSTRUCTIONS:

UNLESS OTHERWISE PROVIDED HEREIN, CAPITALIZED TERMS WHICH ARE USED AND NOT DEFINED HEREIN SHALL HAVE THE MEANING GIVEN EACH SUCH TERM IN THE LETTER OF CREDIT.

IN WITNESS WHEREOF, THIS CERTIFICATE HAS BEEN DULY EXECUTED AND DELIVERED ON BEHALF OF THE BENEFICIARY BY ITS DULY ELECTED AND ACTING OFFICER AS OF THIS \_\_\_\_\_ DAY OF \_\_\_\_\_, \_\_\_\_.

BENEFICIARY: FITCHBURG GAS AND ELECTRIC LIGHT COMPANY

NAME:

TITLE

# **SCHEDULE 21 - NEP**

# NEW ENGLAND POWER COMPANY LOCAL SERVICE SCHEDULE

#### I. COMMON SERVICE PROVISIONS

#### 1 Definitions

Whenever used in this Schedule, in either the singular or plural number, the following capitalized terms shall have the meanings specified in this Section 1. Terms used in this Schedule that are not defined in this Schedule shall have the meanings set forth in the Tariff or customarily attributed to such terms by the electric utility industry in New England.

**1.0** New England Affiliate: New England Affiliate means Massachusetts Electric Company, Nantucket Electric Company, The Narragansett Electric Company and Granite State Electric Company.

**1.1 Annual Peak Load:** The highest Network Load of the Network Customer during a calendar year.

**1.2** Contract Termination Charge (CTC): New England Power Company's stranded cost charge to certain wholesale requirements customers, as defined and described in the Stipulations and Agreements and as calculated pursuant to Appendix 1 of the Offer of Settlement filed with the Commission in Docket Nos. ER97-678-000 and ER97-680-000.

**1.3** Contribution in Aid of Construction (CIAC): A contribution in aid of construction pursuant to Section 118(b) of the Internal Revenue Code of 1986.

**1.4 Distribution System:** Distribution System means the facilities owned or supported by NEP or its New England Affiliates that do not constitute PTF or Non-PTF and are used for Transmission Service under the Tariff for Transmission Customers other than end-use customers.

1.5 [Reserved]

**1.6 IRS Notice 87-82:** Internal Revenue Service Notice 87-82, Providing guidance with Respect to the Treatment of CIACs (received by regulated public utilities) After Enactment of New Section 118(b) of the Internal Revenue Code.

**1.7 IRS Notice 90-60:** Internal Revenue Service Notice 90-60, Contribution in Aid of Construction, issued September 10, 1990.

**1.7.1** Load Interconnections: Any load facility desiring to interconnect with NEP's electrical system or modify an existing interconnection, as further set forth in the Local Service Agreement in Schedule 21-Attachment A. In addition, Attachment C, D, E, F and H of Schedule 21-NEP shall apply.

**1.8 Load Power Factor:** The ratio of the load measured in kW to the same load measured in kVA during a one-hour period.

**1.9 Load Ratio Share:** Ratio of a Transmission Customer's monthly PTF Network Load occurring coincident with NEP's Total Monthly Peak Load, to NEP's Total Monthly Peak Load, calculated on a monthly basis.

1.10 [Reserved]

**1.11 Monthly Transmission Expenses:** The total monthly cost of the Transmission System as specified in Attachment RR to this Schedule until amended by NEP or modified by the Commission.

**1.12 NEP:** NEP means New England Power Company, a Transmission Owner under the Tariff

**1.13 NEPOOL Tariff:** The predecessor NEPOOL Open Access Transmission Tariff as filed with the Commission on December 31, 1996 and as amended and in effect from time to time.

1.14 NERC: North American Electric Reliability Council

**1.15** Network Load: The load interconnected (not reduced for any generation behind the meter) to the PTF, Non-PTF or Distribution Facilities of NEP or its New England Affiliates either directly or through Distribution Facilities or Non-PTF Facilities of other entities that a Network Customer designates to receive Local Network Service under Schedule 21 and this Schedule.

For purposes of establishing rates and charges under this Schedule, the Network Load will be subdivided into one of three categories:

**A. PTF Network Load** shall be the load over NEP's Local Network and shall equal the load of Network Customers directly interconnected with NEP's PTF or indirectly utilizing NEP's PTF through Non-PTF or Distribution Facilities of NEP or its New England Affiliates.

**B.** Non-PTF Network Load shall be the load over NEP's Non-PTF either directly interconnected with NEP's Non-PTF or indirectly utilizing NEP's Non-PTF through Distribution Facilities of NEP or its New England Affiliates.

**C. Distribution Facilities Network Load** shall be the load interconnected to the Distribution Facilities of NEP, its New England Affiliates or other entities.

**1.16** Network Upgrades: Modifications or additions to transmission-related facilities that are integrated with and support NEP's overall Transmission System for the general benefit of all users of such Transmission System or to reliably integrate a generating unit with the Transmission System or to interconnect to outside control areas.

**1.17** Non-PTF Load Ratio Share: Ratio of a Transmission Customer's monthly Non-PTF Network Load occurring coincident with NEP's Total Monthly Non-PTF Peak Load, to NEP's Total Monthly Non-PTF Peak Load.

**1.18** NPCC: Northeast Power Coordinating Council, a regional reliability governing body.

**1.19 Own Use Energy:** Energy consumed by NEP's transmission facilities for purposes including but not limited to station service and sleet thawing, but excluding losses incurred on the Transmission System.

**1.20 Parties:** NEP and the Transmission Customer receiving service under this Schedule and the Tariff.

**1.21 Payment Schedule:** The payment schedule attached to a Local Service Agreement containing estimated milestones and estimated costs.

**1.22 Policy and Practices for Protection Requirements for New or Modified Load Interconnections:** NEP's policy concerning protection requirements for new or modified interconnections to loads, are included in the associated attachments of the Transmission Customer's Local Service Agreement.

**1.23 Project:** The substation and all facilities ancillary and appurtenant thereto, which the Transmission Customer requests to interconnect to the Transmission System, as more fully described in associated attachments to this Schedule 21-NEP and Attachment A to Schedule 21, Local Transmission Service.

**1.24 Qualified Bidders List:** A list of contractors and vendors qualified by NEP to work on interconnection facilities.

**1.25 REMVEC:** The Rhode Island, Eastern Massachusetts, Vermont Energy Control, which operates as a Local Control Center to the ISO.

**1.26 Taxable Event:** An event taxable to NEP resulting from transfers made by the Transmission Customer to NEP for services provided under this Schedule and Schedule 21 with respect to construction and installation of new Direct Assignment Facilities or improvements.

**1.27 Total Monthly Peak Load:** For each month, the highest hourly sum of the coincident peaks of deliveries to all PTF Network Loads under this Schedule, plus the loads of customers served under New England Power Company's (NEP) FERC Electric Tariff, Original Volume No. 1, connected directly to NEP's PTF or indirectly utilizing NEP's PTF through Non-PTF or Distribution Facilities of NEP, its New England Affiliates or other entities, including losses and NEP's Own Use Energy.

**1.28** Total Monthly Non-PTF Peak Load: For each month, the highest hourly sum of the coincident peaks of deliveries to all Non-PTF Network Loads under this Schedule plus the loads of customers served under NEP's FERC Electric Tariff, Original Volume No. 1, that would otherwise qualify as Non-PTF Network Load, including losses and NEP's Own Use Energy.

**1.29** Transformation Facilities: One or more transformers in a substation that step the voltage from the transmission voltage level to the distribution voltage level.

**1.30** Transmission Service: Service provided under the OATT.

**1.31 Transmission System:** Transmission System means the facilities owned, controlled or operated by NEP that are used to provide Transmission Service.

#### 2 Purpose of This Schedule

The OATT provides for a two-tier transmission arrangement integrating regional transmission service over PTF and Local Service over Non-PTF. The arrangement is designed and shall be operated in such a manner as to encourage and promote competition in the electric market to the benefit of ultimate users of electric energy. The OATT is intended to provide for comparable, non-discriminatory treatment of all similarly situated Transmission Owners and all Eligible Customers that are transmission users, and it shall be construed in the manner which best achieves this objective.

This Schedule functions in conjunction with the OATT to offer Transmission Services and Ancillary Services not provided pursuant to the other sections of the OATT, and to provide for the recognition of payments by and credits to NEP under the OATT. The rates, terms and conditions of this Schedule supplement and, where applicable, replace the rates, terms and conditions of the OATT and Schedule 21 with respect to Local Service; however Local PTP Service is not offered by NEP. In the event of a conflict between the terms of this Schedule and the terms of Schedule 21 with respect to Local Service, the terms of this Schedule shall govern.

Pursuant to this Schedule and to Schedules 22 and 23, NEP: (a) offers access to its Transmission Facilities for Excepted Transactions; (b) offers access to its Non-PTF in conjunction with the purchase of Transmission Service under the OATT; (c) provides rates, terms and conditions for the interconnection of new network load to the Transmission System and Distribution System for wholesale transactions; (d) reflects in the charges for Transmission Service and Ancillary Services amounts paid by NEP or credited to NEP in accordance with the OATT; and (e) provides for the recovery of costs associated with the Transmission Facilities and Ancillary Services that are not recovered pursuant to the OATT.

#### **3** Ancillary Services

Ancillary Services are needed with Transmission Service to maintain reliability within and among the Control Areas affected by the Transmission Service. NEP is required to provide and the Network Customer or the Transmission Customer taking service in accordance with this Schedule and the OATT is required to purchase Local Scheduling, System Control and Dispatch Service in accordance with the rates and/or methodology described in Attachment S-1 and Attachment OCC to this Schedule.

#### 4 Billing and Payment

**4.1 Billing Procedure:** Within a reasonable time after the first day of each month, NEP or its designee shall submit an invoice to the Transmission Customer for the charges for all services furnished by NEP under this Schedule and Schedule 21 during the preceding month. The invoice shall be paid by the Transmission Customer within twenty-five (25) days of issuance. All payments shall be made in immediately available funds payable to NEP, or by wire transfer to a bank named by NEP.

**4.2 Customer Default:** In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to NEP on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after NEP notifies the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, NEP may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission So approves any such request. In the event of a billing dispute between NEP and the Transmission Customer, NEP will continue to provide service under the Local Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then NEP may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy.

**4.3** After Termination or Cancellation: The applicable provisions of the OATT, Schedule 21, this Schedule and any Local Service Agreement shall continue in effect after termination or cancellation thereof to the extent necessary to provide for final billings, billing adjustments and payments and with respect to liability and indemnification from acts or events that occurred while

the Local Service Agreement was in effect. Notwithstanding the above, if the OATT, Schedule 21, this Schedule or any Local Service Agreement is terminated prior to the end of its initially contemplated term, for reasons other than breach by NEP, the Transmission Customer shall reimburse NEP for all unrecovered costs applicable to facilities installed pursuant to the provisions of the OATT, Schedule 21, this Schedule or any Local Service Agreement.

4.4 Audits of Accounts and Records: Within two (2) years following a calendar year, NEP and the Transmission Customer shall have the right to audit each other's accounts and records at the offices where such accounts and records are maintained during normal business hours; provided that appropriate notice shall have been given prior to any audit and provided that the audit shall be limited to those portions of such accounts and records that relate to service for said calendar year. The party being audited will be entitled to review the audit report and any supporting materials. The independent auditor performing such audit shall be subject to a confidentiality agreement between the auditor and the party being audited. To the extent that audited information includes confidential information, the auditing party shall designate an independent auditor to perform such audit. For the purpose of this provision, confidential information is proprietary information supplied by a Transmission Customer or a provider of Ancillary Services to NEP, which the Transmission Customer or a provider of Ancillary Services requests NEP not to disclose. NEP will treat such information as confidential except to the extent that disclosure of this information is required by the OATT, by regulatory or judicial order for reliability purposes pursuant to Good Utility Practice, pursuant to the Commission's Final Order 889 in Docket No. RM95-9-000, or as required under the ISO New England Information Policy. NEP will not disclose such information to its power marketing Affiliate or others.

#### 5 Creditworthiness

For the purpose of determining the ability of a Transmission Customer to meet its obligations related to service hereunder, NEP may require reasonable credit review procedures. Applicable creditworthiness procedures are specified in Attachment L of this Schedule.

#### 6 Dispute Resolution Procedures

**6.1 Interpretation:** The interpretation of and performance under this Schedule shall be according to and controlled by the laws of the Commonwealth of Massachusetts when not in conflict with or pre-empted by the Federal Power Act.

**6.2** Indemnification: In cases where the Transmission Customer enjoys limitation of its liability under the Massachusetts Tort Claims Act, G.L. c. 258,  $\Box \Box 1$  and 2, as amended from time to time, NEP will have a similar limitation on its liability under the OATT, Schedule 21 and this Schedule.

#### II. LOCAL NETWORK SERVICE

The rates, terms and conditions set forth below supplement and, where applicable, replace the rates, terms and conditions of Local Network Service set forth in Schedule 21. In the event of a conflict between the terms of this Schedule and the terms of Schedule 21, the terms of this Schedule shall govern.

#### **19 Real Power Losses**

Real Power Losses are associated with all Transmission Service. NEP is not obligated to provide Real Power Losses. The Network Customer is responsible for replacing losses associated with all Transmission Service as calculated by NEP. The applicable Real Power Loss factors tabulated in Attachment I to this Schedule will be applied to metered loads to account for losses on the Non-PTF System and/or Distribution System that are not otherwise accounted for and allocated. Determination of losses across NEP's PTF system will be according to the procedure set by the ISO. In cases where the ISO or the Tariff does not allocate PTF losses, PTF losses will be assigned at 3%. When a load interconnects to the Transmission System at a Non-PTF point, the Real Power Loss factors in Attachment I to this Schedule will be applied to metered load amounts to reflect the losses incurred between the metering point and the PTF. Application of appropriate loss compensation to the meter would negate the need to apply the Real Power Loss factors. The Real Power Loss factors vary, depending upon the system voltage level at the interconnection point. If multiple voltage levels intervene between the PTF and the interconnection point, the Real Power Loss factors for each of the intervening voltage levels are additive. Any Non-PTF losses not allocated under Attachment I to this Schedule will be allocated to Non-PTF Network Load on the basis of Non-PTF Load Ratio Share.

#### 20 Metering and Power Factor Correction at Point(s) of Delivery

**20.1 Power Factor:** The Network Customer's cumulative Load Power Factor for all Point(s) of Delivery in an area as defined by the ISO shall be maintained within a range, as required by

NEP, the ISO, and/or REMVEC, in accordance with Good Utility Practice. This range will be reviewed periodically and is subject to change. The Network Customer shall be notified of such changes. If the Network Customer's cumulative Load Power Factor does not fall within the required range, and NEP has existing means of providing the deficient reactive power NEP will charge the Network Customer a Power Factor Penalty in accordance with Attachment OCC to this Schedule. The Power Factor Penalty charge will be suspended if the customer corrects the Load Power Factor or, if during periods when the range may be changed, the customer's Load Power Factor is within the prescribed range. If NEP cannot provide the deficient reactive power from existing facilities, NEP will install, at the Customer's sole expense, the appropriate equipment to bring the customer's power factor within the required range. NEP will file with the Commission the cost support for such installations.

#### 21 Network Resources

#### 21.1 [Reserved]

**21.2 Designation of New Network Resources:** Each designation of a Network Resource shall be effective as of the beginning of a month, shall remain in effect for at least one full month, and shall only be terminated at the end of a month.

#### 22 Construction of Facilities Associated with Interconnection of New Network Load

**22.1 Basic Understandings:** In cases in which the Transmission Customer intends to interconnect new network load to the Transmission System or Distribution System, the interconnection: (i) shall require the construction of interconnection facilities and associated equipment and (ii) may require the construction or installation of facilities and/or associated equipment in addition to the interconnection facilities on the Transmission System or Distribution System or the transmission system of another utility. These interconnection facilities and additional facilities shall be the financial responsibility of the Transmission Customer, to the extent consistent with Commission policy.

Subject to the following terms and conditions, NEP or its New England Affiliate shall, at the Transmission Customer's expense, build the facilities or make preparations so that this construction can be submitted for written bids to parties on the Qualified Bidders List. NEP shall have the right to supervise any construction undertaken by qualified outside contractors at the Transmission Customer's expense and to reject any construction work which fails to meet its requirements.

**22.2 General Considerations:** NEP or its New England Affiliate or another party selected pursuant to this Section shall construct the facilities at the Transmission Customer's expense. NEP or its New England Affiliate shall design, own, and maintain the facilities. NEP and the Transmission Customer shall mutually agree upon a schedule for construction and final interconnection. NEP shall use due diligence to fulfill its obligations under this Schedule in order to permit the interconnection of the Project in a timely manner. NEP reserves the exclusive right to make the final interconnection between the Project and NEP's Transmission System. NEP shall use, or specify that the Transmission Customer's selected contractor use, standard equipment customarily employed by NEP or its New England Affiliate for its own system in accordance with Good Utility Practice in making the final interconnection.

The Transmission Customer shall pay NEP for all reasonable costs and fees required to enable NEP to fulfill its obligations, including any tax liability, the costs and fees of all permits, licenses, franchises or regulatory or other approvals necessary for the construction and operation of the facilities. NEP shall consult with Transmission Customer on decisions involving substantial additional costs to be incurred by NEP in fulfillment of its obligations.

**22.3 Tax Security Arrangements:** The Transmission Customer shall acknowledge that under IRS Notice 87-82, transfers made by the Transmission Customer to NEP for services provided hereunder with respect to the construction and installation of new facilities or improvements may, under certain circumstances cause a Taxable Event to NEP. The Transmission Customer agrees to assure NEP recovery of all potential tax costs, both state and federal, including all interest and penalty claims, if a Taxable Event occurs.

The Transmission Customer shall expressly agree to indemnify and save NEP harmless from and against any and all federal and/or state income tax, interest or penalty claims, or liability related to any tax gross-up incurred as a result of the work performed for and the services rendered to the Transmission Customer.

**22.4 Security:** In addition to the security provided for in Section 5 of this Schedule, the Transmission Customer shall agree to provide NEP with security for the potential tax liability for a term and in a form acceptable to NEP. Such security shall cover an amount calculated in accordance with the terms of Section 22.5 of this Schedule. If the Transmission Customer fails to provide NEP with satisfactory security within thirty (30) days of notice by NEP, NEP may cease all work related to the Transmission Customer's request until such security is in place.

NEP reserves the right to require the Transmission Customer to increase the value of the security to reflect changed circumstances including, but not limited to, an increase in the taxable value of the Direct Assignment Facilities or changes in tax law which affect NEP's tax position vis-à-vis the construction and installation of new or modified facilities. The Transmission Customer shall provide NEP with the security as well as any periodic renewals that may be required by NEP. Such security shall have a minimum term of one (1) year and, in the case of a letter of credit, shall designate NEP as beneficiary with authority to draw drafts on the issuer for the secured amount in accordance with this Schedule. Such security shall also provide that NEP may draw the full amount of the security in the event it has not been renewed, extended or replaced on or before thirty (30) days prior to the expiration date of such security.

If at any time during the term of the Transmission Customer's Service Agreement with NEP there is a change in federal law tax which, in NEP's view, mitigates or eliminates its tax liability under applicable law or regulation, NEP shall agree, to the extent it deems appropriate, to release to the Transmission Customer any security determined to be in excess of NEP's potential tax liability.

**22.5 Determination of Secured Amount:** The Transmission Customer agrees that if a Taxable Event occurs, NEP's tax liability will be based upon the fair market value of the facilities constructed, installed or modified hereunder. The Transmission Customer agrees that the fair market value of the facilities is deemed to be the depreciated replacement cost of such facilities at the time of the transfer, as prescribed by IRS Notice 90-60.

The Transmission Customer shall secure an amount equal to the product of the depreciated replacement cost of the facilities times NEP's gross-up tax factor (net federal and state tax rate). NEP shall provide an initial estimate of the amount to be secured, based upon its facilities construction, installation or modification estimate. These projected figures, however, are subject to adjustment for actual construction costs when they become known.

The Transmission Customer shall agree to increase the secured amount to reflect any other adjustments as required by NEP to ensure that the existing security is sufficient to cover NEP's potential tax liability. The Transmission Customer shall agree to increase the secured amount within thirty (30) days of receipt of notice from NEP of any such adjustment to these costs. In the event that the Transmission Customer fails to do so, NEP shall have the right to seek termination of its service to the Transmission Customer until it increases the secured amount to the level specified by NEP.

**22.6 Payment of Tax and Reconciliation:** In the event that a Taxable Event occurs, NEP may exercise its rights under the security arrangement and draw upon all amounts necessary to pay the applicable taxes. If, in NEP's judgment, there are insufficient funds from such security to pay the applicable taxes, the Transmission Customer agrees to provide NEP with the balance of the funds needed within fifteen (15) days notice from NEP of such insufficiency. Any excess funds covered by security shall remain at NEP's disposal until NEP has received a final determination from the taxing authorities on the amounts payable as a result of the Taxable Event.

Upon such final determination, there shall be a reconciliation of the taxes payable by NEP, including any interest or penalties, and amounts provided by the Transmission Customer, in the form of security or otherwise. If the funds provided by the Transmission Customer prove insufficient to cover NEP's tax liability, the Transmission Customer shall pay NEP the amount of the underpayment within fifteen (15) days notice from NEP of the additional amount owed. If NEP receives a refund from the taxing authorities of any amounts paid due to the Taxable Event, NEP shall refund to the Transmission Customer such amount refunded to NEP. If taxes had not as yet been paid by NEP, in the form of estimated tax payments or otherwise, NEP shall refund the amount paid by the Transmission Customer in excess of NEP's actual tax liability. Interest on such amounts shall accrue, from the applicable following date: (a) the date the refund is received by NEP; (b) the date of recovery of estimated taxes previously paid by NEP (i.e., the due date of the tax payment following the determination); or (c) the date of final payment by the Transmission Customer under this Schedule, to the date NEP refunds such amount to the Transmission Customer. Once the Transmission Customer has fulfilled all of its obligations with respect to the final determination of the tax amounts payable, NEP shall release the Transmission Customer from all obligations under this Section. Interest, however, will not apply when a Letter of Credit is used as security.

**22.7 IRS Private Letter Ruling.** In the case of a Contribution in Aid of Construction ("CIAC") amounting to at least \$100,000 and upon written request by a Transmission Customer, NEP will request a Private Letter Ruling from the Internal Revenue Service on the taxable nature of the Transmission Customer's CIAC. The Transmission Customer must submit such written request to NEP, with payment for the estimated costs of obtaining such ruling, within 30 days of the Commission's acceptance of the transmission Customer's Service Agreement (or its amendment) covering construction under this Schedule. Payment shall be sufficient to cover NEP's estimated expenses in retaining outside tax counsel with expertise in such matters, all regulatory, filing and application fees and any other reasonable expenses, including salary and overhead costs, deemed appropriate and necessary for preparing, managing and obtaining the ruling.

The Transmission Customer shall be responsible for all costs that NEP incurs in pursuing the Private Letter Ruling. If NEP's costs in pursuing the Private Letter Ruling exceed the estimated costs shown, it shall so notify the Transmission Customer and the Transmission Customer shall reimburse or pay the estimated additional cost, as the case may be, within thirty (30) days of notification. NEP shall not be responsible for pursuing or continuing to pursue the Private Letter Ruling if the Transmission Customer has not complied with these payment provisions.

The Transmission Customer agrees that the selection and retention of outside tax counsel in this regard shall be exclusively determined by NEP. Furthermore, the Transmission Customer understands that NEP cannot predict or guarantee the outcome of the Private Letter Ruling and, should the Internal Revenue Service deem the CIAC taxable to NEP, the Transmission Customer must meet its financial obligations to NEP to cover federal and state taxes.

The Transmission Customer shall cooperate in the preparation and provision of information, documents and other materials needed by NEP and its outside counsel for the Private Letter Ruling application and its supporting description and analysis. As soon as practicable after NEP's receipt of the Private Letter Ruling from the IRS, it shall provide the Transmission Customer with a copy of the document. The parties agree that the decision of the IRS as to the taxable status of the CIAC shall be binding upon the parties, their successors and/or assigns.

**22.8 Land Interests:** The Transmission Customer recognizes that acquisition of the land interests necessary for the interconnection facilities may require individual agreements between NEP or its New England Affiliate and the landowners. The Transmission Customer agrees to pay NEP all its reasonable costs associated with these acquisition agreements in advance of their execution. In the event the Transmission Customer acquires the land, permits, licenses, franchises or regulatory or other approvals necessary for the construction and operation of the interconnection facilities, NEP has the right, at the Transmission Customer's expense, to approve or reject any terms and conditions related thereto prior to the acceptance of the interconnection facilities.

**22.9 Construction:** If the Transmission Customer does not request that the construction of the interconnection facilities be submitted for written bids as described below, NEP or its New England Affiliate shall construct the interconnection facilities and the Transmission Customer shall pay NEP the total costs associated with the construction of the interconnection facilities. The estimated costs (exclusive of any regulatory approval costs and/or fees) and the schedule for the Transmission Customer's payments to NEP will be shown the Service Agreement.

The Transmission Customer shall pay NEP following the close of the Transmission Customer's construction financing (if any) in accordance with the Payment Schedule shown in the Service Agreement. The Payment Schedule contains estimated milestones and estimated costs. NEP shall invoice the Transmission Customer for costs, on an estimated basis.

Within a reasonable period of time following completion of the interconnection facilities, NEP shall provide the Transmission Customer with a report of actual construction costs sufficient to allow identification of all major cost components. Upon completion of the interconnection facilities, the Transmission Customer and NEP agree to make a final adjustment to correct for any overpayment or underpayment of the construction costs.

**22.10 Construction by Third-Party:** The Transmission Customer may request that the construction of the interconnection facilities be submitted for written bids by NEP-approved contractors having the capability and skill to perform the work in accordance with the terms and conditions contained herein. The Transmission Customer shall assume all risks and consequences associated with the decision to use such bidding process.

The Transmission Customer understands that if a contractor other than NEP or its New England Affiliate constructs the interconnection facilities, the RFP process and interconnection facilities construction may require more time than if NEP or its New England Affiliate constructed the interconnection facilities. Notwithstanding the foregoing, the Transmission Customer understands and agrees that all construction work on existing facilities shall be done by NEP or its New England Affiliate. Such work shall not be included in the work submitted for bid by the Transmission Customer to outside contractors.

If the Transmission Customer requests that the construction of the interconnection facilities be submitted for written bids in accordance with the preceding paragraph, NEP shall prepare RFPs for construction of the interconnection facilities which, at a minimum, shall include construction drawings, steel structure specifications, bid drawings and specifications, materials specifications, and construction specifications. NEP shall also prepare the Qualified Bidders List. Materials, including steel structures, shall be obtained from suppliers listed in the Qualified Bidders List. The Transmission Customer shall seek NEP's prior approval with respect to any additions to the Qualified Bidders List or substitution of equal items of material from approved suppliers. The Transmission Customer shall reimburse NEP for its reasonable costs of preparing the RFPs and the Qualified Bidders List.

Upon the Transmission Customer's acceptance of the RFPs and the Qualified Bidders List, the Transmission Customer shall issue the RFPs to the contractors on the Qualified Bidders List. NEP and its New England Affiliates shall have the right to respond to the RFPs. The Transmission Customer shall review the responses to the RFPs and select a contractor to construct the interconnection facilities. Selection of the contractor shall be at the Transmission Customer's sole discretion, but subject to the limitations and criteria contained herein. The contractor selected by this process shall contract directly with the Transmission Customer for this construction. In no event shall NEP become legally or financially obligated to the selected contractor for construction of the interconnection facilities or any other related work.

If NEP or its New England Affiliate is not the successful bidder, NEP shall have the ongoing right to monitor, at the Transmission Customer's expense, and approve or reject the contractor's construction of the interconnection facilities to ensure that the contractor's performance satisfies NEP's specifications and the criteria set forth in this Schedule and all appendices, exhibits, and attachments hereto. NEP shall have the right to make a final inspection and acceptance of the

completed interconnection facilities. NEP's evaluation and acceptance of the interconnection facilities shall be based on compliance with the contract specifications; Good Utility Practice; the National Electric Safety Code as in effect during the time of construction; the appropriate state rules and regulations; NEP's Policy and Practices for Protection Requirements for New or Modified Load Interconnections; and other practices, procedures, specifications, and applicable standards developed by NEP's New England Affiliate. Any part of the work which NEP reasonably finds unsatisfactory shall be corrected prior to its acceptance of the completed interconnection facilities.

If the Transmission Customer selects a contractor other than NEP or its New England Affiliate, within thirty days following completion of the interconnection facilities, the Transmission Customer shall provide NEP with all detailed construction cost data that NEP needs to meet construction cost unitizing requirements under the Federal Power Act and relevant regulations.

#### 22.11 Delivery and Measurement of Electricity:

**22.11.1 Voltage Level:** All electricity across the interconnection point shall be the form of three-phase sixty-hertz alternating current at a voltage class determined by mutual agreement of the parties.

**22.11.2 Machine Reactive Capability:** The Transmission Customer will be required to provide reactive capability to regulate and maintain system voltage at the interconnection point. NEP and the ISO shall establish a scheduled range of voltages to be maintained by the Project. The reactive capability requirements shall be reviewed during the System Impact Study and Facilities Study.

**22.11.3 Metering and Related Equipment:** The Transmission Customer shall be responsible for the cost of installing and maintaining compatible metering and communication equipment at or distant from the Project which measures steam flow, if the Project is a generating source (as applicable and where necessary), as well as electricity flows between NEP and Transmission Customer and determines the status of switching equipment. The Transmission Customer shall be responsible for communicating to NEP accurate information on capacity and energy being transmitted. Instrument transformers shall be approved by NEP before the design is finalized. In cases where it may be appropriate for the metering equipment to be installed at the Transmission

Customer's property, NEP reserves the right to inspect, commission and witness test such meters. NEP shall also have access to read such meters remotely and locally to facilitate measurements and billing.

The Transmission Customer shall provide suitable space within its facilities for installation of the metering, telemetering, environmental control, and communication equipment at no cost to NEP.

The Transmission Customer shall be responsible for providing all necessary leased telephone lines and any necessary protection for leased lines and shall furthermore be responsible for all communication required by the ISO, or its designee. The Transmission Customer shall maintain all telemetering and transducer equipment on the Project in accordance with applicable criteria, rules, standards and operating procedures. At the Transmission Customer's expense, NEP shall purchase, own and maintain all telemetering equipment located on NEP's facilities. The Transmission Customer shall be responsible for the cost of installing NEP-approved or NEPspecified test switches in the transducer circuits.

If the metering equipment, the interconnection point and the Point(s) of Receipt are not at the same location, the metering equipment shall record delivery of electricity in a manner that accounts for losses occurring between the metering point and the Point(s) of Receipt or between the metering point and the interconnection point, as appropriate. Accounting for transmission losses between the metering point and the Point(s) of Receipt or between the metering point and the interconnection point (s) of Receipt or between the metering point and the Point(s) of Receipt or between the metering point and the Point(s) of Receipt or between the metering point and the interconnection point (s) of Receipt or between the metering point and the Point(s) of Receipt or between the metering point and the Point(s) of Receipt or between the metering point and the interconnection point (s) of Receipt or between the metering point and the Point(s) of Receipt or between the metering point and the Point(s) of Receipt or between the metering point and the OATT.

All metering equipment may be routinely tested by NEP at the Transmission Customer's expense, in accordance with applicable criteria, rules, standards and operating procedures. If, at any time, any metering equipment is found to be inaccurate by a margin greater than that allowed under applicable criteria, rules, standards and operating procedures, NEP shall cause such metering equipment to be made accurate or replaced at the Transmission Customer's expense. Meter readings for one-half the period extending back to the last successful meter test shall be adjusted so far as the same can be reasonably ascertained. Each party shall comply with any reasonable request of the other concerning the sealing of meters, the presence of a representative of the other party when the seals are broken and the tests are made, and other matters affecting the accuracy

of the measurement of electricity delivered from the Project. If either party believes that there has been a meter failure or stoppage, it shall immediately notify the other.

The Transmission Customer shall be responsible for the cost of purchasing and installing software, hardware and/or other technology that may be required to read billing meters.

The Transmission Customer shall be responsible for the costs of all metering and related equipment pursuant to Attachment OCC to this Schedule and/or Attachment DAF to this Schedule, as applicable.

**22.12 Notice Provisions:** If at any time, in the reasonable exercise of NEP's judgment, operation of the Project adversely affects the quality of service to other customers or interferes with the safe and reliable operation of the Transmission System or Distribution System, NEP may discontinue service to the Transmission Customer until the condition has been corrected. Unless an emergency exists or the risk of one is imminent, NEP shall give the Transmission Customer reasonable notice of its intention to discontinue service and, where practical, allow suitable time for the Transmission Customer to remove the interfering condition. NEP's judgment with regard to discontinuance of deliveries or disconnection of facilities under this paragraph shall be made in accordance with Good Utility Practice. In the case of such discontinuance, NEP shall immediately confer with the Transmission Customer regarding the conditions causing such discontinuance and its recommendation concerning the timely correction thereof.

**22.13** Access and Control: Properly accredited representatives of NEP or its New England Affiliates shall at all reasonable times have access to the Project to make reasonable inspections and obtain information required in connection with this Schedule. At the Project, such representatives shall make themselves known to the Transmission Customer's personnel, state the object of their visit, and conduct themselves in a manner that will not interfere with the construction or operation of the Project. NEP or its New England Affiliates will have control such that it may open or close the circuit breaker or disconnect and place safety grounds at the Point(s) of Receipt, or at the station, if the Point(s) of Receipt is (are) remote from the station.

**22.14 Insurance Requirements:** The Transmission Customer shall be subject to the insurance requirements specified in the Local Service Agreement.

#### 23 Load Shedding and Curtailments

**23.1 Transmission Constraints:** During any period when NEP determines that a transmission constraint exists on the Non-PTF, and such constraint may impair the reliability of the New England Transmission System, NEP will take whatever actions, consistent with Good Utility Practice, that are reasonably necessary to maintain the reliability of the system. To the extent NEP determines that the reliability of the New England Transmission System can be maintained by redispatching resources, NEP will initiate procedures pursuant to contracts with owners of the identified resources to redispatch all Network Resources and NEP's own resources on a least-cost basis without regard to the ownership of such resources. Any redispatch under this Section may not unduly discriminate between NEP's use of the Non-PTF on behalf of its Native Load Customers and any Network Customer's use of the Non-PTF to serve its designated Network Load.

**23.2** Cost Responsibility for Relieving Transmission Constraints: Whenever NEP implements least-cost redispatch procedures in response to a transmission constraint, NEP and the Network Customers will each bear a proportionate share of the total redispatch cost based on their respective Load Ratio Shares.

**23.3** System Reliability: A Network Customer that fails to respond to established load shedding and curtailment procedures will be deemed by NEP of making unauthorized use of the Transmission System. If unauthorized use occurs, NEP will charge and the Transmission Customer will be obligated to pay a penalty equal to twice the standard rate for such a transaction, as described more fully in Section 24.15 of this Schedule. In all cases of unauthorized use of the Transmission System, the service will be considered non-firm and NEP will be under no obligation to provide any services for such use.

#### 24 Compensation for Local Network Service

The following rates and charges may apply to Local Network Service as specified below. Charges under this Section shall include any applicable PTF costs not otherwise recovered under the OATT. To the extent that NEP enters into an incentive rate plan(s), the incentive rate terms shall be reflected in a separate filing with the Commission under Section 205 of the Federal Power Act. Additionally, all costs and revenues under such incentive rate plan(s) shall be excluded from NEP's PTF and Non-PTF Transmission Revenue Requirement. However, liquidated damages mandated by the Commission in

Docket No. RM02-1-000 shall be reflected in NEP's costs and included in its PTF and Non-PTF Transmission Revenue Requirement calculations.

**24.1** Monthly Demand Charge: Any Network Customer utilizing NEP's PTF facilities either directly or indirectly shall pay a Monthly Demand Charge as calculated in accordance with Attachment OCC to this Schedule.

**24.2** Monthly Non-PTF Demand Charge: Any Network Customer with Network Load qualifying as Non-PTF Network Load, shall pay a Monthly Non-PTF Demand Charge determined in accordance with Attachment OCC to this Schedule.

**24.3** Transformer Surcharge: In the event that a Network Customer does not own the stepdown transformation from 69 kV or greater voltage to distribution voltage level, where it utilizes NEP's Transformation Facilities, the Network Customer will be subject to a Transformer Surcharge calculated in accordance with Attachment OCC to this Schedule.

24.4 Meter Surcharge: If the Network Customer neither owns nor supports metering equipment necessary for provision of Local Network Service, that customer will be subject to a Meter Surcharge calculated in accordance with Attachment OCC to this Schedule.

**24.5 Power Factor Penalty:** Pursuant to the requirements of Section 20.1 of this Schedule, the Network Customer may be subject to a Power Factor Penalty calculated in accordance with Attachment OCC to this Schedule.

**24.6 Direct Assignment Facility Charge:** The Direct Assignment Facility Charge compensates NEP for the annual costs of the facilities, expansions and upgrades that may be directly assigned by NEP or by the ISO, as appropriate, to the Transmission Customer. These costs may include, but are not limited to, the capital carrying cost, income tax, depreciation, operation and maintenance, administrative and general expenses and property tax. The Direct Assignment Facility Charge shall be calculated as specified in Attachment DAF to this Schedule. In no event shall the Direct Assignment Facilities Charge be less than \$1,000.00 per year. If NEP enters into an agreement for use and support of facilities owned by other entities on behalf of a Transmission Customer, any charges incurred by NEP will be directly assigned to the Transmission Customer.

The Direct Assignment Facilities Charge in each year shall be billed based on forecast data for that year and shall be adjusted for experienced costs as soon as practicable after the close of the year. The charge so calculated shall commence on the date the facilities, expansions or upgrades are placed in service.

#### 24.7 Distribution Service:

**24.7.1** Specific Distribution Surcharge: Any Network Customer listed in Attachment OCC, VI, to this Schedule, which relies on the specific distribution facilities of NEP's New England Affiliate, Massachusetts Electric Company, as provided to NEP under the Integrated Facilities provision of NEP's FERC Electric Tariff No. 1 (Tariff No. 1), will be subject to a Specific Distribution Surcharge calculated in accordance with Attachment OCC to this Schedule.

**24.7.2 Rolled-In Distribution Surcharge:** To the extent that a Network Customer listed in Attachment OCC, VI, to this Schedule, utilizes distribution facilities in addition to the specific facilities identified in NEP's Tariff No. 1 (as of February 28, 1998), the Network Customer will pay the Rolled-In Distribution Surcharge calculated in accordance with Attachment DS to this Schedule for delivery service to load. To the extent that distribution service to a new Network Customer is subject to the direct jurisdiction of the Federal Energy Regulatory Commission, the provision of distribution service to that customer on or after March 1, 1998 shall be reflected in the Network Customer's Local Service Agreement.

In the event that the integrated distribution facilities under NEP's FERC Electric Tariff No. 1 are otherwise eliminated or superseded, the customers listed in Attachment OCC, VI, to this Schedule, will take distribution service entirely under the Rolled-In Distribution Surcharge calculated in accordance with Attachment DS to this Schedule.

**24.8** Ancillary Services: Any Network Customer with Network Load qualifying as PTF Network Load will be subject to the Network Load Dispatch Surcharge calculated in accordance with Attachment OCC to this Schedule.

**24.9 OASIS Charges:** Identifiable usage-dependent costs of OASIS may be charged to the specific user in accordance with the Commission's Final Order 889 in Docket No. RM95-9-000, and any subsequent amendments thereto.

#### 24.10 [Reserved]

**24.11 EPRI Credit:** The Network EPRI Credit, calculated in accordance with Attachment OCC to this Schedule, shall apply to any wholesale Network Customer, which is not also an Affiliate of NEP.

**24.12 Pre-1997 RNS Revenue Credit:** Pursuant to the compliance filing made by NEP in FERC Docket Nos. EC99-70-00 and ER99-2832-000 (Not Consolidated), Taunton Municipal Lighting Plant, Middleborough Gas and Electric Department and Pascoag Fire District will receive a credit in their monthly bill under this Schedule calculated in accordance with Attachment OCC to this Schedule.

**24.13** Network Upgrade Charge: If network upgrades are required in association with a new load, the Network Customer shall be required to pay a Network Upgrade Charge. The monthly Network Upgrade charge shall be the higher of (i) the allocated Monthly Transmission Expenses for Local Network Service with the New Network Upgrades rolled-in; or (ii) an incremental monthly charge for service based upon the total costs of the Network Upgrades for which the Transmission Customer is responsible as determined by the formula in Attachment DAF to this Schedule.

**24.14 Redispatch Charge:** Pursuant to Section 23.2 of this Schedule, the Transmission Customer may be subject to charges for generation redispatch.

**24.15** Unauthorized Use Penalty: Pursuant to Section 23.3 of this Schedule, the Transmission Customer may be subject to a penalty equal to twice the standard rate for unauthorized use of the Transmission System, based on the period of unauthorized use.

The annual standard rate per KW for unauthorized use of the Transmission System shall be derived from (i) the previous calendar year's annual transmission expenses as calculated in

Attachment RR, excluding any revenue credits associated with Section 24.1 of this Schedule divided by (ii) the average of the twelve Total Monthly Peak Loads from the previous year.7

The monthly standard rate per KW shall equal one-twelfth of the annual standard rate; the weekly standard rate per KW shall equal one-fifty-second of the annual standard rate; and the daily standard rate per KW shall equal one-fifth of the weekly standard rate.

The unauthorized use penalty charge for a single hour of unauthorized use shall be based on the daily standard rate, and more than one assessment for a given duration (e.g., daily) results in an increase of the penalty period to the next longest duration (e.g., weekly). The unauthorized use penalty charge for multiple instances of unauthorized use (i.e., more than one hour) within a day will be based on the daily standard rate. The unauthorized use penalty charge for multiple instances of unauthorized use penalty charge for multiple instances of unauthorized use penalty charge for multiple use isolated to one calendar week would result in a penalty based on the weekly standard rate. The unauthorized use penalty charge for multiple instances of unauthorized use based on the weekly standard rate. The unauthorized use penalty charge for multiple instances of unauthorized use during more than one week during a calendar month will be based on the monthly standard rate.

<sup>&</sup>lt;sup>7</sup> The standard rate is analogous to the former Firm Local Point-To-Point Service rate that was eliminated from Schedule 21-NEP (Attachment J) effective November 1, 2007; *see Docket No. ER07-1323-000*.

#### ATTACHMENT C

#### Form of System Impact Study Agreement

This Agreement dated \_\_\_\_\_\_, is entered into by \_\_\_\_\_\_ (the Transmission Customer) and New England Power Company (NEP), for the purpose of setting forth the terms, conditions and costs for conducting a System Impact Study relative to \_\_\_\_\_\_.

1. The Transmission Customer agrees to provide, in a timely and complete manner, all required information and technical data necessary for NEP to conduct the System Impact Study. The Transmission Customer understands that it must provide all such information and data prior to NEP's commencement of the Study. Such information and technical data is specified in Exhibit 1 to this Agreement.

2. All work pertaining to the System Impact Study that is the subject of this Agreement will be approved and coordinated only through designated and authorized representatives of NEP and the Transmission Customer. Each party shall inform the other in writing of its designated and authorized representative.

3. NEP will advise the Transmission Customer of any additional studies as it may in its sole discretion deem necessary. Any such additional studies shall be conducted only if required by Good Utility Practice and shall be subject to the Transmission Customer's consent to proceed, such consent not be unreasonably withheld.

4. NEP contemplates that it will require \_\_\_\_\_\_ to complete the System Impact Study. Upon completion of the Study by NEP, NEP will provide a report to the Transmission Customer based on the information provided and developed as a result of this effort. If, upon review of the Study results, the Transmission Customer decides to pursue \_\_\_\_\_\_, NEP will, at the Transmission Customer's direction, tender a Facilities Study Agreement within thirty (30) days. The System Impact and Facilities Studies, together with any additional studies contemplated in Paragraph 3, shall form the basis for the Transmission Customer's proposed use of NEP's transmission system and shall be furthermore utilized in obtaining necessary third-party approvals of any interconnection facilities and requested transmission services. The Transmission Customer understands and acknowledges that any use of study results by the Transmission Customer or their agents, whether in preliminary or final form, prior to application approval pursuant to Section I.3.9 of the Tariff, is completely at the Transmission Customer's risk and that NEP

will not guarantee or warrant the completeness, validity or utility of study results prior to application approval pursuant to Section I.3.9 of the Tariff.

5. The estimated costs contained within this Agreement are NEP's good faith estimate of its costs to perform the System Impact Study contemplated by this Agreement. NEP's estimates do not include any estimates for wheeling charges that may be associated with the transmission of facility output to third parties or with rates for station service. The actual costs charged to the Transmission Customer by NEP may change as set forth in this Agreement. Prepayment will be required for all study, analysis, and review work performed by NEP or its Designated Agent, all of which will be billed by NEP to the Transmission Customer in accordance with Paragraph 6 of this Agreement.

6. The payment required is \$\_\_\_\_\_\_ from the Transmission Customer to NEP for the primary system analysis, coordination, and monitoring of the System Impact Study. NEP will, in writing, advise the Transmission Customer in advance of any cost increases for work to be performed if total amount increases by 10% or more. Any such changes to NEP's costs for the study work shall be subject to the Transmission Customer's consent, such consent not to be unreasonably withheld. The Transmission Customer shall, within thirty (30) days of NEP's notice of increase, either authorize such increases and make payment in the amount set forth in such notice, or NEP will suspend the System Impact Study and this Agreement will terminate if so permitted by the Federal Energy Regulatory Commission.

In the event this Agreement is terminated for any reason, NEP shall refund to the Transmission Customer the portion of the above credit or any subsequent payment to NEP by the Transmission Customer that NEP did not expend in performing its obligations under this Agreement. Any additional billings under this Agreement shall be subject to an interest charge computed in accordance with the provisions of the OATT. Payments for work performed shall not be subject to refunding except in accordance with Paragraph 7 below.

7. If the actual costs for the work exceed prepaid estimated costs, the Transmission Customer shall make payment to NEP for such actual costs within thirty (30) days of the date of NEP's invoice for such costs. If the actual costs for the work are less than those prepaid, NEP will credit such difference toward NEP costs unbilled, or in the event there will be no additional billed expenses, the amount of the overpayment will be returned to the Transmission Customer with interest computed as stated in Paragraph 6 of this Agreement, from the date of reconciliation.

8. Nothing in this Agreement shall be interpreted to give the Transmission Customer immediate rights to wheel over or interconnect with NEP's Transmission or Distribution System. Such rights shall be provided for under separate agreement and in accordance with the OATT.

9. Within one (1) year following NEP's issuance of a final bill under this Agreement, the Transmission Customer shall have the right to audit NEP's accounts and records at the offices where such accounts and records are maintained, during normal business hours; provided that appropriate notice shall have been given prior to any audit and provided that the audit shall be limited to those portions of such accounts and records that relate to service under this Agreement. NEP reserves the right to assess a reasonable fee to compensate for the use of its personnel time in assisting any inspection or audit of its books, records or accounts by the Transmission Customer or their Designated Agent.

10. Each party agrees to indemnify and hold the other party and its Affiliates, including affiliated trustees, directors, officers, employees, and agents of each of them, harmless from and against any and all damages, costs (including attorney's fees), fines, penalties and liabilities, in tort, contract, or otherwise (collectively "Liabilities") resulting from claims of third parties arising, or claimed to have arisen as a result of any acts or omissions of either party under this Agreement. Each party hereby waives recourse against the other party and its Affiliates for, and releases the other party and its Affiliates from, any and all Liabilities for or arising from damage to its property due to a performance under this Agreement by such other party.

11. If either party materially breaches any of its covenants hereunder, the other party may terminate this Agreement by filing a notice of intent to terminate with the Federal Energy Regulatory Commission and serving notice of same on the other party to this Agreement.

12. This agreement shall be construed and governed in accordance with the laws of the Commonwealth of Massachusetts and with Part II of the Federal Power Act, 16 U.S.C. §§824d et seq., and with Part 35 of Title 18 of the Code of Federal Regulations, 18 C.F.R. §§35 et seq.

13. All amendments to this Agreement shall be in written form executed by both parties.

14. The terms and conditions of this Agreement shall be binding on the successors and assigns of either party.

15. This Agreement will remain in effect for a period of up to two years from its effective date as permitted by the Federal Regulatory Commission, and is subject to extension by mutual agreement. Either party may terminate this Agreement by thirty (30) days' notice except as is otherwise provided herein. If this Agreement expires by its own terms, it shall be NEP's responsibility to make such filing.

NEP:

By:			
Name	Title	Date	
Transmission Cus	stomer:		
By:			
Name	Title	Date	

# System Impact Study Agreement EXHIBIT 1

# Information to be Provided to NEP by the Transmission Customer for System Impact Study

## **1.0** Facilities Identification

1.1 Requested capability in MW and MVA; summer and winter

1.2 Site location and plot plan with clear geographical references

1.3 Preliminary one-line diagram showing major equipment and extent of Transmission Customer ownership

1.4 Auxiliary power system requirements

1.5 Back-up facilities such as standby generation or alternate supply sources

#### 2.0 Major Equipment

2.1 Power transformer(s): rated voltage, MVA and BIL of each winding, LTC and or NLTC taps and range, Z1 (positive sequence) and Z0 (zero sequence) impedances, and winding connections. Provide normal, long-time emergency and short-time emergency thermal ratings.

2.2 Generator(s): rated MVA, speed and maximum and minimum MW output, reactive capability curves, open circuit saturation curve, power factor (V) curve, response (ramp) rates, H (inertia), D (speed damping), short circuit ratio, X1 (leakage), X2 (negative sequence), and X0 (zero sequence) reactances and other data:

Direct	Quadrature		
Axis	Axis		

Xdv

Xqv

	Direct	Quadrature
	Axis	Axis
unsaturated synchronous reactance	Xdi	Xqi
saturated transient reactance	X'dv	X'qv
unsaturated transient reactance	X'di	X'qi
saturated subtransient reactance	X"dv	X"qv
unsaturated subtransient reactance	X"di	X"qi
transient open-circuit time	T'do	T'qo
constant		
transient short-circuit time	T'd	T'q
constant		
subtransient open-circuit time	T"do	T"qo
constant		
subtransient short-circuit time	T"d	T"q
constant		

2.3 Excitation system, power system stabilizer and governor: manufacturer's data in sufficient detail to allow modeling in transient stability simulations.

2.4 Prime mover: manufacturer's data in sufficient detail to allow modeling in transient stability simulations, if determined necessary.

2.5 Busses: rated voltage and ampacity (normal, long-time emergency and short-time emergency thermal ratings), conductor type and configuration.

2.6 Transmission lines: overhead line or underground cable rated voltage and ampacity (normal, long-time emergency and short-time emergency thermal ratings), Z1 (positive sequence) and Z0 (zero sequence) impedances, conductor type, configuration, length and termination points.

2.7 Motors greater than 150 kW 3-phase or 50 kW single-phase: type (induction or synchronous), rated hp, speed, voltage and current, efficiency and power factor at  $\frac{1}{2}$ ,  $\frac{3}{4}$  and full load, stator resistance and reactance, rotor resistance and reactance, magnetizing reactance.

2.8 Circuit breakers and switches: rated voltage, interrupting time and continuous, interrupting and momentary currents. Provide normal, long-time emergency and short-time emergency thermal ratings.

2.9 Protective relays and systems: ANSI function number, quantity manufacturer's catalog number, range, descriptive bulletin, tripping diagram and three-line diagram showing AC connections to all relaying and metering.

2.10 CT's and VT's: location, quantity, rated voltage, current and ratio.

2.11 Surge protective devices: location, quantity, rated voltage and energy capability.

#### 3.0 Other

3.1 Additional data to perform the System Impact Study will be provided by the Transmission Customer as requested by NEP.

3.2 NEP reserves the right to require specific equipment settings or characteristics necessary to meet the applicable criteria and standards.

#### ATTACHMENT D

#### Form of Facilities Study Agreement

This agreement dated \_\_\_\_\_\_, is entered into by \_\_\_\_\_\_ (the Transmission Customer) and New England Power Company (NEP), for the purpose of setting forth the terms, conditions and costs for conducting a Facilities Study Agreement relative to \_\_\_\_\_\_. The Facilities Study will determine the detailed engineering, design and cost of the facilities necessary to satisfy the Transmission Customer's request for service over NEP's Transmission System.

1. The Transmission Customer agrees to provide, in a timely and complete manner, all required information and technical data necessary for NEP to conduct the Facilities Study. Where such information and technical data was provided for the System Impact Study, it should be reviewed and updated with current information, as required.

2. All work pertaining to the Facilities Study that is the subject of this Agreement will be approved and coordinated only through designated and authorized representatives of NEP and the Transmission Customer. Each party shall inform the other in writing of its designated and authorized representative.

3. NEP will advise the Transmission Customer of additional studies as may be deemed necessary by NEP. Any such additional studies shall be conducted only if required by Good Utility Practice and shall be subject to the Transmission Customer's consent to proceed, such consent not to be unreasonably withheld.

4. NEP contemplates that it will require <u>days to complete the Facilities Study</u>. Upon completion of the study by NEP, NEP will provide a report to the Transmission Customer based on the information provided and developed as a result of this effort. If, upon review of the study results, the Transmission Customer decides to pursue its transmission service request, the Transmission Customer must sign a supplemental Service Agreement with NEP. The System Impact and Facilities Studies, together with any additional studies contemplated in Paragraph 3, shall form the basis for the Transmission Customer's proposed use of NEP's Transmission System and shall be furthermore utilized in obtaining necessary third-party approvals of any facilities and requested transmission services. The Transmission Customer understands and acknowledges that any use of the study results by the Transmission Customer or their agents, whether in preliminary or final form, prior to application approval pursuant to Section I.3.9 of the Tariff, is completely at the Transmission Customer's risk and that NEP will not guarantee or warrant the completeness, validity or utility of the study results prior to application approval pursuant to Section I.3.9 of the Tariff.

5. The estimated costs contained within this Agreement are NEP's good faith estimate of its costs to perform the Facilities Study contemplated by this Agreement. NEP's estimates do not include any estimates for wheeling charges that may be associated with the transmission of facility output to third parties or with rates for station service. The actual costs charged to the Transmission Customer by NEP may change as set forth in this Agreement. Prepayment will be required for all study, analysis, and review work performed by NEP's or its Designated Agent's personnel, all of which will be billed by NEP to the Transmission Customer in accordance with Paragraph 6 of this Agreement.

6. The payment required is \$\_\_\_\_\_\_ from the Transmission Customer to NEP for the primary system analysis, coordination, and monitoring of the Facilities Study to be performed by NEP for the Transmission Customer's requested service. NEP will, in writing, advise the Transmission Customer in advance of any cost increases for work to be performed if the total amount increases by 10% or more. Any such changes to NEP's costs for the study work to be performed shall be subject to the Transmission Customer's consent, such consent not to be unreasonably withheld. The Transmission Customer shall, within thirty (30) days of NEP's notice of increase, either authorize such increases and make payment in the amount set forth in such notice, or NEP will suspend the study and this Agreement will terminate if so permitted by the Federal Energy Regulatory Commission. In the event this Agreement is terminated for any reason, NEP shall refund to the Transmission Customer that NEP did not expend in performing its obligations under this Agreement. Any additional billings under this Agreement shall be subject to an interest charge computed in accordance with the provisions of the OATT. Payments for work performed shall not be subject to refunding except in accordance with Paragraph 7 below.

7. If the actual costs for the work exceed prepaid estimated costs, the Transmission Customer shall make payment to NEP for such actual costs within thirty (30) days of the date of NEP's invoice for such costs. If the actual costs for the work are less than that prepaid, NEP will credit such difference toward NEP costs unbilled, or in the event there will be no additional billed expenses, the amount of the overpayment will be returned to the Transmission Customer with interest computed in accordance with the provisions of the OATT.

8. Nothing in this Agreement shall be interpreted to give the Transmission Customer immediate rights to interconnect to or wheel over NEP's Transmission or Distribution System. Such rights shall be provided for under separate agreement.

9. Within one (1) year following NEP's issuance of a final bill under this Agreement, the Transmission Customer shall have the right to audit NEP's accounts and records at the offices where such accounts and records are maintained during normal business hours; provided that appropriate notice shall have been given prior to any audit and provided that the audit shall be limited to those portions of such accounts and records that relate to service under this Agreement. NEP reserves the right to assess a reasonable fee to compensate for the use of its personnel time in assisting any inspection or audit of its books, records or accounts by the Transmission Customer or their Designated Agent.

10. Each party agrees to indemnify and hold the other party and its Affiliates, including affiliated trustees, directors, officers, employees, and agents of each of them, harmless from and against any and all damages, costs (including attorney's fees), fines, penalties and liabilities, in tort, contract, or otherwise (collectively "Liabilities") resulting from claims of third parties arising, or claimed to have arisen as a result of any acts or omissions of either party under this Agreement. Each party hereby waives recourse against the other party and its Affiliates for, and releases the other party and its Affiliates from, any and all Liabilities for or arising from damage to its property due to performance under this Agreement by such other party.

11. If any party materially breaches any of its covenants hereunder, the other party may terminate this Agreement by filing a notice of intent to terminate with the Federal Energy Regulatory Commission and serving notice of same on the other party to this Agreement.

12. This agreement shall be construed and governed in accordance with the laws of the Commonwealth of Massachusetts and with Part II of the Federal Power Act, 16 U.S.C. §§824d et seq., and with Part 35 of Title 18 of the Code of Federal Regulations, 18 C.F.R. §§35 et seq.

13. All amendments to this Agreement shall be in written form executed by both parties.

14. The terms and conditions of this Agreement shall be binding on the successors and assigns of either party.

15. This Agreement will remain in effect for a period of up to two years from its effective date as permitted by the Federal Energy Regulatory Commission, and is subject to extension by mutual agreement.

Either party may terminate this Agreement by thirty (30) days' notice except as is otherwise provided herein. If this Agreement expires by its own terms, it shall be NEP's responsibility to make such filing. NEP:

Ву:			
Name	Title	Date	
Transmission Cus	tomer:		
By:			
Name	Title	Date	

#### ATTACHMENT E

#### **Local Service Agreement**

# Policy and Practices for Protection Requirements For New or Modified Load Interconnections

Any load facility, hereafter called a LF, desiring to interconnect with NEP's electrical system or modify an existing interconnection must meet the technical specifications and requirements set forth in this Policy and Practices. Once interconnected, NEP, in keeping with Good Utility Practice and in its sole discretion, may disconnect the LF if the LF departs from the technical specifications and requirements of this Policy and Practices. The LF must return to full compliance with this Policy prior to reconnecting with NEP's electrical system.

If it is possible for the LF to be a significant source of current flow into NEP's lines due to generation sources within the LF system then NEP may determine the LF to be considered a Generation Facility and the Policy and Practices for Protection Requirements for Generation Interconnections shall apply as set forth in the New England ISO OATT.

This document is divided into the following sections:

- 1. Protection Information Required from the LF for All Interconnections
- 2. General Protection Requirements for All LF Interconnections
- 3. Protection Equipment Requirements for All LF Interconnections
- 4. Requirements for Protection of NEP's System
- 5. Requirements for Protection of NEP's System: Facilities Having Sources
- 6. Requirements for Emergency Load Reduction
- 7. Protection System Testing and Maintenance
- 8. Changes to the LF's Protection System

# 1.) PROTECTION INFORMATION REQUIRED FROM THE LF FOR ALL INTERCONNECTIONS

A. The following information must be submitted by the LF for review and acceptance by NEP prior to finalizing the LF's protection design:

- A station one-line drawing.
- A one-line drawing showing the relays and metering including current transformer (CT) and voltage transformer (VT) connections and ratios.
- A three-line drawing showing the AC connections to the relays and meters.
- The LF's transformer nameplate information including rated voltage, rated KVA, positive and zero sequence impedances and winding connections.
- A list of protective relay equipment proposed to be furnished to conform with this Policy and Practices including: relay types, styles, manufacturer's catalog numbers, ranges and descriptive bulletins.
- Schematic drawings showing the control circuits for the interconnection breaker(s) or equivalent interrupting device(s).
- Equipment specifications for CTs and VTs relevant to the interconnection.
- Interconnection breaker or equivalent interrupting device operating time.
- Other information that may be determined by NEP as required for a specific interconnection.

B. Relay settings for all LF protective relays that affect the interconnection with NEP's system must be submitted by the LF for review and acceptance by NEP at least four weeks prior to the scheduled date for setting the relays.

C. If, due to the interconnection of the LF to the line, the fault interrupting, continuous, momentary or other rating of any of NEP's equipment or the equipment of others connected to NEP's system is exceeded, NEP shall have the right to require the LF to pay for the purchase, installation, replacement or modification of equipment to eliminate the condition. Where such action is deemed necessary by NEP, NEP will, where possible, permit the LF to choose among two or more options for meeting NEP's requirements as described in this Policy and Practices.

## 2.) GENERAL PROTECTION REQUIREMENTS FOR ALL LF INTERCONNECTIONS

A. A circuit breaker, or other fault interrupting method acceptable to NEP, shall be installed to isolate the LF from NEP's system. This will hereafter be called the "interconnection breaker". If there is more than one interconnection breaker, the requirements of this Policy and Practices apply to each one individually.

B. NEP will review the relay settings as submitted by the LF to assure adequate protection for NEP's facilities. NEP shall not be responsible for the protection of the LF's facilities. Providing the relaying is installed and maintained as reviewed, the LF shall not be responsible for the protection of NEP's facilities. The LF shall be responsible for protection of its system against possible damage resulting from interconnection with NEP.

If requested by the LF, NEP will provide system protection information for the line terminal(s) directly related to the interconnection. This protection information is provided exclusively for use by the LF in evaluating protection of the LF's facilities during parallel operation.

C. NEP shall specify whether the transformer, if any, between NEP's voltage and the LF's distribution voltage, hereafter called the "LF's transformer", is to be grounded or ungrounded at NEP's voltage.

#### 3.) PROTECTION EQUIPMENT REQUIREMENTS FOR ALL LF INTERCONNECTIONS

A. The interconnection breaker control circuits shall be DC powered from a station battery.

B. The LF shall provide a switch at the Interconnection Point with NEP that can be opened for isolation. NEP shall have the right to open the interconnection during emergency conditions or with due notice to the LF at other times. NEP shall exercise such right in accordance with Good Utility Practice. The switch shall be gang operated, have a visible break when open, and be capable of being locked open, tagged and grounded on NEP side by NEP personnel. The switch shall be of a manufacture and type generally accepted for use by NEP.

C. Protective relaying control circuits shall be DC powered from a station battery. Solid state relays shall be self powered or DC powered from a station battery.

D. CT ratios and accuracy classes shall be chosen such that secondary current is less than 100 amperes and transformation errors are less than 10% under maximum fault conditions.

E. All protective relays required by this Policy and Practices shall meet ANSI/IEEE standard C37.90 and be of a manufacture and type generally accepted for use by NEP.

F. Protective relays provided by the LF as required per this Policy and Practices shall be sufficiently redundant and functionally separate so as to provide adequate protection, as determined by NEP, upon the failure of any one component. The use of a single all-inclusive relay package is not acceptable.

G. NEP may require the LF to provide two independent, redundant relaying systems in accordance with NPCC Criteria for the Protection of the Bulk Power System if the interconnection is to the Bulk Power System or if it is determined that delayed clearing of faults within the LF adversely affects the Bulk Power System.

H. A direct transfer tripping system, if provided, shall use equipment generally accepted for use by NEP and shall, at the option of NEP, use dual channels.

## 4.) **REQUIREMENTS FOR PROTECTION OF THE TRANSMISSION SYSTEM**

A. The LF must provide protective relays to detect any faults, whether phase-to-phase or phase-toground within the LF, and isolate the LF from NEP's line(s) such that the following criteria are met, as determined by NEP:

- The existing sensitivity of fault detection is not substantially degraded.
- The existing speed of fault clearing is not substantially degraded.
- The coordination margin between relays is not substantially reduced.
- The sustained unfaulted phase voltage during a line-to-ground fault is not increased beyond 1.25 times the normal phase-to-ground voltage. (This value may be further reduced if required to coordinate with existing system insulation levels and overvoltage protection.)
- Non-directional line relays will not operate for faults external to the line due to the LF's contribution.
- Proper settings for existing relays are achievable within their ranges.

NEP may perform engineering studies to evaluate the LF's protection compliance with respect to the above and may make recommendations to the LF on methods to achieve compliance.

If, due to the interconnection of the LF to NEP's system, any of the above criteria are violated for NEP's facilities or for the facilities of others connected to NEP's system, NEP shall have the right to require the

LF to pay for the purchase, installation, replacement or modification of protective equipment to eliminate the violation and restore the level of protection existing prior to the interconnection. This may include the addition of pilot relaying systems involving communications between all terminals. Where such action is deemed necessary by NEP, NEP will, where possible, permit the LF to choose among two or more options for meeting NEP's requirements as described in this Policy and Practices.

B. The LF is responsible for procuring any communications channels necessary between the LF and NEP's stations and for providing protection from transients and overvoltages at all ends of these communication channels.

C. The LF may be required to use high speed protection if time-delayed protection would result in degradation in the existing sensitivity or speed of the protection systems on NEP's lines.

D. The LF may be required to provide local breaker failure protection which may include direct transfer tripping to NEP's line terminal(s) in order to detect and clear faults within the LF that cannot be detected by NEP's back-up protection.

# 5.) REQUIREMENTS FOR PROTECTION OF THE TRANSMISSION SYSTEM: FACILITIES HAVING SOURCES

If it is possible for the LF to be a source of current flow into NEP's system, either due to generation within the LF system or due to connections within the LF system to other sources, the LF must provide protective relays to detect any faults, whether phase-to-phase or phase-to-ground on NEP's lines or within the LF, and isolate the LF from NEP's line(s) per the requirement of Section 4 above and the following:

A. A control interlock scheme that detects voltage on NEP's line(s) shall be used to prevent an interconnection breaker from closing to energize NEP's line(s).

B. A voltage transformer shall be provided by the LF, connected to NEP side of the interconnecting breaker. The voltage from this VT shall be used in the interlock as specified in Section 5A above. If the LF's connection is ungrounded at NEP voltage, this VT shall be a single three-phase device or three single-phase devices connected from each phase to ground, rated for phase-to-phase voltage and provided with two secondary windings. One winding shall be connected in open delta, have a loading resistor to prevent ferroresonance, and be used for the relay specified in Section 5C below.

C. If the LF's connection to NEP's system is un-grounded, the LF shall provide a zero sequence overvoltage relay fed from the open delta of the three phase VT specified in Section 5B above.

D. NEP's lines generally have automatic reclosing following a trip with reclosing times as short as five seconds and without regard to whether the LF is keeping the circuit energized. The LF is responsible for protecting its equipment from being reconnected out of synchronism with NEP's system by an automatic line reclosure operation. The LF may choose to install additional equipment such as direct transfer tripping from NEP's station(s) to insure the LF is off the line prior to the line reclosing.

#### 6.) **REQUIREMENTS FOR EMERGENCY LOAD REDUCTION**

A. The LF shall provide a manual load shed lockout relay to trip and block closing of selected load feeders. This relay shall be operated via a signal sent from an area dispatching center to a remote terminal unit (RTU) provided by the LF and shall be manually reset. The selection of feeders to trip shall be in conformance with NPCC Emergency Operation Criteria and determined by the area control authority. Alternatively, the LF may elect to provide compensatory load reduction through contractual arrangements with other area customers or by other means.

B. During system conditions where local area load exceeds generation, NPCC Emergency Operation Criteria requires a program of phased automatic underfrequency load shedding of up to 25% of area load to assist in arresting frequency decay and to minimize the possibility of system collapse. In conformance to these criteria, the LF shall provide an underfrequency relay with a lockout function to trip and block closing of selected load feeders. Feeders so shed shall not be re-energized without the express permission of the area control authority. If desired, the LF may use the RTU specified in Section 6A above to receive a signal sent from an area dispatching center that would reset the lockout function and permit automatic restoration of the feeders. The underfrequency settings and the selection of feeders shall be in conformance with these Criteria and determined by the area control authority. Alternatively, the LF may elect to provide compensatory load reduction to conform with the requirements of this Section through contractual arrangements with other area customers or by other means.

C. The LF shall provide a voltage reduction function to reduce the feeder voltage regulation set point by 5% for all load feeders. This function shall be operated via a signal sent from an area dispatching

center to an RTU provided by the LF and shall be remotely reset from the dispatching center or self reset in 4 hours.

D. Depending on the point of connection of the LF to NEP's system, NEP may require a dead station tripping function to disconnect the LF from NEP's lines following six minutes of de-energized NEP lines in order to assist in restoration of service following an area or system wide shutdown.

## 7.) PROTECTION SYSTEM TESTING AND MAINTENANCE

A. NEP shall have the right to witness the testing of protective relays and control circuits required by this Policy and Practices at the completion of construction and to receive a copy of all test data. The LF shall provide NEP with at least a one week notice prior to the final scheduling of these tests. Testing shall consist of:

- CT and CT circuit polarity, ratio, insulation, excitation, continuity and burden tests.
- VT and VT circuit polarity, ratio, insulation and continuity tests.
- Relay pick-up and time delay tests.
- Functional breaker trip tests from protective relays.
- Relay in-service test to check for proper phase rotation and magnitudes of applied currents and voltages.
- Breaker closing interlock tests.
- Other relay commissioning tests typically performed for the relay types involved.

B. The protective relays shall be tested and maintained by the LF on a periodic basis but not less than once every four years or as determined by NEP. The results of these tests shall be summarized by the LF and reported in writing to NEP.

For relays installed in accordance with the NPCC Criteria for the Protection of the Bulk Power System, maintenance intervals shall be in accordance with the NPCC Maintenance Criteria for Bulk Power System Protection. The status of conformance with the NPCC Maintenance Criteria for Bulk Power System Protection shall be reported in writing to NEP annually.

## 8.) CHANGES TO THE LF'S PROTECTION SYSTEM

The LF must provide NEP with reasonable advance notice of any proposed changes to be made to the protective relay system, relay settings, operating procedures or equipment that affect the interconnection. NEP will determine if such proposed changes require re-acceptance of the interconnection per the requirements of this Policy and Practices.

In the future, should NEP implement changes to the system to which the LF is interconnected, the LF will be responsible at its own expense for identifying and incorporating any necessary changes to its protection system. Those changes to the LF's protection system are subject to review and approval by NEP.

# ATTACHMENT F

# Local Service Agreement

### **Insurance Requirements**

During the term of this Agreement, the interconnecting Transmission Customer, at its own cost and expense, shall procure and maintain insurance in the forms and amounts acceptable to NEP at the following minimum levels of coverage:

1) Statutory coverage for workers' compensation, and Employer's Liability Coverage with a limit no less than \$500,000.00 per accident;

 Comprehensive General Liability Coverage including Operations, Contractual Liability and Broad Form Property Damage Liability written with limits no less than \$5,000,000.00 combined single limit for Bodily Injury Liability and Property Damage Liability; and

3) Automobile Liability for Bodily Injury and Property Damage to cover all vehicles used in connection with the work with limits no less than \$1,000,000.00 combined single limit for Bodily Injury and Property Damage Injury.

Prior to commencing the work, the interconnecting Transmission Customer shall have its insurer furnish to NEP certificates of insurance evidencing the insurance coverage required above and the interconnecting Transmission Customer shall notify and send copies to NEP of any policies maintained hereunder written on a "claims-made" basis. NEP may at its discretion require the interconnecting Transmission Customer to maintain tail coverage for five years on all policies written on a "claims-made" basis.

Every contract of insurance providing the coverages required in this provision shall contain the following or equivalent clause: "No reduction, cancellation or expiration of the policy shall be effective until thirty (30) days from the date written notice thereof is actually received by the interconnecting Transmission Customer. Upon receipt of any notice of reduction, cancellation or expiration, the interconnecting Transmission Customer shall immediately notify NEP.

NEP and its Affiliates shall be named as additional insureds, as their interests may appear, on the Comprehensive General Liability and Automobile Liability policies described above.

The interconnecting Transmission Customer shall waive all rights of recovery against NEP for any loss or damage covered by said policies. Evidence of this requirement shall be noted on all certificates of insurance provided to NEP.

# ATTACHMENT H

# Methodology for Completing System Impact Study

When New England Power Company ("NEP") determines on a non-discriminatory basis that a System Impact Study is needed because its Transmission System will be inadequate to accommodate a request for service, the following outlines the study methodology that NEP will employ to estimate the transmission system impact of a request for firm Transmission Service and/or any Costs for System Redispatch, Direct Assignment Facilities or Network Upgrades that would be incurred in order to provide the requested transmission service.

- 1. System Impact will be estimated based on consideration of reliability requirements to
  - . meet obligations under agreements that predate the OATT;
  - . meet obligations of existing and pending Valid Requests under the OATT; and
  - . maintain thermal, voltage and stability system performance within acceptable regional practices

2. Guidelines and Principles followed by NEP - NEP is a Participating Transmission Owner under the TOA and the Tariff and a member of the NPCC. When performing the System Impact Study, NEP will apply the following, as amended and/or adopted from time to time.

- . Good Utility Practice;
- . Criteria rules and reliability standards applicable to the New England Transmission System;
- . NPCC criteria and guidelines; and
- . New England Power Service Company (or its successor) guides

3. Transmission System Model Representation - The Transmission System Model will be based on a library of loadflow cases prepared by the ISO for studies of the New England area. The models may include representations of other NPCC and neighboring systems. These loadflow cases include individual system model representations provided by members of the ISO and represent forecasted system conditions for up to ten years in to the future. This library of loadflow cases is maintained and updated as appropriate by the ISO, and is consistent with information filed under FERC Form 715. NEP will use system models that it deems appropriate for study of the Request for Service. Additional system models and operating conditions, including assumptions specific to a particular analysis, may be developed for conditions not available in the library of loadflow cases. The system models may be modified, if necessary, to include additional system information on load, transfers and configuration, as it becomes available.

4. System Conditions - Loading of all transmission system elements shall be less than normal ratings for precontingency conditions and less than long-term emergency (LTE) ratings for post-contingency conditions. Post-contingency loading above LTE rating and less than short-term emergency (STE) rating may be allowed where demonstrated that loading can be reduced below the LTE rating within 15 minutes.

Transmission system voltages shall be within the applicable design ratings of connected equipment for normal and emergency conditions. Normal and post-contingency voltages shall be in accordance with NEP and ISO standards.

**5. Short Circuits** - Transmission system short circuit currents shall be within the applicable equipment design ratings.

6. Study Analysis - System impact of the integration of new generators will be evaluated to meet the requirements of design, identified in the guidelines and principles under Item 2, to provide sufficient transmission capability to maintain stability and to maintain thermal and voltage levels of lines and equipment within applicable limits. The same applies to the evaluation of transmission and delivery service under this tariff.

**7. Loss Evaluation** - The impact of losses on the Transmission System will be taken into account in the System Impact Study to ensure Good Utility Practice in the design and operation of its system.

8. System Protection - Protection requirements will be evaluated by NEP.

**9. Approvals** - NEP will conduct the System Impact Study to ensure compliance with its planning and design policies and practices. However, the actions to be taken by the Parties to implement the recommendations of the System Impact Study are subject to approval under the ISO New England Operating Procedures or Section I.3.9 of the Tariff, as amended and/or adopted from time to time.

**10. Study Scope and Reporting** - The study will determine the impacts and identify changes required, if any, to NEP's existing Transmission System. NEP will provide the Eligible Customer with a written report of the physical interconnection alternative(s), required NEP system additions and/or modifications, if any, associated study grade cost estimates (+/-25%) and the results of the analysis.

# ATTACHMENT I

# **Real Power Losses Factors**

Voltage Class	Losses as a % of
kV	Energy Delivered
Stepdown transformer*	1.00
69	1.25**
34.5	1.98
23	2.61
15	4.18
5	4.34
Dist. Secondary	0.52

\*The transformer that steps the voltage from the transmission level to the delivery level.

\*\*The loss factor for the 69 kV level applies only when the Point of Delivery is not directly interconnected with the PTF.

Note: When multiple voltage levels are present between the Point of Delivery and the metering point, the loss factors are additive.

## ATTACHMENT DAF

#### **Direct Assignment Facilities**

This Attachment applies to all transactions that utilize any Direct Assignment Facilities or any other charges specifically assigned to a customer by NEP under this Schedule or the OATT. The formula set forth in this Attachment, as it may be amended from time to time, represents the Direct Assignment Facilities Charge which a Transmission Customer or Network Customer (together, "Transmission Customer") will pay in addition to the other applicable charges specified herein.

The determination of the annual Direct Assignment Facilities Charges chargeable to a specific Transmission Customer or group of Transmission Customers shall be calculated by the Annual Facility Charge formulas set forth below for transmission and distribution facilities. In no event will the Annual Facilities Charge be less than \$1,000 per calendar year.

## TRANSMISSION

#### **Determination of Annual Facilities Charges for Transmission Facilities**

The basis for this charge is data of NEP. The Annual Facilities Charge for NEP and its New England Affiliates shall equal the product of the year-end Gross Plant Investment associated with the facility and the average Annual Transmission Carrying Charge, for the life of the facility.

The Gross Plant Investment will be the investment from the plant accounting records associated with the facility.

The average Annual Transmission Carrying Charge shall be the Annual Transmission Revenue Requirement as determined in Attachment RR, Sections I. (A) through I. (H) to this Schedule, divided by the year-end balance of total transmission plant investment determined in accordance with Attachment RR, Section I. (A) (1) (a) to this Schedule.

To the extent that the Transmission Customer provides a Contribution in Aid of Construction the average Annual Transmission Carrying Charge calculation will be modified to exclude Sections I. (A) (1) (a), I. (A) (1) (b), I. (A) (1) (c), I. (A) (1) (f), I. (B), and I. (C) of Attachment RR to this Schedule.

If the Transmission Customer permanently terminates service prior to the normal expiration of its Service Agreement, the Transmission Customer may, at its option, close out its continuing obligation to pay the Annual Facilities Charge by paying NEP a lump sum payment equal to the net present value of the Return and Depreciation Expense on the net book value of the facility at the time of termination that would have been collected over the remaining life of the facility, plus any cost of removal if applicable. The return shall be equal to that found in Attachment RR, Section I. (A)(2) to this Schedule, in the year of termination. Depreciation Expense shall be based on a straight-line method. The discount rate in the net present value calculation shall be equal to the interest rate pursuant to Section 35.19(a) of the Commission's regulations effective at the time of termination.

Billings shall initially be based upon estimates calculated based on actual costs in the preceding year, such estimates being adjusted to actual as soon as practicable after such costs become known. The source of the data shall be NEP's accounting records.

#### DISTRIBUTION

#### **Determination of the Annual Facilities Charge for Distribution Facilities**

The basis for this charge is data of NEP's New England Affiliate(s) or any other Affiliate that shall assume ownership over the Facilities included under this attachment.

The Annual Facilities Charge shall equal the product of the year-end Gross Plant Investment associated with the facility and the average Annual Distribution Carrying Charge, for the life of the facility.

The Gross Plant Investment will be the investment from the plant accounting records associated with the facility.

The average Annual Distribution Carrying Charge shall be the Annual Distribution Revenue Requirement as determined in Attachment RR, Exhibit 1 to this Schedule, divided by the year-end balance of total distribution plant investment determined in accordance with Attachment RR, Exhibit 1, Section I. (A) (1) (a) to this Schedule.

To the extent that the Transmission Customer provides a Contribution in Aid of Construction the average Annual Distribution Carrying Charge calculation will be modified to exclude Sections I. (A) (1) (a), I. (A) (1) (d), I. (A) (1) (e), I. (A) (1) (f), I. (B), and I. (C) of Attachment RR, Exhibit 1 to this Schedule.

If the Transmission Customer permanently terminates service in advance of the term of its Service Agreement, the Transmission Customer may, at its option, close out its continuing obligation to pay the Annual Facilities Charge by paying NEP a lump sum payment equal to the net present value of the Return and Depreciation Expense on the net book value of the facility at the time of termination that would have been collected over the remaining life of the facility, plus any cost of removal if applicable. The return shall be equal to that found in Attachment RR, Exhibit 1, Section I.(A)(2) to this Schedule, in the year of termination. Depreciation Expense shall be based on a straight-line method. The discount rate in the net present value calculation shall be equal to the interest rate pursuant to Section 35.19(a) of the Commission's regulations effective at the time of termination.

Billings in accordance with this Schedule shall initially be based upon estimates calculated based on actual costs in the preceding year, such estimates being adjusted to actual as soon as practicable after such costs become known. The source of the data shall be NEP's or its applicable New England Affiliate's accounting records.

## METERS

#### **Determination of Annual Metering Charges**

The Meter Maintenance Charge shall equal the product of NEP's installed metering costs for the customer and the Meter Carrying Charge determined in Attachment OCC, Exhibit 3 to this Schedule.

In accordance with the Meter Carrying Charge referenced above, the Annual Metering Charges will be updated on May 31 each year to reflect costs from the prior calendar year.

If the customer makes a CIAC, then the carrying charge in Attachment OCC, Exhibit 3 to this Schedule, will be adjusted accordingly.

# ATTACHMENT DS

#### **Rolled-In Distribution Surcharge**

The monthly Rolled-in Distribution Surcharge shall be (i) the monthly cost per kilowatt of \$2.77, multiplied by (ii) the annual peak load of the Transmission Customer on the distribution system of NEP's applicable New England Affiliate(s) from the prior calendar year. Notwithstanding the foregoing, this provision will not apply to the Transmission Customer's Network Load taking service under the Specific Distribution Surcharge.

# ATTACHMENT OCC

# **Other Charges & Credits**

The following charges and credits may apply to a Transmission Customer or Network Customer, as applicable:

## I. Monthly Demand Charge:

Pursuant to Section 24.1 of this Schedule, the Network Customer will pay a monthly charge determined by multiplying its Load Ratio Share by the NEP's Monthly Local Network Transmission Expense as calculated in accordance with Exhibit 2 of this Attachment.

# II. Monthly Non-PTF Demand Charge:

Pursuant to Section 24.2 of this Schedule, the Network Customer will pay a monthly charge determined by multiplying its Non-PTF Load Ratio Share by the Monthly Non-PTF Transmission Expense calculated in accordance with Attachment RR to this Schedule.

# III. Transformer Surcharge:

Pursuant to Section 24.3 of this Schedule, the Transmission Customer or Network Customer will pay a monthly surcharge computed in accordance with Exhibit 1 of this Attachment.

This charge shall be multiplied by the Network Customer's Annual Peak Load, from the prior calendar year (coinciding with the calendar year used to calculate the Transformer Surcharge) in Exhibit 1 of this Attachment.

# **IV.** Meter Surcharge:

The monthly meter surcharge shall be computed in accordance with Exhibit 3 of this Attachment multiplied by the number of NEP meters necessary to measure the delivery of transmission service to the Transmission Customer or Network Customer.

# V. Power Factor Penalty:

Pursuant to Section 20.1 of this Schedule, a Network Customer or Transmission Customer will pay a Monthly Power Factor Penalty of \$0.62 multiplied by the customer's deficient kilovars.

# VI. Specific Distribution Surcharge:

The monthly Specific Distribution Surcharge shall be available to the following Network Customers Georgetown Municipal Light Dept. Ipswich Municipal Light Dept. Princeton Electric Light Dept. Hull Municipal Lighting Plant Granite State Electric Green Mountain Power Corp. Groveland Municipal Light Dept. Merrimac Municipal Light Dept. Rowley Municipal Light Dept.

The monthly Specific Distribution Surcharge shall equal \$.70 per KW month multiplied by the customer's Annual Peak Load from the prior calendar year.

# VII. Network Load Dispatch Surcharge:

The monthly Network Load Dispatch Surcharge shall equal the monthly Dispatching Expense, Account 561, as defined in Attachment RR, Section I.G. to this Schedule, less any revenue received by NEP from the ISO for load dispatching services, multiplied by the Network Customer's Load Ratio Share.

## VIII. [Reserved]

## IX. Network EPRI Credit:

The Network EPRI Credit shall be determined by multiplying the Monthly Transmission-Related EPRI Expenses by the customer's Non-PTF Network Load Ratio Share.

The Monthly Transmission-Related EPRI Expenses shall equal themonthly EPRI Expenses as recorded in Account 930.

# X. [Reserved]

## XI. Pre-1997 RNS Revenue Credit:

The Pre-1997 RNS Revenue Credit will apply in the subsequent month's billing for the period June 1, 2001 through March 1, 2008, unless the transitional arrangements for the period prior to March 1, 2008 are otherwise amended.

# **Transformer Surcharge**

I. No later than May 31 of each calendar year, the Transformer Surcharge will be calculated based on the prior calendar year's annual costs. The annual costs for Transformation Facilities service shall be the year-end balance of transmission plant investment in transformers included in Attachment RR, Section I. (A)(1)(a) to this Schedule multiplied by the Average Annual Carrying Charge.

II. The Average Annual Carrying Charge shall be the Annual Transmission Revenue Requirement as determined in Attachment RR, Sections I. (A) through I. (H) to this Schedule, divided by the year-end balance of total transmission plant investment included in Attachment RR, Section I. (A)(1)(a) to this Schedule.

III. To determine the monthly Transformer Surcharge rate, the annual costs for transformation service will be divided by the Annual Peak Loads of that portion of all Transmission Customers' or Network Customers' load receiving such transformation service under this Schedule, and further divided by 12.

# Monthly Local Network Transmission Expense

I. The Monthly Local Network Transmission Expense shall be the monthly balance of PTF Transmission Plant investment included in Attachment RR, Section I. (A)(1)(a) to this Schedule multiplied by the Monthly Carrying Charge, less any revenue received from the ISO associated with transmission-related services provided under the OATT.

II. The Monthly Carrying Charge shall be the Monthly Transmission Revenue Requirement as determined in accordance with Attachment RR to this Schedule, excluding any revenue credits associated with Transmission-related revenues from the ISO and revenues under Section 24.1 of this Schedule and as specified in Attachment RR, Section I.(G) and (J) to this Schedule, divided by the monthly balance of Transmission Plant determined in accordance with Attachment RR, Section I.(A)(1)(a) to this Schedule.

# **Meter Surcharge**

I. No later than May 31 of each calendar year, the Meter Surcharge will be calculated based on the prior calendar year's annual costs. The annual costs for metering service shall be the year-end balance of plant investment in meters included in Attachment RR, Section I. (A) (1) (a) to this Schedule multiplied by the Average Annual Carrying Charge.

II. The Average Annual Carrying Charge shall be the Annual Transmission Revenue Requirement as determined in Attachment RR, Sections I. (A) through I. (H) to this Schedule, divided by the year-end balance of transmission plant investment included in Attachment RR, Section I.(A) (1) (a) to this Schedule.

III. To determine the monthly Meter Surcharge rate, the annual costs for meter service will be divided by the number of NEP-Owned Billing Meters and further divided by twelve. The number of NEP-Owned billing meters shall equal the total number of meters owned by NEP and used for billing purposes under NEP's tariffs for wholesale all requirements and firm and non-firm transmission services.

# Pre-1997 RNS Revenue Credit

The respective Pre-1997 RNS Revenue Credit to Taunton Municipal Lighting Plant, Middleborough Gas and Electric Department and Pascoag Fire District will be equal to

[1- <u>EUA RNS Rate</u>]\* [customer's payment for RNS] Combined RNS Rate

Where:

EUA RNS Rate is former Montaup's 1999 Pre-1997 RNS rate as calculated under the NEPOOL Tariff.

Combined RNS Rate is equal to:

(A\*B) + (C\*D) / (B+D)

Where:

- A = EUA's 1999 Pre-1997 RNS Rate as calculated under the NEPOOL Tariff.
- B = EUA's 1999 12 CP Network Load (MW) as calculated under the NEPOOL Tariff.
- C = NEP's 1999 Pre-1997 RNS Rate as calculated under the NEPOOL Tariff.
- D = NEP's 1999 12 CP Network Load (MW) as calculated under the NEPOOL Tariff.

#### ATTACHMENT RR

#### **Transmission Revenue Requirements**

The Transmission Revenue Requirement will be determined based on the calculation shown below. In determining the rate for Local Network Service, the Revenue Requirement calculation as set forth below will be determined on a monthly basis.

I. The Transmission Revenue Requirement shall equal the sum of NEP's (A) Return and Associated Income Taxes, (B) Transmission Depreciation Expense, (C) Transmission-Related Amortization of Loss on Reacquired Debt, (D) Transmission-Related Amortization of Investment Tax Credits, (E) Transmission-Related Amortization of FAS 109, (F) Transmission-Related Municipal Tax Expense, (G) Transmission Operation and Maintenance Expense, (H) Transmission-Related Administrative and General Expense, (I) Transmission-Related Integrated Facilities Credit, (J) Transmission Revenue Credit, (K) Distribution-Related Integrated Facilities Credit, and plus (L) Billing Adjustments; plus (M) Reactive Power Expense; plus (N) Bad Debt Expense.

A. Return and Associated Income Taxes shall equal the product of the Transmission Investment Base and the Cost of Capital Rate.

#### 1. Transmission Investment Base

The Transmission Investment Base will be (a) Transmission Plant, plus (b) Transmission-Related General Plant, plus (c) Transmission Plant Held for Future Use, plus (d) Transmission-Related Construction Work in Progress, less (e) Transmission-Related Depreciation Reserve, less (f) Transmission-Related Accumulated Deferred Taxes, plus (g) Transmission-Related Loss on Reacquired Debt, plus (h) Other Regulatory Assets, less (i) Allowance for Funds Used During Construction (AFUDC) Regulatory Liability, plus (j) Transmission Prepayments, plus (k) Transmission Materials and Supplies, plus (l) Transmission-Related Cash Working Capital.

(a) **Transmission Plant** will equal the balance of NEP's Total Investment in Transmission Plant, plus NEP's Total Investment in Distribution Plant excluding NEP's capital leases in the Hydro-Quebec DC facilities (HQ leases). NEP's investment in PTF transmission plant and stepdown transformers beyond NEP's Point of Delivery, including associated equipment, shall be included but stated separately. NEP's investment in wholesale metering, including associated equipment, shall also be included but stated separately.

(b) **Transmission-Related General Plant** shall equal NEP's balance of investment in General Plant excluding General Plant related to NEP's generation facilities as specifically identified in NEP's CTC.

(c) **Transmission Plant Held for Future Use** shall equal the balance of investment in FERC Account 105.

(d) Transmission-Related Construction Work In Progress shall equal the portion of NEP's investment in Transmission-related projects as recorded in FERC Account 107 consistent with Commission orders.

(e) **Transmission-Related Depreciation Reserve** shall equal the balance of Total Depreciation Reserve, excluding any generation-related depreciation reserve associated with assets identified in NEP's CTC.

(f) Transmission-Related Accumulated Deferred Taxes shall equal NEP's balance of Total Accumulated Deferred Income Taxes, excluding any Accumulated Deferred Taxes associated with non-utility assets or generation facilities as identified in the CTC.

(g) **Transmission-Related Loss on Reacquired Debt** shall equal NEP's balance of Total Loss on Reacquired Debt excluding losses associated with NEP Generation as specifically identified in the CTC, or any generation-related losses associated with pollution control bonds.

(h) Other Regulatory Assets shall equal NEP's balance of FAS 109 excluding FAS 109 balances associated with NEP Generation as specifically identified in the CTC.

(i) **AFUDC Regulatory Liability** shall equal the unamortized balance of the capitalized AFUDC booked on NEP's Transmission-related projects as recorded in FERC Account 254 consistent with Commission orders.

(j) **Transmission Prepayments** shall equal NEP's balance of prepayments excluding any prepayments related to NEP's ongoing generation-related activities.

(k) **Transmission Materials and Supplies** shall equal NEP's balance of Transmission-related Materials and Supplies.

Transmission-Related Cash Working Capital shall be a 12.5% allowance (45 days/360 days) of Transmission Operation and Maintenance Expense and Transmission-Related Administrative and General Expense.

# 2. Cost of Capital Rate

The Cost of Capital Rate will equal (a) NEP's Weighted Cost of Capital, plus (b) the Yankee Adjustments plus (c) Federal Income Tax plus (d) State Income Tax.

(a) The Weighted Cost of Capital will be calculated based upon the capital structure at the end of each month and will equal the sum of:

(i) **the long-term debt component**, which equals the product of the actual weighted average embedded cost to maturity of NEP's long-term debt excluding any debt associated with pollution control bonds then outstanding and the ratio that long-term debt is to NEP's total capital less the end-of-year investment in Yankee Units.

(ii) the preferred stock component, which equals the product of the actual weighted average embedded cost to maturity of NEP's preferred stock then outstanding and the ratio that preferred stock is to NEP's total capital less the end-of-year investment in Yankee Units.

(iii) the return on equity component (ROE), which equals the product of the allowed based ROE of 10.57% and the ratio that common equity is to NEP's total capital less the end-of-year investment in Yankee Units.

For purposes of implementing the exclusion of the FERC-approved adders from Section J. below, the following ROEs will be applied to the corresponding investment:

post-2003 to pre-2009 PTF transmission plant	11.74%%
investment in Regional System Plan approved by	
ISO-NE	

remaining PTF transmission plant investment	11.07%
remaining transmission plant investment	10.57%

plus any ROE incentive approved by the FERC under Order No. 679 for other plant investments.<sup>8</sup>

(b) The Yankee Adjustment shall be calculated in accordance with FERC Opinion Nos. 49 and 49(a) issued in NEP's R-10 rate case and FERC Opinion No. 158 issued in NEP's W-3 rate case.

(c) Federal Income Tax shall equal

Where FT is the Federal Income Tax Rate and A is the sum of the preferred stock component and the return on equity component, as determined in Section (I)(A)(2)(a)(ii), and Section (I)(A)(2)(a)(iii) above.

# (d) State Income Tax shall equal (A + Federal Income Tax) x ST 1 - ST

where ST is the State Income Tax Rate, A is the sum of the preferred stock component and the return on equity component determined in Section (I)(A)(2)(a)(ii) and Section (I)(A)(2)(a)(iii) above, and Federal Income Tax is the rate determined in Section (I)(A)(2)(c) above.

**B.** Transmission Depreciation Expense shall equal the Depreciation Expense associated with the Transmission Plant, Transmission-Related General Plant and Transmission Plant Held for Future Use as described in Sections I.A.(a)(1), (b) and (c), less the amortization of AFUDC regulatory credit as recorded in FERC Account 407.4.

**C. Transmission-Related Amortization of Loss on Reacquired Debt** shall equal NEP's Amortization of the balance on Loss on Reacquired Debt as defined in Section I.A.(1)(f).

<sup>&</sup>lt;sup>8</sup> FERC Form-730 contains a list of transmission projects for which FERC has granted incentives under Order No. 679

**D. Transmission-Related Amortization of Investment Tax Credits** shall equal NEP's Amortization of Investment Tax Credits, excluding any ITC credits specifically identified as generation-related in NEP's CTC.

**E.** Transmission-Related Amortization of FAS 109 shall equal the Amortization of NEP's Balance of FAS 109, as identified in Section I.A.(1)(q) over a ten-year period beginning on the Divestiture Date of NEP's Generating Assets as defined in the CTC.

**F. Transmission-Related Municipal Tax Expense** shall equal NEP's total municipal tax expense excluding specifically identified generation-related municipal taxes or payments in lieu of such generation-related municipal taxes.

**G. Transmission Operation and Maintenance Expense** shall equal all expenses charged to FERC Account Numbers 560 through 598. Account Number 565, Transmission by Others, shall only include those expenses in support of facilities that are integrated with NEP's Transmission System or other transmission systems. Transmission Operation and Maintenance Expense shall include any expenses associated with transmission-related administrative services provided by the ISO and the expenses associated with providing Transmission Customers with the Pre-1997 Revenue Credit as described in Attachment OCC to this Schedule.

**H. Transmission-Related Administrative and General Expenses** shall equal NEP's Administrative and General Expenses, less Production-related Administrative and General Expense associated with joint-owned production units, plus Payroll Taxes,

I. Transmission-Related Integrated Facilities Credit shall equal NEP's transmission payments to its New England Affiliates for use of the integrated transmission facilities of those New England Affiliates.

**J. Transmission Revenue Credit** shall equal NEP's total transmission revenue, FERC Account Number 456, transmission-related sub-accounts of 447, and those revenues received from the ISO associated with the provision of transmission services under the OATT excluding the revenue received under the terms set forth in Section 24.2 of this Schedule, excluding any revenue received for the Hydro-Quebec DC facilities, excluding any revenue directly credited to Network Customers under Section 24.11 of this Schedule, excluding distribution revenues associated with expenses that have been excluded from NEP's Transmission Revenue Requirement, and excluding any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment in accordance with Section II.A.2.(a)(iii) of Attachment F under the OATT . To the extent that NEP's transmission-related revenue under FERC Electric Tariff No. 1 is not reflected in the above-reference accounts on or after July 9, 1996, such revenue will be imputed under the formula set forth in the OATT and included in the Transmission Revenue Credit in accordance with the above specifications. Any Transmission Revenue Credit related to Section 24.1 of this Schedule shall be stated separately. Any revenue from the ISO associated with the provision of transmission service under the OATT, shall also be included but stated separately.

**K. Distribution-Related Integrated Facilities Credit** shall be equal to the credit applied to the purchased power bill of Massachusetts Electric Company under NEP's Tariff No. 1 for use of its distribution facilities used in support of wholesale transactions.

L. Billing Adjustments shall be plus or minus any billing adjustments from the prior transmission billing periods, including ISO adjustments. Billing adjustments shall include, but not be limited to, adjustments due to metering errors, corrections to any value included in this Attachment RR, or the Load Ratio Share. Such adjustments may be corrected prospectively. However, if the error is substantial, or substantially affects an individual Network or Transmission Customer, NEP reserves the right to credit and rebill customers for each affected billing month in which the error occurred.

**M. Reactive Power Expense** shall be set at zero as of the Second Effective Date, as defined in the NEPOOL Agreement.

**N. Bad Debt Expense** shall be the bad debt expense as reported in Account 904 related to transmission billing.

**O. Miscellaneous Provisions** In the event that the FERC accounts listed above are renumbered, renamed, or otherwise modified, the above sections shall be deemed amended to incorporate such renumbered, renamed, modified or additional accounts.

#### **EXHIBIT 1**

#### **Distribution Cost of Service**

Pursuant to Attachment DAF to this Schedule, the Distribution Cost of Service shall be calculated as follows for the applicable New England Affiliate:

I. The Primary Distribution System Cost of Service shall equal the sum of (A) Return and Associated Income Taxes, (B) Primary Depreciation Expense, (C) Primary Related Amortization of Loss on Reacquired Debt, (D) Primary Related Amortization of Investment Tax Credits, (E) Primary Related Municipal Tax Expense, (F) Primary Operation and Maintenance Expense, (G) Primary Related Administrative and General Expense, and (H) Primary Revenue Credit.

A. Return and Associated Income Taxes shall equal the product of the Primary Investment Base and the Cost of Capital Rate.

(1) **Primary Investment Base** will be (a) Total Primary Distribution Plant, plus (b) Primary Related General Plant, plus (c) Primary Plant Held for Future Use, less (d) Primary Depreciation Reserve, less (e) Primary Related Accumulated Deferred Income Taxes, plus (f) Primary Related Loss on Reacquired Debt, plus (g) Other Regulatory Assets, plus (h) Primary Materials and Supplies, plus (i) Primary Related Prepayments, plus (j) Primary Related Cash Working Capital.

(a) Total Primary Distribution Plant shall equal the New England Affiliate's Plant Accounts 360 to 373 multiplied by allocation factors from the Distribution Engineering Study.

(b) Primary Related General Plant shall equal the New England Affiliate's Investment in General Plant, multiplied by the Primary Wages & Salaries Allocation Factor. The Primary Wages & Salaries Allocation Factor shall equal the ratio of Total Distribution Wages & Salaries to the Total New England Affiliate's Wages & Salaries excluding A&G, multiplied by the ratio of Primary Distribution related O&M to Total Distribution O&M (Primary O&M Allocation Factor).

(c) Primary Plant Held for Future Use shall equal the New England Affiliate's Account
 105, multiplied by the Primary Land Allocation Factor from the Distribution Engineering Study.

(d) **Primary Depreciation Reserve** shall equal the New England Affiliate's Depreciation Reserve multiplied by the ratio of Primary Depreciable Distribution Plant to Total Depreciable Distribution Plant (Primary Depreciable Plant Allocation Factor), plus an allocation of average General Plant Depreciation Reserve calculated by multiplying beginning and end of year General Plant Depreciation Reserve by the Primary Wages and Salaries Allocation Factor described in Section (I)(A)(1)(b) above.

(e) **Primary Related Accumulated Deferred Income Taxes** shall equal the Total Accumulated Deferred Income Taxes, multiplied by the ratio of average Primary Plant in Service to average Total Plant in Service excluding General Plant (Primary Plant Allocation Factor).

(f) **Primary Related Loss on Reacquired Debt** shall equal the Total Loss on Reacquired Debt, multiplied by the Primary Plant Allocation Factor described in Section (I)(A)(1)(e) above.

(g) Other Regulatory Assets shall equal the New England Affiliate's balance of FAS 106, multiplied by the Primary Wages and Salaries Allocator described in Section (I)(A)(1)(b), plus the New England Affiliate's balance of FAS 109, multiplied by the Primary Plant Allocation Factor described in Section (I)(A)(1)(c) above.

(h) **Primary Materials and Supplies** shall equal the New England Affiliate's Distribution Plant Materials and Supplies, multiplied by the Primary O&M Allocation Factor as described in Section (I)(A)(1)(b) above.

(i) **Primary Related Prepayments** shall equal the New England Affiliate's Prepayments, multiplied by the Primary Wages and Salaries Allocator described in Section (I)(A)(1)(b) above.

(j) Primary Related Cash Working Capital shall be a 45 day allowance or 12.5% of Primary Operation and Maintenance Expense and Primary Related Administrative and General Expense.

(2) **Cost of Capital Rate** will equal (a) the New England Affiliate's Weighted Cost of Capital, plus (b) Federal Income Tax, plus (c) State Income Tax.

(a) The Weighted Cost of Capital will be calculated based upon the capital structure at the end of each year and will equal the sum of:

i) **the long-term debt component**, which equals the product of the actual dollar weighted average embedded cost to maturity of the New England Affiliate's long-term debt then outstanding and the ratio that long-term debt is to the New England Affiliate's total capital.

**ii**) **the preferred stock component**, which equals the product of the actual weighted average embedded cost to maturity of the New England Affiliate's preferred stock then outstanding and the ratio that preferred stock is to the New England Affiliate's total capital.

**iii) the return on equity component**, which equals the product of 10.57% and the ratio that common equity is to the New England Affiliate's total capital.

# (b) Federal Income Tax shall equal

where FT is the Federal Income Tax Rate and A the sum of the preferred stock component and the return on equity component determined in Section (I)(A)(2)(a)(ii) and Section (I)(A)(2)(a)(iii) above.

# (c) State Income Tax shall equal

where ST is the State Income Tax Rate, A is the sum of the preferred stock component and the return on equity component determined in Section (I)(A)(2)(a)(ii) and Section (I)(A)(2)(a)(iii) above, and Federal Income Tax is Federal Income Tax as determined in Section (I)(A)(2)(b) above.

**B. Primary Depreciation Expense** shall equal Depreciation Expense for Distribution Plant, multiplied by the Primary Depreciable Plant Allocation Factor as described in Section (I)(A)(1)(d) above,

plus an allocation of General Plant Depreciation Expense calculated by multiplying General Plant Depreciation Expense by the Primary Wages and Salaries Allocation Factor described in Section (I)(A)(1)(b) above.

**C. Primary Related Amortization of Loss on Reacquired Debt** shall equal the New England Affiliate's Amortization of Loss on Reacquired Debt, multiplied by the Primary Plant Allocation Factor described in Section (I)(A)(1)(e) above.

**D. Primary Related Amortization of Investment Tax Credits** shall equal the New England Affiliate's Amortization of Investment Tax Credits, multiplied by the Primary Plant Allocation Factor described in Section (I)(A)(1)(e) above.

**E. Primary Related Municipal Tax Expense** shall equal a pro-rata share of the New England Affiliate's total municipal taxes allocated by the Primary Plant Allocation Factor described in Section (I)(A)(1)(e) above.

F. Primary Operation and Maintenance Expense shall the sum of all expenses charged to FERC
 Account Numbers 580 through 598, allocated to Primary as indicated by the Distribution Engineering
 Study.

**G. Primary Related Administrative and General Expenses** shall equal the New England Affiliate's Administrative and General Expenses, plus Payroll Taxes, multiplied by the Primary Wages & Salaries Allocation Factor described in Section (I)(A)(1)(b) above.

# ATTACHMENT L

## **Creditworthiness Policy**

#### 1. Introduction & Applicability

This policy establishes creditworthiness standards for transmission service and/or interconnection service customers ("Customers") entering into new, amended or assigned service agreements with NEP under the ISO-NE OATT. The following describes NEP's qualitative and quantitative credit review procedures and the types of security that are acceptable to NEP to protect against the risk of default.

## 2. Information Requirements

For purposes of determining the ability of a Customer to meet its obligations, NEP may require the Customer to submit financial information for the credit review, including credit ratings, credit reports and audited financial statements. In addition, the following factors may be considered in evaluation of the Customer's creditworthiness: applicant's history; nature of organization and operating environment; management; contractual obligations; governance, financial / accounting policies, risk management and credit policies; market risk including price exposures, credit exposures, and operational exposures; and event risk. All information required under this Attachment should be forwarded to the NEP account manager as specified on the NEP OASIS website.

#### **3.** Creditworthiness Evaluation

NEP will evaluate the creditworthiness of Customers entering into new or amended transmission or interconnection service agreements with NEP in order to assess a Customer's credit risk relative to the exposure or "Total Outstanding Obligation" as defined in Section 3.1 below, created by the transaction or transactions that NEP has with the Customer.

#### 3.1 Total Outstanding Obligation

The Customer's Total Outstanding Obligation to NEP will be the sum total of the following components:

3.1.1 If the Customer is making payments to NEP for ongoing expenses (including, but not limited to, O&M expenses related to interconnections or other monthly charges such as monthly transmission charges under Schedule 21-NEP of the ISO-NE OATT) the Customer will be required to provide security pursuant to Section 3.2 below, for four months' worth of the Customer's average payment obligation for such charges

3.1.2 Whenever, in accordance with the provisions of the ISO-NE OATT, a Customer pays a Contribution in Aid of Construction ("CIAC") or transfers ownership of facilities to NEP for transmission or interconnection facilities that are to be constructed on behalf of a Customer at the Customer's sole expense, and NEP determines in good faith that the receipt of CIAC payments or property from the Customer are non-taxable, NEP will require a form of security from the Customer pursuant to Section 3.2 below for the amount of the potential tax liability to NEP that would occur if such facilities were deemed taxable.

3.1.3 Whenever, in accordance with the provisions of the ISO-NE OATT, a Customer pays a formula rate over time for return of and on the cost of capital incurred by NEP on behalf of a Customer at the Customer's sole expense, the Customer will be required to provide security pursuant to Section 3.2 below, for the unamortized balance of plant in service reserved for the sole use of the Customer.

3.2 Creditworthiness Requirements

A Customer will be considered creditworthy upon satisfying at least one of the following conditions, or a combination of those conditions, at the time that the Customer enters into a transmission or interconnection service agreement and for so long as the Customer maintains satisfaction of at least one of these conditions for any outstanding obligations thereunder:

3.2.1 The Customer maintains a minimum credit rating of BBB from Standard & Poor's Longterm Issuer Credit Rating or Baa2 from Moody's Investors Service Long-term Issuer Credit Rating, so long as the Customer's Total Outstanding Obligation plus any other unsecured obligation with NEP and its Affiliates does not exceed the Credit Limits discussed in Section 5 below.<sup>9</sup> If unrated, the Customer's financial statements will be reviewed to determine an equivalent rating based on the Customer's unsecured credit limits and/or financial statements.

3.2.2 The Customer provides and maintains in effect during the term of and until full and final payment and performance of the service agreement an unconditional and irrevocable Letter of Credit for the Total Outstanding Obligation in the form and substance and issued by a bank acceptable to NEP. A draft, acceptable form letter of credit is posted on OASIS. Any such bank must satisfy the creditworthiness criteria described in 3.2.1 above.

3.2.3 The Customer's parent or an Affiliate company satisfies the creditworthiness criteria described in 3.2.1 above and, subject to the Credit Limits stated in Section 4 below, such company submits to NEP and maintains in effect a Letter of Guaranty acceptable to NEP as to amount, form and substance for the term of and until full and final payment and performance of the service agreement.

3.2.4 The Customer is a municipal that is a member of the Massachusetts Municipal Wholesale Electric Cooperative (MMWEC). In such instances, MMWEC must meet the criteria set out in 3.2.1 or 3.2.2 above and provide to NEP a Letter of Guaranty that MMWEC will be unconditionally responsible for all financial obligations associated with the Customer's receipt of transmission or interconnection service from NEP.

3.2.5 The Customer makes an advance payment to NEP in immediately available funds for the Total Outstanding Obligation.

If, at any time, the credit rating of the Customer, Customer's bank, or Customer's parent or Affiliate providing the Guaranty as set out in 3.2.1, 3.2.2 or 3.2.3 above falls below investment grade (BBB- from Standard and Poor's and or Baa3 from Moody's), the Customer will be required to provide (i) notification to NEP within 10 days and, (ii) another form of security acceptable to NEP, as described in this Section 3.2, within 30 days.

## 4. Customer Costs Requiring Prepayment

<sup>&</sup>lt;sup>9</sup> When NEP reviews a Customer's rating from two or more rating agencies and a split rating is present, the lower debt rating will apply. In the event that the Customer only has a rating from either Standard & Poor's or Moody's Investors Service, a rating from Duff & Phelps or Fitch and Weiss may also be used with acceptable ratings equivalent to those from either Standard and Poor's or Moody's Investors Service.

Whenever, in accordance with the provisions of the ISO-NE OATT, a Customer pays a CIAC for transmission or interconnection facilities to be constructed by NEP on behalf of a Customer at the Customer's sole expense, the Customer will have the option to (i) prepay the CIAC in immediately available funds to NEP, or (ii) make periodic CIAC progress payments, as defined in the Customer's service agreement, to prepay in increments capital costs scheduled to be incurred by NEP. If NEP determines in good faith that such payments or property transfers made by the Customer should be reported as income subject to taxation, the Customer shall also prepay all costs associated with the cost consequences of the current tax liability imposed on NEP by those facilities (the "Tax Gross- up").

#### 5. Credit Limits

NEP reserves the right to limit the total amount of unsecured credit extended to a Customer under 3.2.1 and 3.2.3 above such that the sum of all unsecured credit that such Customer has with NEP and its Affiliates, including the Total Outstanding Obligation, shall not exceed the Credit Limits defined below. Such limitations are based on an assessment of the Customer's or its Guarantor's credit rating and the net worth of the Customer's or its Guarantor's assets.

	Unsecured Credit Limit as Percent
Standard and Poor's (or	of Customer's or Guarantor's
Equivalent) Rating	Tangible Net Worth
A and above	1.0%
A-	0.5%
BBB+	0.2%
BBB	0.1%
BBB-	0.0%

#### 6. Contesting Creditworthiness Determinations

A Customer may contest NEP's determination of creditworthiness by submitting a written request to NEP for re-evaluation within 20 calendar days of being notified of the creditworthiness determination. Such request should provide information supporting the basis for a request to re-evaluate the Customer's creditworthiness. NEP will review and respond to the request within 20 calendar days.

## 7. Process for Changing Credit Requirements

In the event that NEP plans to revise its requirements for credit levels or collateral requirements as detailed in this Attachment L, NEP shall submit such changes in a filing to the Federal Energy Regulatory Commission ("Commission") under Section 205 of the Federal Power Act. NEP shall follow the notification requirements pursuant to Section 3.04(a) of the Transmission Operating Agreement and reflected herein.

# 7.1 General Notification Process

7.1.1 NEP shall provide written notification to ISO-NE and stakeholders of any filing described above, at least 30 days in advance of such filing. Filing notifications shall include a detailed description of the filing, including a redlined document containing revised change(s) to the Creditworthiness Policy. NEP shall consult with interested stakeholders upon request.

7.1.2 Following Commission acceptance of such filing and upon the effective date, NEP shall revise its Attachment L Creditworthiness Policy and an updated version of Schedule 21-NEP shall be posted on the ISO-NE website.

# 7.2 Customer Responsibility

7.2.1 Upon the effective date of any revision to these creditworthiness requirements or upon the date of the Commission's order accepting such revisions, whichever is later, the Customer shall have 30 days to forward updated financial information to NEP and indicate whether the revised creditworthiness requirements impair the Customer's ability to comply with the revised requirements. In such cases, the Customer must take all reasonable steps to comply with the revised requirements of the Creditworthiness Policy within 45 days of the effective date of the change.

## 7.3 Notification for Active Customers

7.3.1 Active Customers are defined as any current Customer that has a Service Agreement currently in effect and has posted an irrevocable letter of credit, letter of guaranty or prepayment in accordance with Sections 3.2.2, 3.2.3, 3.2.4, or 3.2.5, above.

7.3.2 All Active Customers will be served with copies of any filing submitted to the Commission to modify the NEP's creditworthiness requirements.

# 8. Suspension of Service

NEP may, immediately suspend service (with notification to Commission) to a customer, and may initiate proceedings with Commission to terminate service, if the customer does not meet the terms described in this Attachment. A customer is not obligated to pay for Transmission Service that is not provided as a result of a suspension of service.

## **ATTACHMENT S-1**

#### Local Scheduling, System Control and Dispatch Service

This service is required to schedule the movement of power through, out of, within, or into a Control Area over Non-PTF. The Transmission Customer or Network Customer must purchase this service from NEP. The charges for Scheduling, System Control and Dispatch Service shall be based on the Local Network Load Dispatch Surcharge set forth in Attachment OCC to this Schedule. To the extent the ISO performs this service for NEP, charges to the Transmission Customer are to reflect only a pass-through of the costs charged to NEP by the ISO.

Northeast Utilities Companies SCHEDULE 21-NU

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# SCHEDULE 21-NU NORTHEAST UTILITIES COMPANIES LOCAL SERVICE SCHEDULE

#### I. COMMON SERVICE PROVISIONS

#### 1 Definitions

Capitalized terms not defined herein shall have the meanings given them in the Tariff.

#### 1.1 Annual Transmission Costs

The total annual cost of the Transmission System for purposes of Local Network Service shall be the amount specified in Attachments NU-H and NU-I, until amended by the Companies or modified by the Commission.

#### 1.2 Annual True Up

The reconciliation to actual costs and actual loads of the estimated costs and loads costs used for billing purposes under Section 3.0 of this Local Service Schedule for any Service Year.

#### 1.3 Category A Load Ratio Share

Ratio of a Transmission Customer's Category A Network Load to the NU Companies' total load computed in accordance with Sections 16.5 and 16.6 under Part III of this Local Service Schedule and calculated on a rolling twelve month basis. Also referred to as "Load Ratio Share".

#### 1.4 Category B Load Ratio Share

Ratio of a Transmission Customer's Monthly Category B Load in the Designated State or Area for a Localized Facility to the Monthly Transmission System Category B Load for such Designated State or Area, calculated in accordance with Sections 16.5 and 16.6, and calculated on a rolling twelve month basis.

#### 1.5 Designated Agent

See Tariff. Also, the Designated Agent of the NU Companies is the Northeast Utilities Service Company ("NUSCO") which is a subsidiary of Northeast Utilities ("NU").

#### 1.6 Designated State or Area

The state or area to which the Commission allocates the costs of a Localized Facility identified in Section 16.3.

#### 1.7 Interest

The amount computed in accordance with the Commission's regulations at 18 CFR §35.19a (a)(2)(iii). Interest on deposits and shall be calculated from the day the deposit check is credited to the NU Companies' account.

#### 1.8 Interruption

A reduction in non-firm transmission service due to economic reasons pursuant to Schedule 21.

#### 1.9 Localized Facility

Facility or costs that the New England System Operator determines should not be included in Attachment F of the ISO OATT.

#### 1.10 Network Load

The load that a Network Customer designates for Local Network Service. The Network Customer's Network Load shall include all load served by the output of any Network Resources designated by the Network Customer. A Network Customer may elect to designate less than its total load as Network Load but may not designate only part of the load at a discrete Point of Delivery. Where an Eligible Customer has elected not to designate a particular load at discrete points of delivery as Network Load, the Eligible Customer is responsible for making separate arrangements for any Point-To-Point Transmission Service that may be necessary for such nondesignated load.

#### 1.11 Network Operating Agreement

An executed agreement that contains the terms and conditions under which the Network Customer shall operate its facilities and the technical and operational matters associated with the implementation of Local Network Service under Part III of this Local Service Schedule.

#### 1.12 Network Upgrades

Modifications or additions to transmission-related facilities that are integrated with and support the NU Companies' overall Transmission System for the general benefit of all users of such Transmission System.

#### 1.13 New England System Operator

ISO New England Inc. ("ISO") or its successor entity.

#### 1.14 **Party(ies)**

The NU Companies and the Transmission Customer receiving service under the Tariff.

#### 1.15 Short-Term Firm Point-To-Point Transmission Service

Firm Point-To-Point Transmission Service with a term of less than one year.

#### 1.16 Service Agreement

Service Agreement is a transmission service agreement for transmission service provided under this Local Service Schedule or Localized Costs Responsibility Agreement ("LCRA").

### 1.17 Service Year

The calendar year in which the Transmission Customer is receiving service under this Local Service Schedule.

#### 1.18 NU Companies

The Northeast Utilities Companies (or "NU Companies") which consists of The Connecticut Light and Power Company, Western Massachusetts Electric Company, and Public Service Company of New Hampshire, each an operating company of Northeast Utilities ("NU").

#### 1.19 NU Companies' Monthly Transmission System Peak

The maximum firm usage of the NU Companies Transmission System in a calendar month (this does not include load of the NU Companies' customers exclusively connected to PTF).

#### 1.20 NU Companies' Transmission System

The PTF and non-PTF facilities owned, controlled or operated by the NU Companies that are used to provide transmission service under this Local Service Schedule. This includes PTF facilities whose costs are not included in the regional rate.

#### 1.21 Transmission Service

Point-To-Point Transmission Service provided under this Local Service Schedule on a firm and non-firm basis.

#### 2. Ancillary Services

Ancillary Services are needed with transmission service to maintain reliability within and among the Control Areas affected by the transmission service. The NU Companies are required to provide (or offer to arrange with the New England System Operator as discussed below), and the Transmission Customer is required to purchase, the following Ancillary Service (i) Scheduling, System Control and Dispatch.

The Transmission Customer serving load within the NU Companies' Control Area shall also obtain the following ancillary services: (i) Reactive Supply and Voltage Control from Generation Sources, (ii) Regulation and Frequency Response, (iii) Energy Imbalance, (iv) Operating Reserve - Spinning, and (v) Operating Reserve - Supplemental.

The Transmission Customer serving load within the NU Companies' Control Area is required to acquire the appropriate Ancillary Services, whether from the New England System Operator, NU Companies, another party, or by self-supply.

The Transmission Customer may not decline the NU Companies' or the New England System Operator's offer of appropriate Ancillary Services unless it demonstrates that it has acquired the Ancillary Services from another source. The Transmission Customer must list in its Application which Ancillary Services it will purchase from the NU Companies.

If the NU Companies are unable to provide Scheduling, System Control and Dispatch, the NU Companies can fulfill their obligation to provide this Ancillary Service by acting as the Transmission Customer's agent to secure this Ancillary Service from the New England System Operator. The Transmission Customer may elect to (i) have the NU Companies act as its agent to obtain Scheduling, System Control and Dispatch, (ii) secure Scheduling, System Control and Dispatch directly from the New England System Operator, or from a third party.

The NU Companies or New England System Operator shall specify the rate treatment and all related terms and conditions in the event of an unauthorized use of Ancillary Services by the Transmission Customer.

The specific Ancillary Services, prices and/or compensation methods are described on the Schedule that is attached to and made a part of the Tariff. Three principal requirements apply to discounts for Ancillary Services provided by the NU Companies in conjunction with their provision of transmission service as follows: (1) any offer of a discount made by the NU Companies must be announced to all Eligible Customers solely by posting on the OASIS, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on the OASIS, and (3) once a discount is negotiated, details must be immediately posted on the OASIS. A discount agreed upon for an Ancillary Service must be offered for the same period to all Eligible Customers on the NU Companies' system.

#### 3. Billing and Payment

#### 3.1 Billing Procedure

Within a reasonable time after the first day of each month, the NU Companies shall submit an invoice to the Transmission Customer for the charges for all services furnished or costs allocated under the Tariff during the preceding month.

The invoice shall be paid by the Transmission Customer within twenty five (25) days of the date of the invoice. All payments shall be made in immediately available funds payable to the NU Companies, or by wire transfer to a bank named by the NU Companies. Billing hereunder shall be based on cost estimates made by the NU Companies subject to Annual True-up when actual costs for the Service Year are known. Such Annual True-up shall occur no later than six (6) months after the close of the Service Year to which the Annual True-up relates. The Annual True-up will include interest calculated in accordance with Section 35.19a of the Commission's regulations. If the in service date of a forecasted capital addition changes, and the impact of such change on the NU Companies' annual revenue requirement is ten percent or more, the NU Companies will adjust current billing to the Transmission Customer as appropriate.

#### 3.2 Interest on Unpaid Balances

Interest on any unpaid amounts (including amounts placed in escrow) shall be calculated in accordance with the methodology specified for interest on refunds in the Commission's regulations at 18 C.F.R. § 35.19a(a)(2)(iii). Interest on delinquent amounts shall be calculated from the due date of the bill to the date of payment. When payments are made by mail, bills shall be considered as having been paid on the date of receipt by the NU Companies.

#### **3.3** Customer Default

In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to the NU Companies on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after the NU Companies notifies the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, the NU Companies may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission so approves any such request. In the event of a billing dispute between the NU Companies and the Transmission Customer, the NU Companies will continue to provide service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then the NU Companies may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy. Neither Party shall have the right to challenge any monthly bill or to bring any court or administrative action of any kind questioning the propriety of any bill after a period of twenty four (24) months from the date the bill was due; provided, however, that in the case of a bill based on estimates, such twenty-four month period shall run from the due date of the final adjusted bill.

#### 3.4 Transmission Customer Right to Audit

The NU Companies shall keep complete and accurate accounts and records with respect to their performance under this Local Service Schedule and shall maintain such data for a period of at least two (2) years after final billing for audit by a Transmission Customer. The Transmission Customer shall provide thirty (30) days' written notice to the NU Companies to request an audit of all such accounts and records relevant to service provided to the Transmission Customer for a specific time period. The Transmission Customer shall have the right, during normal business hours and at its own expense, to examine, inspect and make copies of all such accounts and records relevant to service provided to the Transmission Customer at such offices where such accounts and records are maintained, insofar as may be necessary for the purpose of ascertaining the reasonableness and accuracy of all relevant data, estimates or statements of charges submitted hereunder to the Transmission Customer. The records made available to a Transmission Customer for auditing purposes hereunder shall not include information pertaining to the loads of or charges to an individual customer other than the Transmission Customer; unless the Transmission Customer requests that the Commission order that such information be made

available to the Transmission Customer and the Commission so orders. Nothing in this section shall be interpreted as limiting the Transmission Customer's access to system-wide load or charge data.

#### 3.5 Regulatory Oversight of Formula Rate

The NU Companies will submit to the Connecticut Public Utilities Regulatory Authority, the Massachusetts Department of Public Utilities and the New Hampshire Public Utilities Commission ("State Commissions") the following information:

(a) A copy of the New England Power Pool's ("NEPOOL's") or any successor's annual informational filing at FERC supporting the total transmission revenue requirement for New England, which contains information submitted by the NU Companies supporting their total transmission revenue requirement;

(b) The NU Companies' total transmission revenue requirement as calculated in AttachmentsH & I under Schedule 21-NU;

(c) A copy of the NU Companies' applications under Restated NEPOOL Agreement Section 15.5, concerning the installation of or material changes to transmission facilities (or any successor approval process), and Section 18.4, concerning plans for additions, retirements, or changes in the capacity of transmission facilities (including descriptions of facilities and cost estimates);

(d) A copy of ISO New England's or any successor's Regional Transmission System Plan,
 which contains all identified improvements to the New England power system approved by the
 ISO New England or any successor's board;

(e) A copy of NU's filing to each New England state's siting council for those projects to be recovered through the RNS or LNS rates, such copy to be filed with the State Commissions when the estimated costs of the projects in question are proposed to be included in the RNS and LNS rates;

(f) At the same time that new estimated rates are implemented, the estimated cost for each capital addition (on a project-by-project basis) the cost of which is to be included in the estimated rates; and, for each such capital addition with an estimated cost of \$20 million or greater, the NU

Companies will provide the following to the extent available: (i) a breakdown of the projected cost into the following categories: labor (broken down into planning, engineering, construction, and other), outside services (broken down into planning, engineering, construction and other), materials (broken down into station equipment, towers and poles, overhead conductor, underground conduit and conductor, and other), land (broken down into fee ownership, easement, and other), and other (if applicable) and (ii) a non-binding estimate of the total project costs by calendar quarter;

(g) Within 60 days after the true-up is rendered for a year, the actual cost for each capital addition that was placed in service during that year; and, for each such capital addition with an actual or estimated cost of \$20 million or greater, the NU Companies will provide the following to the extent available: (i) a breakdown of the actual cost into the following categories: labor (broken down into planning, engineering, construction, and other), outside services (broken down into planning, engineering, constructor, underground conduit and conductor, and other), land (broken down into fee ownership, easement, and other), and other (if applicable) and (ii) the actual total project costs by calendar quarter.

#### 4. **Regulatory Filings**

Nothing contained in the Tariff or any Service Agreement shall be construed as affecting in any way the right of the NU Companies to unilaterally make application to the Commission for a change in rates, terms and conditions, charges, classification of service, Service Agreement, rule or regulation under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder.

Nothing contained in the Tariff or any Service Agreement shall be construed as affecting in any way the ability of any Party receiving service under the Tariff to exercise its rights under the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder.

5. Creditworthiness: See Attachment NU-L to this Schedule 21-NU.

#### 6. Rights Under The Federal Power Act

Nothing in this section shall restrict the rights of any party to file a complaint with the Commission under relevant provisions of the Federal Power Act.

#### II. POINT-TO-POINT TRANSMISSION SERVICE

#### Scheduling of Point-To-Point Transmission Service:

The System Operator will dispatch all resources subject to its control, pursuant to Market Rule 1, in order to meet load and to accommodate external transactions. Resources within the New England Control Area using Firm Point-to-Point Transmission Service shall be dispatched based on economic merit in accordance with Market Rule 1 and will have no physical scheduling or dispatch rights. Transmission Customers will be charged for congestion costs and any other costs associated with such dispatch in accordance with Market Rule 1.

#### 7. Nature of Firm Point-To-Point Transmission Service

#### 7.1 Classification of Firm Transmission Service

The Transmission Customer will be billed for its Reserved Capacity under the terms of Schedule NU-2, as appropriate, for Long and Short-Term Firm Point-To-Point Transmission Service. In the event that either a Transmission Customer has not made a capacity reservation, or a Transmission Customer exceeds its firm capacity reservation at the Point of Receipt and Point of Delivery the Transmission Customer shall be billed and pay for its actual use of such excess capacity in addition to any Reserved Capacity pursuant to Schedule NU-2, including ancillary services provided pursuant to Schedule NU-1 hereto.

#### 8. Nature of Non-Firm Point-To-Point Transmission Service

#### 8.1 Classification of Non-Firm Point-To-Point Transmission Service

The Transmission Customer will be billed for its Reserved Capacity under the terms of Schedule NU-3, as appropriate, for non-firm Point-To-Point Transmission Service. In the event that either a Transmission Customer has not made a capacity reservation, or a Transmission Customer exceeds its non-firm capacity reservation at any Point of Receipt or Point of Delivery, the Transmission Customer shall be billed and pay for its actual use of such excess capacity in addition to any Reserved Capacity pursuant to Schedule NU-3, including ancillary services provided pursuant to Schedule NU-1 hereto. Non-Firm Point-To-Point Transmission Service shall include transmission of energy on an hourly basis and transmission of scheduled short-term

capacity and/or energy on a daily, weekly or monthly basis, but not to exceed one month's reservation for any one Application, under Schedule NU-3.

#### 9. Service Availability

#### 9.1 Real Power Losses

Real Power Losses are associated with all transmission service. The NU Companies are not obligated to provide Real Power Losses. The Transmission Customer is responsible for replacing losses associated with all transmission service as determined under Market Rule 1. The applicable Real Power Loss factors are as follows:

The amount of transmission losses incurred in transmitting power from the POR(s) to the POD(s) ("Loss Amount") shall be determined from time to time by the New England System Operator in accordance with ISO procedures applicable at the time of delivery. The Loss Amounts, when determined by the New England System Operator, shall be posted on the NU Companies' Open Access Same-Time Information System ("OASIS"). In the event that the New England System Operator, for any reason, does not determine the entire Loss Amount, the losses not determined by the New England System Operator shall be based on average system losses as set forth below:

POR/POD	Peak*	Off-Peak	24 Hr. Avg.
Bulk Transmission	1.98	2.42	2.21
Bulk Substation	2.46	2.92	2.70
Pri. Distribution	4.58	4.50	4.54

#### **Cumulative Losses in Percent**

\*Peak hours are defined as 0700-2300, Monday-Friday; Off-Peak hours are all other hours.

#### 10. Procedures for Arranging Firm Point-To-Point Transmission Service

10.1 Deposit

A Completed Application for Firm Point-To-Point Transmission Service also shall include a deposit of either three month's charge for Reserved Capacity or the full charge for Reserved Capacity for service requests of less than one month.

# 11. Additional Study Procedures For Firm Point-To-Point Transmission Service Requests:

#### 11.1 Disbursement Methodology for Late Study Penalties

See Attachment NU-D to Schedule 21-NU.

#### 12. Compensation for Transmission Service

The Transmission Customers taking Point-To-Point Transmission Service shall pay the NU Companies for any Direct Assignment Facilities, Ancillary Services and applicable study costs, along with the following:

#### 12.1 Rates and Charges for Transmission Service

Rates for Firm and Non-Firm Point-To-Point Transmission Services are provided in the Attachments appended to this Local Service Schedule: Firm Point-To-Point Transmission Services (Schedule NU-2); and Non-Firm Point-To-Point Transmission Services (Schedule NU-3).

#### 12.2 Rates for Firm and Non-Firm Point-To-Point Transmission Services

Rates for Firm and Non-Firm Point to Point Transmission Services shall be determined as set forth in Attachments NU-2 and NU-3 of this Local Service Schedule on the basis of estimated costs for each Service Year until the actual costs for such Service Year are determined. Thereafter, payments made on such estimated costs shall be recalculated based on actual data for that Service Year, and an appropriate billing adjustment shall be made pursuant to Section 3 of this Local Service Schedule. The NU Companies shall use Part II of the Tariff to make their Third-Party Sales. The NU Companies shall account for such use at the applicable Tariff rates.

#### III. LOCAL NETWORK SERVICE

#### 13. Nature of Local Network Service

#### 13.1 Real Power Losses

Real Power Losses are associated with all transmission service. The NU Companies are not obligated to provide Real Power Losses. The Network Customer is responsible for replacing losses associated with all transmission service as determined under Market Rule 1. The applicable Real Power Loss factors are as follows:

The amount of transmission losses incurred in transmitting power across the NU Companies' Transmission System to the Network Customer's Network Load shall be determined from time to time by the New England System Operator in accordance with ISO procedures applicable at the time of delivery. The Loss Amounts, when determined by the New England System Operator, shall be posted on the Open Access Same-Time Information System ("OASIS"). In the event that the New England System Operator, for any reason, does not determine the entire Loss Amount, the losses not determined by the New England System Operator shall be based on average system losses as set forth below:

#### **Cumulative Losses in Percent**

. . . .

			24 Hr.
POR/POD	Peak*	Off-Peak	Avg.
Bulk Transmission	1.98	2.42	2.21
Bulk Substation	2.46	2.92	2.70
Pri. Distribution	4.58	4.50	4.54

\*Peak hours are defined as 0700-2300, Monday-Friday; Off-Peak hours are all other hours.

#### 14. Network Resources

#### 14.1 Use of Interface Capacity by the Network Customer

There is no limitation upon a Network Customer's use of the NU Companies' Transmission System at any particular interface to integrate the Network Customer's Network Resources (or substitute economy purchases) with its Network Loads. However, a Network Customer's use of the NU Companies' total interface capacity with other transmission systems may not exceed the Network Customer's Load.

#### 15. Additional Study Procedures For Local Network Service Requests

# **15.1 Disbursement Methodology for Late Study Penalties** See Attachment NU-D to Schedule 21-NU

#### 16. Rates and Charges

The Network Customer shall pay the NU Companies for any Direct Assignment Facilities, Ancillary Services, and applicable study costs, consistent with Commission policy, along with the following:

#### 16.1 Rates and Charges

Rates for Local Network Service shall be determined as set forth in Schedule NU-4 on the basis of estimated costs for each Service Year until the actual costs for such Service Year are determined. Thereafter, payments made on such estimated costs shall be recalculated based on actual data for that Service Year, and an appropriate billing adjustment shall be made pursuant to Section 3 of this Local Service Schedule.

#### 16.2 Eligible Customers Taking Service Under the ISO Tariff

Any Eligible Customer taking Regional Network Service under the ISO Tariff in a Designated State or Area shall pay to the NU Companies the customer's Category B Load Ratio Share of the Formula Requirements as calculated in Schedule NU-4, Appendix B for such Designated State or Area. The NU Companies shall execute a LCRA under this Local Service Schedule, in the form set forth in Attachment NU-E, to recover such charges from such customer. The NU Companies shall not bill any such customer any such costs until (1) such LCRA has been executed with the Eligible Customer, or (2) an unexecuted LCRA has been permitted to be made effective **by** the Commission.

16.3 Listing of Localized Facilities by Designated State or Area:

(a) Connecticut:
Bethel to Norwalk Project
Middletown to Norwalk Project
Glenbrook Cables Project
Greater Springfield Reliability Project (Connecticut portion)

(b) Massachusetts:

#### Greater Springfield Reliability Project (Massachusetts portion)

#### 16.4 Monthly Demand Charge

The Network Customer shall pay monthly Demand Charges, which shall be determined by multiplying its Category A Load Ratio Share times one twelfth (1/12) of the Formula Requirements in Schedule NU-4, Appendix A, and by multiplying its Category B Load Ratio Share for the Designated State or Area times one twelfth (1/12) of the Formula Requirements in Schedule NU-4, Appendix B for the Localized Facilities that are in such Designated State or Area.

#### 16.5 Determination of Network Customer's Monthly Network Load

The Network Customer's Monthly Category A Network Load is its hourly load (including its designated Network Load not physically interconnected with the NU Companies under Schedule 21) coincident with the NU Companies' Monthly Transmission System Peak.

The Network Customer's Monthly Category B Load for a Designated State **or** Area for a Localized Facility is its hourly load in such Designated State or Area coincident with the monthly transmission system peak load for such Designated State or Area.

For Localized Facilities for which the Designated State or Area is identified as "Connecticut" in Section 16.3(a) of this Schedule 21-NU, the customer's hourly load shall be all of the customer's Regional Network Load in Connecticut, and the monthly transmission system peak load shall be all Regional Network Load in Connecticut.

For Localized Facilities for which the Designated State or Area is identified as "Massachusetts" in Section 16.3(b) of this Schedule 21-NU, the customer's hourly load shall be all of the customer's Regional Network Load in Massachusetts, and the monthly transmission system peak load shall be all Regional Network Load in Massachusetts; provided, that the customer's monthly load and the monthly transmission system peak load shall exclude the load of generators taking RNS for the delivery of offline station service.

#### 16.6 Determination of NU Companies' Monthly Transmission System Load

The NU Companies' Monthly Transmission System Category A Load is the NU Companies' Monthly Transmission System Peak minus the coincident peak usage of all Firm Point-To-Point Transmission Service customers pursuant to this Local Service Schedule plus the Reserved Capacity of all Firm Point-To-Point Transmission Service customers.<sup>1</sup>

The NU Companies' Monthly Transmission System Category B Load for the Designated State or Area for a **Localized** Facility is the monthly transmission system peak load for such Designated State or Area.<sup>1</sup>

For Localized Facilities for which the Designated State or Area is identified as "Connecticut" in Section 16.3(a) of this Schedule 21-NU, the monthly transmission system peak load shall be all Regional Network Load in Connecticut.

For Localized Facilities for which the Designated State or Area is identified as "Massachusetts" in Section 16.3(b) of this Schedule 21-NU, the monthly transmission system peak load shall be all Regional Network Load in Massachusetts; provided, that the monthly transmission system peak load shall exclude the load of generators taking RNS for the delivery of offline station service.

<sup>&</sup>lt;sup>1</sup> Excludes MWs associated with lump sum payment transactions identified in footnote 2.

#### **17.** Operating Arrangements

#### 17.1 Operation under the Network Operating Agreement

The Network Customer shall plan, construct, operate and maintain its facilities in accordance with Good Utility Practice and in conformance with the Network Operating Agreement.

#### 17.2 Network Operating Agreement

The terms and conditions under which the Network Customer shall operate its facilities and the technical and operational matters associated with the implementation of Part III of the Tariff shall be specified in the Network Operating Agreement. The Network Operating Agreement shall provide for the Parties to (i) operate and maintain equipment necessary for integrating the Network Customer within the NU Companies' Transmission System (including, but not limited to, remote terminal units, metering, communications equipment and relaying equipment), (ii) transfer data between the NU Companies and the Network Customer (including, but not limited to, heat rates and operational characteristics of Network Resources, generation schedules for units outside the NU Companies' Transmission System, interchange schedules, unit outputs for redispatch, voltage schedules, loss factors and other real time data), (iii) use software programs required for data links and constraint dispatching, (iv) exchange data on forecasted loads and resources necessary for long-term planning, and (v) address any other technical and operational considerations required for implementation of Part III of the Tariff, including scheduling protocols. The Network Operating Agreement will recognize that the Network Customer shall either (i) operate as a Control Area under applicable guidelines of the North American Electric Reliability Council (NERC) and the Northeast Power Coordinating Council (NPCC), (ii) satisfy its Control Area requirements, including all necessary Ancillary Services, by contracting with the NU Companies, or (iii) satisfy its Control Area requirements, including all necessary Ancillary Services, by contracting with another entity, consistent with Good Utility Practice, which satisfies NERC and NPCC requirements. The NU Companies shall not unreasonably refuse to accept contractual arrangements with another entity for Ancillary Services. The Network Operating Agreement is included in Attachment NU-G.

#### **SCHEDULE NU-1**

#### SCHEDULING, SYSTEM CONTROL AND DISPATCH SERVICE

This service is required to schedule the movement of power through, out of, within, or into a Control Area. This service can be provided only by the operator of the Control Area in which the transmission facilities used for transmission service are located. Scheduling, System Control and Dispatch Service is to be provided directly by the NU Companies (if the NU Companies are the Control Area operator) or indirectly by the NU Companies making arrangements with the New England System Operator that performs this service for the NU Companies' Transmission System. The Transmission Customer must purchase this service from the NU Companies or the New England System Operator. The charges for Scheduling, System Control and Dispatch Service are to be based on the rates set forth below. To the extent the New England System Operator performs this service for the NU Companies by the Service for the NU Companies of the Control and Dispatch Service service for the NU Companies, charges to the Transmission Customer are to reflect only a pass-through of the costs charged to the NU Companies by that New England System Operator.

Each Point-To-Point Transmission Customer under this Local Service Schedule will be charged for Transmission Scheduling, System Control and Dispatch Services for the total Reserved Capacity specified in each reservation for Point-To-Point Transmission Service made under this Local Service Schedule at the rates set forth in Appendix A of this Schedule NU-1. In the event that a Transmission Customer utilizes transmission capacity without a reservation or exceeds its capacity reservation at any Point of Receipt or Point of Delivery, the Transmission Customer **shall** pay for its actual use of such excess capacity in addition to any Reserved Capacity. The charge for such excess use of capacity shall be determined by multiplying the sum of the actual use in excess of its capacity reservation times the hourly non-firm rate posted on the NU Companies' OASIS including ancillary services provided pursuant to Schedule NU-1 hereto.

Each Network Customer under this Local Service Schedule will be charged a monthly Transmission Scheduling, System Control and Dispatch Service Demand Charge, which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of the Formula Requirements specified in Appendix B of this Schedule NU-1.

Each Transmission Customer with generation within the New England Control Area shall be required also to provide for Scheduling, System Control and Dispatch Service for that generation. It is anticipated that the Transmission Customer will obtain these services from the ISO. The NU Companies will make available Generation Scheduling, System Control and Dispatch Service at the rates set forth in Appendix C of this Schedule NU-1.

Each Transmission Customer with generation located outside of the New England Control Area shall be required to provide for Scheduling, System Control and Dispatching Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting for these services from the provider of these services within the Control Area where the generation is located.

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule NU-1 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE NU-1 Appendix A POINT-TO-POINT TRANSMISSION RATE

The NU Companies' Formula Rate for Point-To-Point Transmission Scheduling, System Control and Dispatch Service ("Formula Rate") is an annual rate determined from the following formula.

Formula  $Rate_i = (A_{i-1} - B_{i-1}) C_{i-1}$  WHERE:

- i equals the calendar year during which service is being rendered ("Service Year").
- A<sub>i-1</sub> is the Annual Control Center Expenses (expressed in dollars) of the NU Companies for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule NU-1.
- B<sub>i-1</sub> is the actual transmission scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual transmission scheduling and dispatch revenues shall be those recorded on the books of the NU Companies in FERC Account No. 456.1 pertaining to Transmission of Electricity for Others and such other applicable FERC accounts for the calendar year prior to the Service Year.
  - $C_{i-1}$  is the average NU Companies' Monthly Transmission System Category A Load (expressed in kilowatts).

# SCHEDULE NU-1 Appendix A Exhibit 1 DETERMINATION OF ANNUAL CONTROL CENTER EXPENSES

The rate formula for determination of the annual control center expenses revenue requirements for each of the NU Companies is determined as follows:

### A. <u>ANNUAL CONTROL CENTER EXPENSES</u>

The NU Companies' System Control and Load Dispatching Expense, for the calendar year prior to the Service Year, as recorded in FERC Account 561.1-561.4 and the revenue requirement calculation for the CL&P Dispatch Center Plant as described in Appendix A, Exhibit 2.

# SCHEDULE NU-1 APPENDIX A EXHIBIT 2 CL&P DISPATCH CENTER REVENUE REQUIREMENT

This exhibit calculates the CL&P Dispatch Center Revenue Requirement. The CL&P Dispatch Center Revenue Requirement for use during a calendar year shall be based on CL&P's costs for the immediately preceding calendar year.

### I. DEFINITIONS

Capitalized terms not otherwise defined in Section I. of the ISO-NE Transmission, Markets and Services Tariff and as used in this exhibit have the following definitions:

Dispatch Center means CL&P's CONVEX dispatch center.

<u>Dispatch Center Plant</u> shall equal CL&P's year-end gross plant balances used for CL&P's Dispatch Center as recorded in FERC Account Nos. 303, 350-359, and 389-399.

<u>Dispatch Center Depreciation Reserve</u> shall equal CL&P's year-end depreciation reserve balance for Dispatch Center Plant as recorded in FERC Account No. 108.

<u>Dispatch Center Accumulated Deferred Income Taxes</u> shall equal the net of CL&P's year-end deferred tax balances for Dispatch Center Plant as recorded in FERC Account Nos. 281-283 and 190.

# II. CALCULATION OF TOTAL DISPATCH CENTER REVENUE REQUIREMENT

The Dispatch Center Revenue Requirement shall equal the sum of (A) Dispatch Center Return and Associated Income Taxes, (B) Dispatch Center Depreciation Expense, (C) Dispatch Center Amortization of Investment Tax Credits, and (D) Dispatch Center Municipal Tax Expense; provided, that during the period January 1, 2008 through December 31, 2008, the Dispatch Center Revenue Requirement shall equal the product of (i) the number of months (or fractions thereof) remaining in 2007 on and after the date upon which the CONVEX Agreements are permitted to be made effective by FERC, divided by 12 and (ii) the sum of (A) Dispatch Center Return and Associated Income Taxes, (B) Dispatch Center Depreciation Expense, (C) Dispatch Center Amortization of Investment Tax Credits, and (D) Dispatch Center Municipal Tax Expense. "CONVEX Agreements" refers to the agreements between The

Connecticut Light & Power Company and various entities relating to the operation of the Dispatch Center and filed with FERC contemporaneously with the filing of this Exhibit 2.

A. <u>Dispatch Center Return and Associated Income Taxes</u> shall equal the product of the Dispatch Center Investment Base and the Cost of Capital Rate.

1. Dispatch Center Investment Base

<u>The Dispatch Center Investment Base</u> will be the year-end balances of: (a) Dispatch Center Plant, less (b) Dispatch Center Depreciation Reserve, less (c) Dispatch Center Accumulated Deferred Income Taxes.

2. Cost of Capital Rate

<u>The Cost of Capital Rate</u> will equal (a) the Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.

(a) The Weighted Cost of Capital will be calculated based upon CL&P's capital structure at the end of each year and will equal the sum of (i),(ii), and (iii) below.

(i) The long-term debt component, which equals the product of the year-end balance of CL&P's first mortgage bonds and pollution control notes adjusted for premiums, discounts, debt expense and losses on reacquired debt and the ratio of the long term debt to CL&P's total capital.

(ii) The preferred stock component, which equals the product of the year-end balance of CL&P's preferred stock adjusted for premiums, discounts and unamortized issue expense and the ratio of the preferred stock to CL&P's total capital.

(iii) The common equity component, which equals the product of 10.3% and the ratio of the common equity to CL&P's total capital.

(b and c) Federal and State Income Taxes shall be computed as follows:

A x B x C

where:

A = Dispatch Center Investment Base

B = Cost of equity capital (the sum of the preferred stock component and common equity component)

C = TE / (1-TE), where TE is the effective combined federal and state statutory income tax rates in effect at the applicable time.

B. <u>Dispatch Center Depreciation Expense</u> shall equal CL&P's Dispatch Center depreciation expense as recorded in FERC Account No. 403.

C. <u>Dispatch Center Amortization of Investment Tax Credits</u> shall equal CL&P's Dispatch Center amortization of investment tax credits as recorded in FERC Account No. 411.4.

D. <u>Dispatch Center Municipal Tax Expense</u> shall equal CL&P's Dispatch Center municipal tax expense as recorded in FERC Account Nos. 408.1 and 409.1.

#### **SCHEDULE NU-1**

#### **Appendix B**

### NETWORK TRANSMISSION FORMULA REQUIREMENTS

The NU Companies' formula requirements for Network Transmission Scheduling, System Control and Dispatch Service is determined from the following formula.

Formula Requirements<sub>i</sub> =  $(A_{i-1} - B_{i-1})$ 

#### WHERE:

- i equals the calendar year during which service is being rendered ("Service Year").
- A<sub>i-1</sub> is the Annual Control Center Expenses (expressed in dollars) of the NU Companies for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to this Appendix B of Schedule NU-1.
- B<sub>i-1</sub> is the actual transmission scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual transmission scheduling, system control and dispatch revenues shall be those recorded on the books of the NU Companies in FERC Account No. 456.1 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

# SCHEDULE NU-1 APPENDIX B EXHIBIT 1 DETERMINATION OF ANNUAL CONTROL CENTER EXPENSES

The rate formula for determination of the annual control center expenses for each of the NU Companies is determined as follows:

### A. <u>ANNUAL CONTROL CENTER EXPENSES</u>

The NU Companies' System Control and Load Dispatching Expense), for the calendar year prior to the Service Year as recorded in FERC Account 561.1-561.4 and the revenue requirement calculation for the CL&P Dispatch Center Plant as described in Appendix B, Exhibit 2.

# SCHEDULE NU-1 APPENDIX B EXHIBIT 2 CL&P DISPATCH CENTER REVENUE REQUIREMENT

This exhibit calculates the CL&P Dispatch Center Revenue Requirement. The CL&P Dispatch Center Revenue Requirement for use during a calendar year shall be based on CL&P's costs for the immediately preceding calendar year.

#### I. **DEFINITIONS**

Capitalized terms not otherwise defined in Section I. of the ISO-NE Transmission, Markets and Services Tariff and as used in this exhibit have the following definitions:

Dispatch Center means CL&P's CONVEX dispatch center.

Dispatch Center Plant shall equal CL&P's year-end gross plant balances used for CL&P's Dispatch Center as recorded in FERC Account Nos. 303, 350-359, and 389-399.

Dispatch Center Depreciation Reserve shall equal CL&P's year-end depreciation reserve balance for Dispatch Center Plant as recorded in FERC Account No. 108.

Dispatch Center Accumulated Deferred Income Taxes shall equal the net of CL&P's year-end deferred tax balances for Dispatch Center Plant as recorded in FERC Account Nos. 281-283 and 190.

# II. CALCULATION OF TOTAL DISPATCH CENTER REVENUE REQUIREMENT

The Dispatch Center Revenue Requirement shall equal the sum of (A) Dispatch Center Return and Associated Income Taxes, (B) Dispatch Center Depreciation Expense, (C) Dispatch Center Amortization of Investment Tax Credits, and (D) Dispatch Center Municipal Tax Expense; provided, that during the period January 1, 2008 through December 31, 2008, the Dispatch Center Revenue Requirement shall equal the product of (i) the number of months (or fractions thereof) remaining in 2007 on and after the date upon which the CONVEX Agreements are permitted to be made effective by FERC, divided by 12 and (ii) the sum of (A) Dispatch Center Return and Associated Income Taxes, (B) Dispatch Center Depreciation Expense, (C) Dispatch Center Amortization of Investment Tax Credits, and (D) Dispatch Center Municipal Tax Expense. "CONVEX Agreements" refers to the agreements between The

Connecticut Light & Power Company and various entities relating to the operation of the Dispatch Center and filed with FERC contemporaneously with the filing of this Exhibit 2.

A. <u>Dispatch Center Return and Associated Income Taxes</u> shall equal the product of the Dispatch Center Investment Base and the Cost of Capital Rate.

- Dispatch Center Investment Base <u>The Dispatch Center Investment Base</u> will be the year-end balances of: (a) Dispatch Center Plant, less (b) Dispatch Center Depreciation Reserve, less (c) Dispatch Center Accumulated Deferred Income Taxes.
- Cost of Capital Rate <u>The Cost of Capital Rate</u> will equal (a) the Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.
- (a) The Weighted Cost of Capital will be calculated based upon CL&P's capital structure at the end of each year and will equal the sum of (i),(ii), and (iii) below.
- (i) The long-term debt component, which equals the product of the year-end balance of CL&P's first mortgage bonds and pollution control notes adjusted for premiums, discounts, debt expense and losses on reacquired debt and the ratio of the long term debt to CL&P's total capital.
- (ii) The preferred stock component, which equals the product of the year-end balance of CL&P's preferred stock adjusted for premiums, discounts and unamortized issue expense and the ratio of the preferred stock to CL&P's total capital.
- (iii) The common equity component, which equals the product of 10.3% and the ratio of the common equity to CL&P's total capital.
- (b and c) Federal and State Income Taxes shall be computed as follows:

A x B x C

where:

A = Dispatch Center Investment Base

B = Cost of equity capital (the sum of the preferred stock component and common equity component)

C = TE / (1-TE), where TE is the effective combined federal and state statutory income tax rates in effect at the applicable time.

B. <u>Dispatch Center Depreciation Expense</u> shall equal CL&P's Dispatch Center depreciation expense as recorded in FERC Account No. 403.

C. <u>Dispatch Center Amortization of Investment Tax Credits</u> shall equal CL&P's Dispatch Center amortization of investment tax credits as recorded in FERC Account No. 411.4.

D. <u>Dispatch Center Municipal Tax Expense</u> shall equal CL&P's Dispatch Center municipal tax expense as recorded in FERC Account Nos. 408.1 and 409.1.

# SCHEDULE NU-1 Appendix C GENERATION RATES

The NU Companies' Formula Rate for Generation Scheduling, System Control and Dispatch Service ("Formula Rate") shall be calculated using the Point-to-Point Formula Rate for Transmission Scheduling, System Control, and Dispatch Service in Appendix A of Schedule NU-1.

# SCHEDULE NU-2 FIRM POINT-TO-POINT SERVICE

I. Each month, NUSCO shall bill the Transmission Customer for Long-Term Firm and Short-Term Firm Transmission Service and the Transmission Customer shall be obligated to pay the NU Companies the charges as set forth in this Schedule NU-2, as applicable.

#### A. TRANSMISSION CHARGES

#### 1. Determination of Transmission Charges

The Transmission Charges will provide for recovery of the costs of the transmission facilities of the NU Companies. The Category A Transmission Charges for each month will equal the sum of the Category A Charges for each monthly (or longer term), weekly or daily transaction during such month. In the event that a Transmission Customer utilizes transmission capacity without a reservation or exceeds its capacity reservation at any Point of Receipt or Point of Delivery, the Transmission Customer **shall** pay for its actual use of such excess capacity in addition to the charges for each monthly, weekly or daily transactions during such month. The charge for such excess use of capacity shall be determined by multiplying the actual hourly use in excess of its capacity reservation times the applicable Category A on-peak or off-peak hourly non-firm rate posted on the NU Companies' OASIS pursuant to Schedule NU-3 including ancillary services provided pursuant to Schedule NU-1 hereto.

The Category A Charge for each monthly (or longer term) transactions will be the product of: (a) the NU Companies' Category A Formula Rate (expressed in \$ per kilowatt-year), divided by twelve (12) months, and (b) the Reserved Capacity set forth for such monthly (or longer term) transaction (expressed in kilowatts).

The Category A Charge for each weekly transaction will be the product of: (a) the NU Companies' Weekly Category A Short-Term Firm Point-To-Point Transmission Rate (expressed in \$ per kilowatt-week), and (b) the Reserved Capacity set forth for such weekly transaction (expressed in kilowatts). The NU Companies' Weekly Category A Rate is the NU Companies' Category A Formula Rate for Firm Point-To-Point Transmission Service divided by fifty-two (52) weeks. The Category A Charge for each daily transaction will be the product of: (a) the NU Companies' Daily Category A Short-Term Firm Point-To-Point Transmission Rate (expressed in \$ per kilowatt-day), and (b) the Reserved Capacity set forth for such daily transaction (expressed in kilowatts). The NU Companies' Daily Category A Rate is the NU Companies' Weekly Category A Rate for Short-Term Firm Point-To-Point Transmission Service divided by five (5) days. The total of the Transmission Customer's charges for daily transactions, under an individual reservation, in a seven (7) day period shall not exceed the charges based on the Weekly Category A Rate and the Transmission Customer's maximum Reserved Capacity in the period.

#### 2. <u>NU Companies' Formula Rates</u>

The NU Companies' Formula Rates for Long-Term Firm and Short-Term Firm Point-To-Point Service shall be determined in accordance with the rate formulas specified in Appendix A of this Schedule NU-2.

#### 3. <u>Tax Rates and Taxes</u>

The NU Companies' Formula Rates set forth in this schedule in effect during a Service Year shall be based on the local, state, and federal tax rates and taxes in effect during the Service Year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the NU Companies' Formula Rate will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

#### 4. <u>Provision re: Exchanges</u>

With respect to Entitlement Transactions or Energy Transactions or other transactions that involve an exchange, each party to such transaction shall be treated as an individual Transmission Customer under this Local Service Schedule. Accordingly, a separate Schedule NU-2 or other applicable charge(s) will be calculated for, and a separate bill will be rendered to, each such individual Transmission Customer.

# 5. <u>Discounts</u>

Three principal requirements apply to discounts for transmission service as follows: (1) any offer of a discount made by the NU Companies must be announced to all Eligible Customers solely by posting on the OASIS, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on the OASIS, and (3) once a discount is negotiated, details must be immediately posted on the OASIS. For any discount agreed upon for service on a path, from point(s) of receipt to point(s) of delivery, the NU Companies must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on the Transmission System.

# 6. <u>Resales</u>

The rates and rules governing charges and discounts in Sections I.A.1 and 5 of this Schedule NU-2 stated above shall not apply to resales of transmission service, compensation for which shall be governed by Schedule 21.

II. In addition to the applicable charges of this Local Service Schedule, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay to NUSCO each month the following additional charges for Long-Term, and Short-Term Firm Point-To-Point Transmission Service provided during such month.

A. Taxes and Fees Charge

- B. Regulatory Expenses Charge
- C. Other

# A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Long-Term Firm or Short Term Firm Point-To-Point Transmission Service provided under this Local Service Schedule, not specifically provided for in any of the charge or rate provisions under this Local Service Schedule, including any applicable interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for any such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

### B. **<u>REGULATORY EXPENSES CHARGE</u>**

The NU Companies shall have the right to make a Section 205 filing for recovery of regulatory expenses associated with this Local Service Schedule and the Service Agreements.

# C. <u>OTHER</u>

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule NU-2 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE NU-2 Appendix A CATEGORY A RATE FIRM POINT-TO-POINT TRANSMISSION SERVICE

The NU Companies' Category A Formula Rate for Long-Term Firm and Short-Term Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula. Formula Rate<sub>i</sub> =  $(A_i - B_i + C_i - D_i) / E_i$ 

#### WHERE:

- i equals the Service Year.
- A is the annual Total Transmission Revenue Requirements (expressed in dollars) as described in Attachment NU-H,
- B is the revenues received (expressed in dollars) from the provision of transmission and other related services, to others as recorded in FERC Accounts 456.1 and 454 to the extent that such transactions are not included in the determination of load (E),<sup>2</sup> minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- C is the transmission payments (expressed in dollars) to the New England System Operator as recorded in FERC Account 565 in accordance with the Tariff.
- D is the sum of the annual revenues received (expressed in dollars) for the costs associated with the Localized Facilities, minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- E is the average NU Companies' Monthly Transmission System Category A Load (expressed in kilowatts).

<sup>&</sup>lt;sup>2</sup> Includes amortization of revenues from point-to-point transmission service provided to Consolidated Edison Energy Massachusetts, Inc. and NRG Energy, Inc. under contracts in which customers paid based on single lump sum payment.

# **SCHEDULE NU-2**

[Reserved]

## SCHEDULE NU-3 NON-FIRM POINT-TO-POINT SERVICE

 I. The NU Companies shall bill the Transmission Customer for Non-Firm Point-To-Point Transmission Service, and the Transmission Customer shall be obligated to pay the NU Companies the charges as set forth in this Schedule NU-3 as applicable.

#### A. TRANSMISSION CHARGES

#### 1. <u>General</u>

The Transmission Customer shall pay to NUSCO each month the Category A Transmission Charges calculated for all of the Transmission Customer's monthly transactions, weekly transactions, daily transactions and hourly transactions, each as set forth below. In the event that a Transmission Customer utilizes transmission capacity without a reservation or exceeds its capacity reservation at any Point of Receipt or Point of Delivery, the Transmission Customer shall pay for its actual use of such excess capacity in addition to the charges for each monthly, weekly, daily or hourly transactions during such month. The charge for such excess use of capacity shall be determined by multiplying the actual hourly use in excess of its capacity reservation times the applicable Category A on-peak or off-peak hourly non-firm rate posted on the NU Companies' OASIS pursuant to this Schedule NU-3 including ancillary services provided pursuant to Schedule NU-1 hereto.

With respect to any wholesale transactions that involve an exchange, each party to such transaction shall be an individual Transmission Customer under this Local Service Schedule. Accordingly, a Transmission Charge, as applicable, will be calculated for, and a separate bill will be rendered to, each such Transmission Customer.

The Category A Transmission Charge for each month applicable to a monthly transaction shall be determined as the product of: (a) the Category A rate posted on NU's Open Access Same-Time Information System ("OASIS") at the time the service is reserved, not to exceed the NU Companies' Annual Category A Rate for Non Firm Point-To-Point Transmission Service divided by twelve (12) months and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such month (expressed in kilowatts).

The Category A Transmission Charge for each month applicable to weekly transactions shall be the sum of the transmission charges determined for each weekly transaction during such month. The transmission charge for each weekly transaction shall be determined as the product of: (a) the Category A rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Weekly Category A Firm Point-To-Point Transmission Charge Rate (expressed in \$ per kilowatt-week), and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such week (expressed in kilowatts). The NU Companies' Weekly Category A Rate is the NU Companies' Annual Category A Rate for Non-Firm Point-To-Point Transmission Service divided by fifty-two (52) weeks.

The Transmission Charge for each month applicable to daily transactions will be the sum of the transmission charges determined for each daily transaction. The transmission charge for each daily transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Daily Category A Firm Point-To-Point Transmission Charge Rate (expressed in \$ per kilowatt-day), and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such day (expressed in kilowatts). The NU Companies' Daily Category A On-Peak Rate is the NU Companies' Weekly Category A Rate for Non-Firm Point-To-Point Transmission Service divided by five (5) days. The NU Companies' Daily Category A Off-Peak Rate is the NU Companies'

Weekly Category A Rate for Non-Firm Point-To-Point Transmission Service divided by seven (7) days. The total of the Transmission Customer's charges for daily transactions, under an individual Reservation, in a seven (7) day period shall not exceed the charges based on the Weekly Category A Rate and the Transmission Customer's maximum Reserved Capacity in the period.

The Transmission Charge for each month applicable to hourly transactions will be the sum of the transmission charges determined for each hourly transaction during such month. The transmission charge for each hour of an hourly Transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Daily Category A Firm Point-To-Point Transmission Service Rate divided by sixteen (16) hours (expressed in \$ per kilowatt-hour), and (b) the Reserved Capacity as set forth in the Transmission Customer's applicable Reservation for such hour (expressed in kilowatts). The NU Companies' Hourly Category A On-Peak Rate is equal to the NU Companies' Daily

Category A Rate for Non-Firm Transmission Service divided by sixteen (16) hours. The NU Companies' Hourly Category A Off-Peak Rate is equal to the NU Companies' Daily Category A Rate for Non-Firm Transmission Service divided by twenty-four (24) hours. The total of the Transmission Customer's charges for hourly transactions, under an individual Reservation, in a twenty-four (24) hour period shall not exceed the charges based on the Daily Category A Rate and the Transmission Customer's maximum Reserved Capacity in the period.

## 2. <u>Discounts</u>

Three principal requirements apply to discounts for transmission service as follows: (1) any offer of a discount made by the NU Companies must be announced to all Eligible Customers solely by posting on the OASIS, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on the OASIS, and (3) once a discount is negotiated, details must be immediately posted on the OASIS. For any discount agreed upon for service on a path, from point(s) of receipt to point(s) of delivery, the NU Companies must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on the Transmission System.

#### 3. <u>Resales</u>

The rates and rules governing charges and discounts in Sections I.A.1 and 2 of this Schedule NU-3 stated above shall not apply to resales of transmission service, compensation for which shall be governed by Schedule 21.

## 4. <u>Credit to the Transmission Charge</u>

Whenever service provided hereunder is interrupted or curtailed by the NU Companies, the Local Control Center or the New England System Operator, the Transmission Charges to the Transmission Customer calculated pursuant to Section A, of this Schedule NU-3 shall be credited by an amount equal to the sum of the credits calculated for each hour of interruption or curtailment in service. The credit to the Transmission Customer for each such hour of interruption or curtailment shall be calculated as the product of (i) the applicable equivalent hourly charge for hourly, daily, weekly, or monthly transactions, and (ii) the kilowatts of service interruption or curtailment during such hour.

## 5. <u>NU Companies' Annual Formula Rate for Non Firm Point-To-Point Transmission</u> Service

The NU Companies' Annual Formula Rates for Non Firm Point-To-Point Transmission Service shall be expressed in \$ per kilowatt-year and shall be determined in accordance with the rate formulas specified in Appendix A of this Schedule NU-3 ("Formula Rates").

## 6. <u>Tax Rates and Taxes</u>

The Formula Rates set forth in this Schedule NU-3 in effect during a Service Year shall be based on local, state, and federal tax rates and taxes in effect during the Service Year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the Formula Rate will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

- II. In addition to the applicable charges of this Local Service Schedule, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay NUSCO each month the following additional charges for Non-firm Point-To-Point Transmission Service provided during such month.
- A. Taxes and Fees Charge
- B. Regulatory Expenses Charge
- C. Other

### A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Non-Firm Point-To-Point Transmission Service provided under this Local Service Schedule, not specifically provided for in any of the charge or rate provisions under this Local Service Schedule, including any applicable interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

#### B. **<u>REGULATORY EXPENSES</u>**

The NU Companies reserve their rights to make a Section 205 filing for recovery of their costs to administer this Local Service Schedule and the Service Agreements.

## C. <u>OTHER</u>

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule NU-3 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE NU-3 Appendix A CATEGORY A RATE FOR NON-FIRM POINT-TO-POINT SERVICE

The NU Companies' Category A Formula Rate for Non-Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula.

Formula Rate<sub>i</sub> =  $(A_i - B_i + C_i - D_i) / E_i$ 

WHERE:

- i equals the Service Year.
- A is the annual Total Transmission Revenue Requirements (expressed in dollars) as described in Attachment NU-H.
- B is the revenues received (expressed in dollars) from the provision of transmission and other related services to others as recorded in FERC Accounts 456.1 and 454 to the extent that such transactions are not included in the determination of load (E),<sup>2</sup> minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- C is the transmission payments (expressed in dollars) to the New England System Operator as recorded in FERC Account 565 in accordance with the Tariff.
- D is the sum of the annual revenues received (expressed in dollars) for the costs associated with the Localized Facilities, minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- E is the average NU Companies' Monthly Transmission System Category A Load (expressed in kilowatts).

<sup>&</sup>lt;sup>2</sup> Includes amortization of revenues from point-to-point transmission service provided to Consolidated Edison Energy Massachusetts, Inc. and NRG Energy, Inc. under contracts in which customers paid based on single lump sum payment.

SCHEDULE NU-3[RESERVED]

## **SCHEDULE NU-4**

## CHARGE PROVISIONS FOR LOCAL NETWORK SERVICE

I. Network Customers will pay the following demand charges for Local Network Service.

## A. **DEMAND CHARGE A**

- <u>Determination of Demand Charge</u>: The Demand Charge will be determined in accordance with Section <del>16.3</del>16.4 of this Local Service Schedule.
- <u>NU Companies' Annual Transmission Revenue Requirements</u>: The annual Transmission Revenue Requirements shall be determined in accordance with the formula specified in Appendix A of this Schedule NU-4 ("Formula Requirements").

## B. **DEMAND CHARGE B**

- Determination of Demand Charge The Demand Charge will be determined in accordance with Section 16.316.4 of this Local Service Schedule.
- 2. <u>NU Companies' Annual Transmission Revenue Requirements</u>:

The annual Transmission Revenue Requirements for each Localized Facility of a Designated State or Area shall be determined in accordance with the formula specified in Appendix B of this Schedule NU-4 ("Formula Requirements").

## C. <u>TAX RATES AND TAXES</u>

The Formula Requirements set forth in this Schedule NU-4 in effect during a Service Year shall be based on local, state, and federal tax rates and taxes in effect during the Service Year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the Formula Requirements will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations. II. In addition to the applicable charges of this Local Service Schedule, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay to NUSCO each month the following additional charges for Local Network Service provided during such month.

A. Taxes and Fees Charge

- B. Regulatory Expenses Charge
- C. Other

## A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for service provided under this Local Service Schedule, not specifically provided for in any of the charge or rate provisions under this Local Service Schedule, including any applicable interest charged on any deficiency assessment by the taxing authority, together with any further tax on such payments, the obligation to make payment for any such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

## B. **<u>REGULATORY EXPENSES CHARGE</u>**

The NU Companies shall have the right to make a Section 205 filing for recovery of regulatory expenses associated with this Local Service Schedule and the Service Agreements.

## C. <u>OTHER</u>

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule NU-4 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE NU-4 Appendix A NETWORK FORMULA REQUIREMENTS FOR CATEGORY A COSTS

The NU Companies' formula requirements for Local Network Service is determined from the following formula.

Formula Requirements<sub>i</sub> =  $A_i - B_i + C_i - D_i$ 

## WHERE:

- i equals the Service Year.
- A is the annual Total Transmission Revenue Requirements (expressed in dollars) as described in Attachment NU-H.
- B is the revenues received (expressed in dollars) from the provision of transmission and other related services to others as recorded in FERC Accounts 456.1 and 454 to the extent that such transactions are not included in the determination of load,<sup>2</sup> minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- C is the transmission payments to (expressed in dollars) the New England System Operator as recorded in FERC Accounts 565 in accordance with the Tariff.
- D is the sum of the annual revenues received (expressed in dollars) for the costs associated with Localized Facilities, minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- <sup>2</sup> Includes amortization of revenues from point-to-point transmission service provided to Consolidated Edison Energy Massachusetts, Inc. and NRG Energy, Inc. under contracts in which customers paid based on single lump sum payment.

# SCHEDULE NU-4 Appendix B NETWORK FORMULA REQUIREMENTS FOR CATEGORY B COSTS

The NU Companies' formula requirements for Local Network Service and for Eligible Customers taking Regional Network Service under this Tariff in a Designated State or Area of a Localized Facility, is determined from the following formula, and separately determined for each Designated State or Area of a Localized Facility.

Formula Requirements<sub>i</sub> =  $D_i$ 

#### WHERE:

- i equals the Service Year.
- D is the annual Localized Transmission Revenue Requirements (expressed in dollars) of the Localized Facilities of the NU Companies for a Designated State or Area of a Localized Facility, as described in Attachment NU-I.

## ATTACHMENT NU-C

## AVAILABLE TRANSFER CAPABILITY METHODOLOGY

## TABLE OF CONTENTS

- 1. Introduction
- 2. Transmission Service in the New England Markets
- 3. NU Companies' Total Transfer Capability (TTC)
- 4. Capacity Benefit Market (CBM)
- 5. Transmission Reliability Margin (TRM)
- 6. Calculation of ATC for the NU Companies' Local Facilities
- 7. Posting of ATC Related Information
- 8. Process Flow Diagram for ATC Calculation

#### 1. Introduction

ISO is the regional transmission organization ("RTO"), serving the New England Control Area. ISO is responsible for the development, oversight, and fair administration of New England's wholesale market, management of the bulk electric power system and wholesale markets' planning processes. The ISO serves as the Balancing Authority for the New England Control Area. The New England Control Area is interconnected to three neighboring Balancing Authority Areas ("BAA"): New Brunswick System Operator Area ("NBSO Area"), New York Independent System Operator Area ("NYISO Area"), and Hydro-Quebec TransEnergie Area ("HQTE Area").

As part of its RTO responsibilities, the ISO is registered with the North American Electric Reliability Corporation ("NERC") as several functional model entities that have responsibilities related to the calculation of ATC as defined in the following NERC Standards: MOD-001 – Available Transmission System Capability ("MOD-001"), MOD-004 – Capacity Benefit Margin ("MOD-004"), and MOD-008 – Transmission Reliability Margin Calculation Methodology ("MOD-008"). The extent of those responsibilities is based on various Commission approved transmission operating agreements and the provisions of the ISO New England Operating Documents.

While the ISO is the Transmission Service Provider for Regional Network Service ("Regional Transmission Service") associated with Pool Transmission Facilities, the Participating Transmission Owners ("PTOs") provide local transmission service over Non-Pool Transmission Facilities within the RTO footprint and are responsible for calculating TTC and ATC associated with Local Transmission Service provided under Schedule 21 pursuant to the Transmission Operating Agreement ("TOA"). Pursuant to CFR § 37.6(b)<sup>1</sup> of the FERC Regulations Transmission Provider's are obligated to calculate and post TTC and ATC for each Posted Path. The ISO is not responsible for the calculation of these values.

Pursuant to the terms of the Transmission Operating Agreement executed between the NU Companies as Participating Transmission Owners ("PTOs") and ISO, the NU Companies are Transmission Service Providers and calculate TTC and ATC for certain Local Facilities over which Point-to-Point transmission service is provided under Schedule 21-NU of the ISO Open Access Transmission Tariff ("ISO OATT").

<sup>1</sup> §37.6(b) Posting transfer capability. The available transfer capability on the Transmission Provider's system (ATC) and the total transfer capability (TTC) of that system shall be calculated and posted for each Posted Path as set out in this section.

Posted Path is defined as any control area to control area interconnection; any path for which service is denied, curtailed or interrupted for more than 24 hours in the past 12 months; and any path for which a customer requests to have ATC or TTC posted. For this last category, the posting must continue for 180 days and thereafter until 180 days have elapsed from the most recent request for service over the requested path. For purposes of this definition, an hour includes any part of any hour during which service was denied, curtailed or interrupted (§37.6(b)(1)(i)).

Non-PTF facilities are primarily radial paths that provide transmission service directly to interconnected generators. It is possible, in the future that a particular path may interconnect more nameplate capacity generation than the path's TTC. However, for the NU Companies' Non-PTF modeled by the ISO or the Local Control Center ("LCC"), the ISO or the LCC will only dispatch an amount of generation interconnected to such path so as not to incur a reliability or stability violation on the subject path consistent with ISO's economic, security constrained dispatch methodology.

The NU Companies do not currently have any Posted Paths based on the above definition. However, if the NU Companies do have any Posted Path(s) in the future, the NU Companies will calculate TTC using NERC Standard MOD-029-1 Rated System Path Methodology as outlined below.

## **1.1 Scope of Document**

The scope of this document is limited to those functions performed or utilized by the NU Companies as the Transmission Provider of Schedule 21-NU Local Point-to Point transmission service over Non-PTF pursuant to the PTOs' Transmission Operating Agreement and the ISO OATT:

- Total Transfer Capability (TTC) methodology
- Available Transfer Capability (ATC) methodology
- Existing Transmission Commitment (ETC)
- Use of Rollover Rights (ROR) in the calculation of ETC

As explained in Section 2, TTC and ATC are required to be calculated only for certain non-PTF internal Posted Paths over which Local Point-to-Point transmission service is provided under Schedule 21-NU. TTC and ATC is not calculated by the NU Companies for Local Network Service because ISO employs a market model for economic, security constrained dispatch of generation, and the NU Companies do not require advance reservation for such network service.

### 2. Transmission Service in the New England Markets

Since the inception of the OATT for New England, the process by which generation located inside New England supplies energy to the bulk electric system has differed from the Commission's pro forma OATT. The fundamental difference is that internal generation is dispatched in an economic, security constrained manner by the ISO rather than utilizing a system of physical rights, advance reservations and point-to-point transmission service. Through this process, internal generation provides offers that are utilized by the ISO in the Real-Time Energy Market dispatch software. This process provides the least-cost dispatch to satisfy Real-Time load on the system.

In addition to offers from generation within New England, entities may submit External Transactions to move energy into the ISO Area, the New England Control Area, out of the New England Control Area, or through the New England Control Area. The Real-Time Energy Market clears these External Transactions based on forecast Locational Marginal Pricing (LMPs) and the transfer capability of the associated external interfaces. With those External Transactions in place, the Real-Time Energy Market dispatches internal generation in an economic, security constrained manner to meet Real-Time load within the region.

This process for submitting External Transactions into the New England Real-Time Energy Market does not require an advance physical reservation for use of the PTF. In the event that the net of the economic External Transactions is greater than the transfer capability of the associated external interface, the External Transactions selected to flow are selected based on the rules specified in the Tariff. For any External Transactions that are confirmed to flow in Real-Time based on the economics of the system, a transmission reservation for RNS and Through or Out Service is created after-the-fact to satisfy the transparency needs of the market.

The process described above is applicable to the PTF within the ISO Area, and non-PTF Local Facilities where utilized for Local Network Service by generation or load. However, the NU Companies own Local Facilities over which an advance transmission service reservation for firm or non-firm transmission service may be required. On those Local Facilities, the market participant may obtain a transmission service reservation from the NU Companies under Schedule 21-NU prior to delivery of energy into the New England Wholesale Market. This document addresses the calculation of ATC and TTC for these non-PTF internal paths.

#### 3. NU Companies Total Transfer Capability (TTC)

The Total Transfer Capability (TTC) is the amount of electric power that can be moved or transferred reliably from one area to another area of the interconnected transmission systems by way of all transmission lines (or paths) between those areas under specified system conditions. TTC for Schedule 21-NU is calculated using NERC Standard MOD-029-1 Rated System Path Methodology and posted on the NU Companies' OASIS site.

The NU Companies will calculate and post TTC on its OASIS site for all non-PTF Posted Paths that are eligible for Point-to-Point transmission service reservations. The TTC on the NU Companies' non-PTF Local Facilities that are eligible for Local Point-to-Point transmission service reservations are relatively static values. The NU Companies thus calculate the TTC for Non-PTF Posted Paths that may require Local Point-to-Point Local Point-to-Point transmission reservations on its OASIS provider page according to NAESB Standards.

#### 4. Capacity Benefit Market (CBM)

CBM is defined as the amount of firm transmission transfer capability set aside by a TSP for use by the Load Serving Entities. The ISO does not set aside any CBM for use by the Load Serving Entities, because of the New England approach to capacity planning requirements in the ISO New England Operating Documents. Load Serving Entities operating within the New England Control Area are required to arrange for their Capacity Requirements prior to the beginning of any given month in accordance with ISO Tariff, Section III.13.7.3.1 (Calculation of Capacity Requirement and Capacity Load Obligation). Load Serving Entities do not utilize CBM to ensure that their capacity needs are met; therefore, CBM is not applicable within the New England market design. Accordingly, for purposes of the NU Companies' ATC calculation and because CBM for the New England Control Area is set to zero (0), the NU Companies utilize a zero (0) CBM value.

#### Existing Transmission Commitments, Firm (ETC<sub>F</sub>)

The  $\text{ETC}_F$  are those confirmed Firm transmission reservations (PTP<sub>F</sub>) plus any rollover rights for Firm transmission reservations (ROR<sub>F</sub>) that have been exercised. There are no allowances necessary for Native Load forecast commitments (NL<sub>F</sub>), Network Integration Transmission Service (NITS<sub>F</sub>),

grandfathered Transmission Service  $(GF_F)$  and other service(s), contract(s) or agreement(s)  $(OS_F)$  to be considered in the ETC  $_F$  calculation.

### Existing Transmission Commitments, Non-Firm(ETC<sub>NF</sub>)

The  $(\text{ETC}_{NF})$  are those confirmed Non-Firm transmission reservations  $(\text{PTP}_{NF})$ . There are no allowances necessary for Non-Firm Network Integration Transmission Service (NITS<sub>NF</sub>), Non-Firm grandfathered Transmission Service (GF<sub>NF</sub>) or other service(s), contract(s) or agreement(s) (OS<sub>NF</sub>).

#### 5. Transmission Reliability Margin (TRM)

TRM is the amount of transmission transfer capability set aside to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as system conditions change. It is used only for external interfaces under the New England market design. The NU Companies do not have any external interfaces, and therefore TRM for the NU Companies' non-PTF facilities is zero.

### 6. Calculation of ATC for the NU Companies' Local Facilities - General Description:

NERC Standards MOD-001-1 – Available Transmission System Capability and MOD-029-1 – Rated System Path Methodology define the required items to be identified when describing a transmission provider's ATC methodology. As a practical matter, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

Common practice is not to calculate or post firm and non-firm ATC values for the non-PTF assets described above, as ATC is positive and listed as 9999. Transmission customers are not restricted from reserving firm or non-firm transmission service on non-PTF facilities.

As Real-Time approaches, the ISO utilizes the Real-Time energy market rules to determine which of the submitted energy transactions will be scheduled in the coming hour. Basically, the ATC of the non-PTF assets in the New England market is almost always positive. With this simplified version of ATC, there is no detailed algorithm to be described or posted. Thus, for those non-PTF facilities that serve as a path for the NU Companies' Schedule 21-NU Point-to-Point Transmission Customers, the NU Companies have posted the ATC as 9999, consistent with industry practice. ATC on these paths varies depending on

the time of day. However, it is posted with an ATC of "9999" to reflect the fact that there are no restrictions on these paths for commercial transactions.

## 6.1 Calculation of Schedule 21-NU Firm ATC (ATC<sub>F</sub>)

**6.1.1** Calculation of ATC<sub>F</sub> in the Planning Horizon (PH)

For purposes of this Attachment C PH is any period before the Operating Horizon.

Consistent with the NERC definition,  $ATC_F$  is the capability for Firm transmission reservations that remain after allowing for TRM, CBM,  $ETC_F$ , Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM are zero. Firm Transmission Service under Schedule 21-NU that is available in the Planning Horizon (PH) includes: Yearly, Monthly, Weekly, and Daily. Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-NU transmission reservations are not considered in the ATC calculation. Therefore,  $ATC_F$  in the PH is equal to the TTC minus  $ETC_F$ 

6.1.2 Calculation of ATC<sub>F</sub> in the Schedule 21-NU Operating Horizon (OH)

For purposes of this Attachment C OH is noon eastern prevailing time each day. At that time, the OH spans from noon through midnight of the next day for a total of 36 hours. As time progresses, the total hours remaining in the OH decreases until noon the following day when the OH is once again reset to 36 hours.

Consistent with the NERC definition,  $ATC_F$  is the capability for Firm transmission reservations that remain after allowing for  $ETC_F$ , CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM is zero. Daily Firm Transmission Service under Schedule 21-NU is the only firm service offered in the Operating Horizon (OH). Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-NU transmission reservations are not considered in the  $ATC_F$  calculation. Therefore,  $ATC_F$  in the OH is equal to the TTC minus ETC<sub>F</sub>.

**6.1.3** Because Firm Schedule 21-NU transmission service is not offered in the Scheduling Horizon (SH): ATC<sub>F</sub> in the SH is zero.

## 6.2 Calculation of Schedule 21-NU Non-Firm ATC (ATC<sub>NF</sub>)

#### 6.2.1 Calculation of ATC<sub>NF</sub> in the PH

 $ATC_{NF}$  is the capability for Non-Firm transmission reservations that remain after allowing for ETC<sub>F</sub>, ETC<sub>NF</sub>, scheduled CBM (CBM<sub>S</sub>), unreleased TRM (TRM<sub>U</sub>), Non-Firm Postbacks (Postbacks<sub>NF</sub>) and Non-Firm counterflows (counterflows<sub>NF</sub>).

As discussed above, the TRM and CBM for Schedule 21-NU are zero. Non-Firm ATC available in the PH includes: Monthly, Weekly, Daily and Hourly. TRM <sub>U</sub>, Postbacks<sub>NF</sub> and counterflows<sub>NF</sub> of Schedule 21-NU transmission reservations are not considered in this calculation. Therefore,  $ATC_{NF}$  in the PH is equal to the TTC minus ETC <sub>F</sub> and ETC<sub>NF</sub>.

6.2.2 Calculation of ATC<sub>NF</sub> in the OH

ATC NF available in the OH includes: Daily and Hourly.

As discussed above TRM and CBM for Schedule 21-NU are zero.  $TRM_U$ , counterflows and  $ETC_{NF}$  are not considered in this calculation. Therefore,  $ATC_{NF}$  in the OH is equal to the TTC minus  $ETC_F$ , plus postbacks of  $PTP_F$  in OH as  $PTP_{NF}$  (Postbacks  $_{NF}$ )

## 6.3 Negative ATC

As stated above, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

As stated above, the NU Companies' non-PTF facilities are primarily radial paths that provide transmission service to directly interconnected generators. It is possible, in the future, that a particular radial path may interconnect more nameplate capacity generation than the path's TTC. However, due to the ISO's security constrained dispatch methodology, the ISO will only dispatch an amount of generation interconnected to such path so as not to incur a reliability or stability violation on the subject path. Therefore, ATC in the PH, OH and SH may become zero, but will not become negative.

## 7. Posting of Schedule 21-NU ATC

## 7.1 Location of ATC Posting

ATC values are posted on the NU Companies' OASIS site.

## 7.2 Updates To ATC

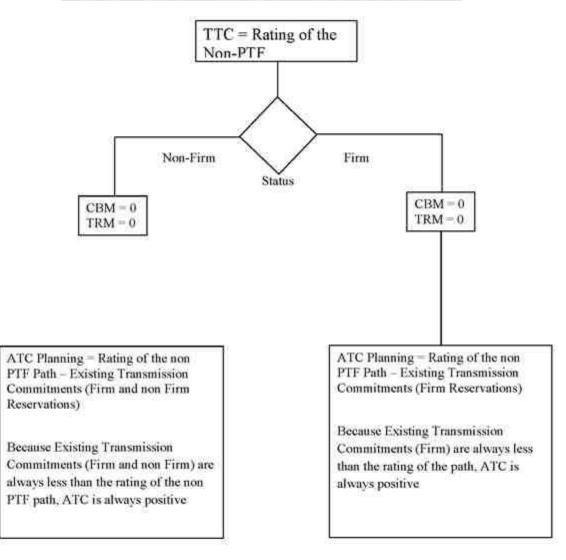
When any of the variables in the ATC equations change, the ATC values are recalculated and immediately posted.

## 7.3 Coordination of ATC Calculations

Schedule 21-NU non-PTF has no external interfaces. Therefore it is not necessary to coordinate the values.

**7.4 Mathematical Algorithms** A link to the actual mathematical algorithm for the calculation of ATC for the NU Companies non-PTF internal interfaces is located at <u>http://www.transmission-nu.com/business/pdfs/Attachment%206.pdf</u>.

## 8. Process Flow Diagram for ATC Calculation



## Non-PTF Transmission Path ATC Process Flow Diagram

## ATTACHMENT NU-D PENALTY DISBURSEMENT METHODOLOGY

Late Study Penalties: Penalties paid by the Transmission Provider pursuant to Schedule 21 are referred to as "Late Study Penalties," and therefore subject to distribution to all Transmission Customers that are not affiliated with the Transmission Provider. On the month following the end of each calendar quarter, each Transmission Customer that is not affiliated with the Transmission Provider shall receive, on the relevant monthly invoice, a credit for its share of the Late Study Penalties that were assessed during the applicable calendar quarter. The Transmission Customer's share of the Late Study Penalties (if any) will be determined as follows:

(a) For each quarter, the Transmission Provider will determine: (1) the sum of all Late Study Penalties assessed during the quarter measured in dollars (LSRq), and (2) the sum of all transmission revenue from Transmission Customers that are not affiliated with the Transmission Provider during that quarter, measured in dollars (LSTRq). Where:

LSRq = Late Study Penalty Revenue in the quarter LSTRq = Transmission Revenue from Transmission Customers not affiliated with the Transmission Provider in the quarter

(b) For each quarter, each Transmission Customer that was not affiliated with the Transmission Provider will receive a credit equal to the product of (i) LSRq multiplied by (ii) a fraction derived from dividing the amount of transmission revenue from that Transmission Customer (TC1) during that quarter (measured in dollars), where TC1 is equal to one Transmission Customer, and a denominator equal to LSTRq.

(c) The Transmission Provider shall apply the credit for Late Study Penalties to service that the nonaffiliated Transmission Customer takes from the Transmission Provider pursuant to this Schedule 21-NU. Any remaining credit will be refunded to the Transmission Customer.

## ATTACHMENT NU-E LOCALIZED COSTS RESPONSIBILITY AGREEMENT

This Localized Costs Responsibility Agreement ("LCRA" or "Agreement"), dated as of \_\_\_\_\_\_\_\_, is entered into by and between the Northeast Utilities Service Company ("NUSCO" or "COMPANY"), acting as agent for [The Connecticut Light and Power Company, Western Massachusetts Electric Company, Public Service Company of New Hampshire], and the "Transmission Customer".

The Transmission Customer is \_\_\_\_\_\_\_. The Transmission Customer has been determined to be an Eligible Customer taking Regional Network Service under the Tariff whose load **is located in the** Designated State or Area for a **Localized** Facility listed in **Section** 16.3 **of** Schedule 21-NU of the Tariff.

The Transmission Customer agrees to pay its portion of the cost of Localized Facilities in the Designated State or Area in which the Transmission Customer's load is located as provided in the Tariff and in accordance with Commission orders. Billing under this Agreement shall commence on the later of: (1) 0001 hours on \_\_\_\_\_\_, or (2) such other date as permitted by the Commission.

Charges under this Agreement shall terminate on the earlier of: (1) the date on which the costs of the Localized Facilities in the Designated State or Area in which the Transmission Customer's load is located are fully depreciated; or (2) the date upon which the Transmission Customer no longer takes Regional Network Service under the Tariff in the Designated State or Area in which the Transmission Customer's load is located; provided, that the Transmission Customer shall remain responsible for all final payment obligations. In the event that the Transmission Customer sells or assigns, or transfers its load to another entity ("New Transmission Customer"), the Transmission Customer must provide NUSCO with at least ninety (90) calendar days advance written notice of the sale, assignment, or transfer.

The Transmission Customer shall remain liable for the performance of all obligations under this Agreement until a new LCRA has been executed between the New Transmission Customer and NUSCO, or in the case of an unexecuted LCRA, such other date as it has been **permitted to** be made effective by the Commission. No sale or assignment shall **become effective** until the Parties have complied with all Applicable Laws and Regulations required for such sale, assignment, or transfer. Other special provisions (if any)

Any notice or request made to or by any Party regarding this greement shall be made in writing and shall be telecommunicated or delivered either in person, or by prepaid mail (return receipt requested) to the representative of the other Party as indicated below. Such representative and address for notices or requests may be changed from time to time by notice by one Party to the other.

## COMPANY:

TRANSMISSION CUSTOMER:

Any exhibits to thisAgreement and the Tariff are incorporated herein and made a part hereof. ThisAgreement may be amended, from time to time, as provided for in Schedule 21-NU of the Tariff.

IN WITNESS WHEREOF, the Parties have caused this Agreement to be executed by their respective authorized officials as of the date first above written.

NORTHEAST UTILITIES SERVICE COMPANY

By: \_\_\_\_\_\_
Its \_\_\_\_\_

TRANSMISSION CUSTOMER

By:	 	 	
Its			

## ATTACHMENT NU-G NETWORK OPERATING AGREEMENT

This Network Operating Agreement is an appendix to Schedule 21-NU (this Local Service Schedule) of the OATT and operates as an implementing agreement for Local Network Service under this Local Service Schedule. This Network Operating Agreement is subject to and in accordance with Part III of this Local Service Schedule. All definitions and other terms and conditions of this Local Service Schedule are incorporated herein by reference.

#### **1.0 Definitions:**

## **1.1 Data Acquisition Equipment**

Supervisory control and data acquisition ("SCADA"), remote terminal units ("RTUs") to obtain information from a Party's facilities, telephone equipment, leased telephone circuits, fiber optic circuits, and other communications equipment necessary to transmit data to remote locations, and any other equipment or service necessary to provide for the telemetry and control requirements of this Local Service Schedule.

### 1.2 Data Link

The direct communications link between the Transmission Customer's energy control center and the NU Companies' designated location(s) that will enable the NU Companies to receive real time telemetry and data from the Transmission Customer.

#### **1.3** Metering Equipment

High accuracy, solid state kW, kVAR, kWh meters, metering cabinets, metering panels, conduits, cabling, high accuracy current transformers and high accuracy potential transformers, which directly or indirectly provide input to meters or transducers, metering recording devices, telephone circuits, signal or pulse dividers, transducers, pulse accumulators, metering sockets, test switch devices, enclosures, conduits, and any other metering, telemetering or communication equipment necessary to implement the provisions of this Local Service Schedule.

#### **1.4 Protective Equipment**

Protective relays, relaying panels, relaying cabinets, circuit breakers, conduits, cabling, current transformers, potential transformers, coupling capacitor voltage transformers, wave traps, transfer trip and

fault recorders, which directly or indirectly provide input to relays, fiber optic communication equipment, power line carrier equipment and telephone circuits, and any other protective equipment necessary to implement the protection provision of this Local Service Schedule.

## 2.0 Term

The term shall be as provided in the Service Agreement consistent with this Local Service Schedule (including, but not limited to, application procedures, commencement of service, and effect of termination).

### 3.0 **Point(s) Of Interconnection**

Local Network Service will be provided by the NU Companies at the point(s) of interconnection specified in Appendix \_\_\_\_, as amended from time to time. Each point of interconnection in this listing shall have a unique identifier, meter location, meter number, metered voltage, terms on meter compensation and designation of current or future year of in service.

### 4.0 Cogeneration And Small Power Production Facilities

If a Qualifying Facility is located or locates in the future on the System of the Transmission Customer, and the owner or operator of such Qualifying Facility sells the output of such Qualifying Facility to an entity other than the Transmission Customer, the delivery of such Qualifying Facility's power shall be subject to and contingent upon transmission arrangements being established with the NU Companies prior to commencement of delivery of any such power and energy.

#### 5.0 Character Of Service

Network Transmission Service at the points of interconnection shall be in the form of single phase or balanced three-phase alternating current at a frequency of sixty (60) hertz. The Transmission Customer shall operate and maintain its electric system in a manner that avoids: (i) the generation of harmonic frequencies exceeding the limits established by the latest revision of IEEE-519; (ii) voltage flicker exceeding the limits established by the latest revision of IEEE-141; (iii) negative sequence currents; (iv) voltage or current fluctuations; (v) frequency variations; or (vi) voltage or power factor levels that could adversely affect the NU Companies' electrical equipment or facilities or those of its customers, and in a manner that complies with all applicable NERC, NPCC, ISO and the NU Companies', operating criteria, rules, regulations, procedures, guidelines and interconnection standards as amended from time to time.

#### 6.0 Continuity Of Service

(a) The NU Companies and the Transmission Customer shall operate and maintain their respective network systems, in accordance with Good Utility Practice, and in a manner that will allow the NU Companies to safely and reliably operate the NU Transmission System in accordance with this Local Service Schedule, so that either Party shall not unduly burden the other Party; provided, however, that notwithstanding any other provision of this Local Service Schedule, the NU Companies shall retain the sole responsibility and authority for all operating decisions that could affect the integrity, reliability and security of the NU Transmission System.

(b) The NU Companies shall exercise reasonable care and Due Diligence to ensure Local Network Service hereunder in accordance with Good Utility Practice; provided, however, that the NU Companies shall not be responsible for any failure to ensure electric power service, nor for interruption, reversal or abnormal voltage of the service, if such failure, interruption, reversal or abnormal voltage is due to a Force Majeure.

### 7.0 Power Factor

(a) Where Local Network Service provided under this Local Service Schedule is for delivery of power to a load center of the Transmission Customer served from the NU Companies' Transmission System, the Transmission Customer shall maintain load power factor levels, during both on- and off- peak hours, appropriate to meet the operating requirements of the NU Companies, and shall follow the ISO standards and practices, as set forth in the Service Agreement.

(b) Where Local Network Service provided under this Local Service Schedule is for delivery of power from a generating facility connected to the NU Companies' Transmission System, the Transmission Customer shall deliver power at a lagging or leading power factor as set forth in the Service Agreement.

(c) Where Local Network Service provided under this Local Service Schedule is for delivery of power from outside the NU Companies' Transmission System, the obligation to maintain proper sending and receiving end voltages rests with the Transmission Customer, as set forth in the Service Agreement.

(d) In the event that the power factor levels and reactive supply requirements set forth in the Service Agreement are not maintained by the Transmission Customer, the NU Companies shall thereupon have the right to take the appropriate corrective action and to charge the Transmission Customer for the costs thereof. The NU Companies shall have the right, at any time, unilaterally to make a Section 205 filing with the Commission for the recovery of any such costs.

#### 8.0 Metering

(a) The Transmission Customer shall, at its expense, purchase all necessary metering equipment to accurately account for the electric power being transmitted under this Local Service Schedule. The NU Companies may require the installation of telemetering equipment for the purposes of billing, power factor measurements and to allow the NU Companies to maximize economic and reliable operation of their transmission system. Such metering equipment shall meet the specifications and accepted metering practices of the NU Companies and applicable criteria, rules, standards and operating procedures, or such successor rules and standards. At the NU Companies' option, communication metering equipment may be installed in order to transmit meter readings to the NU Companies' designated locations.

(b) Electric power being transmitted under this Local Service Schedule will be measured by meters at all points of interconnection and/or on generating facilities (Network and non-Network Resources) located on and outside the Transmission Customer's system as required by the NU Companies.

(c) The Transmission Customer shall purchase meters capable of time-differentiated (by hour) measurement of the instantaneous flow in kW and net active power flow in kWh and of reactive power flow. All meters shall compensate for applicable line and/or transformer losses in accordance with Good Utility Practice when measurement is made at any location other than the point of interconnection.

(d) The NU Companies reserve the right: (i) to determine metering equipment ownership; (ii) to determine the equipment installation at each point of interconnection; (iii) to require the Transmission Customer to install the equipment -- or -- install the equipment with the Transmission Customer supplying without cost to the NU Companies a suitable place for the installation of such equipment; (iv) to determine other equipment allowed in the metering circuit; (v) to determine metering accuracy requirements; (vi) to determine the responsibilities for operation, maintenance, testing and repair of metering equipment.

(e) The NU Companies shall have access to metering data, including telephone line access, which may reasonably be required to facilitate measurement and billing under this Local Service Schedule. The NU Companies may require the Transmission Customer provide, at its expense, a separate dedicated voice grade telephone circuit for the NU Companies and the Transmission Customer to remotely access each meter. Metering equipment and data shall be accessible at all reasonable hours for purposes of inspection and reading.

(f) All metering equipment shall be tested in accordance with practices of the NU Companies, applicable criteria, rules, standards and operating procedures or upon the request by the NU Companies. If at any time metering equipment fails to register or is determined to be inaccurate, in accordance with the NU Companies' practices and applicable criteria, rules, standards and operating procedures, the Transmission Customer shall make the equipment accurate as soon thereafter as practicable, and the meter readings and rate computation for the period of such inaccuracy, insofar as can reasonably be ascertained, shall be adjusted; provided, however, that no adjustment to charges shall be required for any period exceeding two (2) months prior to the date of the test. Representatives of the NU Companies will be afforded opportunity to witness such tests.

#### 9.0 Network Load

The Transmission Customer shall provide the NU Companies with the actual hourly Network Load for each calendar month by the seventh day of the following calendar month.

#### **10.0 Data Transfer:**

(a) The Transmission Customer shall provide timely, accurate real time information to the NU Companies in order to facilitate performance of its obligations under this Local Service Schedule.

(b) The selection of real time telemetry and data to be received by the NU Companies and the Transmission Customer shall be necessary for safety, reliability, security, economics, and/or monitoring of real-time conditions that affect the NU Transmission System. This telemetry shall include, but is not limited to, loads, line flows (MW and MVAR), voltages, generator output, and status of substation equipment at any of the Transmission Customer's transmission and generation facilities. To the extent that the NU Companies or the Transmission Customer requires data that are not available from existing equipment, the Transmission Customer shall, at its expense and at locations designated by the NU Companies or the Transmission Customer, install any metering equipment, data acquisition equipment, or

other equipment and software necessary for the telemetry to be received by the NU Companies or the Transmission Customer. The NU Companies shall have the right to inspect equipment and software associated with the data transfer in order to assure conformance with Good Utility Practices.

#### **11.0** Maintenance of Equipment

The Transmission Customer shall, on a regular basis in accordance with practices of the NU Companies, applicable criteria, rules, standards and operating procedures or at the request of the NU Companies, and at its expense, test, calibrate, verify and validate the data link, metering equipment, data acquisition equipment, transmission equipment, protective equipment and other equipment or software used to implement the provisions of this Local Service Schedule. The NU Companies shall have the right to inspect such tests, calibrations, verifications and validations of the data link, metering equipment, data acquisition equipment, transmission equipment, protective equipment and other equipment or software used to implement the provisions of this Local Service Schedule. Upon The NU Companies' request, the Transmission Customer will provide the NU System Companies a copy of the installation, test and calibration records of the data link, metering equipment, data acquisition equipment, protective equipment or software. The NU Companies shall, at the Transmission Customer's expense, have the right to monitor the factory acceptance test, the field acceptance test, and the installation of any metering equipment, data acquisition equipment, transmission equipment and other equipment or software used to implement the provisions of the software software used to implement the provisions of the software is equipment.

#### 12.0 Notification

(a) The Transmission Customer shall notify and coordinate with the NU Companies prior to the commencement of any work or maintenance by the Transmission Customer, Network Member, or contractors or agents performing on behalf of either or both, which may directly or indirectly have an adverse effect on the Transmission Customer or The NU Companies' data link, or the reliability of the NU Transmission System. All notifications for scheduled outages of the data link, metering equipment, data acquisition equipment, transmission equipment, protective equipment and other equipment or software must meet the requirements of the ISO and the NU Companies.

#### **13.0** Emergency System Operations

(a) The Transmission Customer, at its expense, shall be subject to all applicable emergency operation standards promulgated by NERC, NPCC, ISO and the NU Companies which may include but not limited to underfrequency relaying equipment, load shedding equipment and voltage reduction equipment.

(b) The NU Companies reserve the right to take whatever actions they deem necessary to preserve the integrity of the NU Companies' Transmission System during emergency operating conditions. If the Local Network Service at the points of interconnection is causing harmful physical effects to the NU Transmission System facilities or to its customers (e.g., harmonics, undervoltage, overvoltage, flicker, voltage variations, etc.), the NU Companies shall promptly notify the Transmission Customer and if the Transmission Customer does not take the appropriate corrective actions immediately, the NU Companies shall have the right to interrupt Local Network Service under this Local Service Schedule in order to alleviate the situation and to suspend all or any portion of Local Network Service under this Local Service Schedule until appropriate corrective action is taken.

(c) In the event of any adverse condition or disturbance on the NU Transmission System or on any other system directly or indirectly interconnected with the NU Transmission System, the NU Companies may, as they deem necessary, take actions or inactions that, in the NU Companies' sole judgment, result in the automatic or manual interruption of Local Network Service in order to: (i) limit the extent or damage of the adverse condition or disturbance; (ii) prevent damage to generating or transmission facilities; (iii) expedite restoration of service; or (iv) preserve public safety.

#### 14.0 Cost Responsibility

- (a) The Transmission Customer shall be responsible for the costs incurred by the Transmission Customer and the NU Companies to implement the provisions of this Local Service Schedule including, but not limited to, engineering, administrative and general expenses, material and labor expenses associated with the specifications, design, review, approval, purchase, installation, maintenance, modification, repair, operation, replacement, checkouts, testing, upgrading, calibration, removal, and relocation of equipment, or software.
- (b) Additionally, the Transmission Customer shall be responsible for all costs incurred by the Transmission Customer and the NU Companies for on-going operation and maintenance of the metering, telecommunications and safety protection facilities and equipment required to implement the provisions of this Local Service Schedule. Such work shall include, but not

limited to, normal and extraordinary engineering, administrative and general expenses, material, and labor expenses associated with the specifications, design, review, approval, purchase, installation, maintenance, modification, repair, operation, replacement, checkouts, testing, upgrading, calibration, removal, or relocation of equipment required to accommodate service under this Local Service Schedule.

## 15.0 Default

The Transmission Customer's failure to implement the terms and conditions of this Network Operating Agreement will be deemed to be a default under this Local Service Schedule and will result in the NU Companies seeking, consistent with FERC rules and regulations, immediate termination of service under this Local Service Schedule.

## 16.0 Regulatory Filings

Nothing contained in this Local Service Schedule or any associated Service Agreement, including this Network Operating Agreement, shall be construed as affecting in any way the right of the NU Companies to unilaterally make application to the Commission for a change in any portion of this Network Operating Agreement under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder.

IN WITNESS WHEREOF, the Parties have caused this Network Operating Agreement to be executed by their respective authorized officials as of the date written.

Date: \_\_\_\_\_

Northeast Utilities Service Company

by:			
•			

its Vice President

Transmission Customer

by: \_\_\_\_\_

its \_\_\_\_\_

## ATTACHMENT NU-H ANNUAL TRANSMISSION REVENUE REQUIREMENTS

#### Attachment NU-H Methodology:

This formula sets forth the method that the NU Companies' will use to determine their annual Total Transmission Revenue Requirements. The Transmission Revenue Requirements reflect the NU Companies' total cost to own, operate and maintain the transmission facilities used for providing Open Access Transmission Service to transmission customers under this Local Service Schedule. The Transmission Revenue Requirements will be an annual formula rate calculation, effective for an initial term commencing on the effective date established by FERC and ending on May 31 of the following year. The calculation will be based on the previous calendar year's FERC Form 1 data, with an estimate of the NU Companies' current year average plant additions, Construction Work in Progress (CWIP), and the Allowance for Funds Used During Construction (AFUDC) regulatory liability account. Plant additions will be multiplied by a fixed charge carrying cost, and CWIP and the AFUDC regulatory liability account will be multiplied by the Cost of Capital. The revenue requirements will be updated thereafter each June 1 based on actual costs from the Service Year. The true-up information will be based on actual data, in lieu of allocated data if specifically identified in the FERC Form 1. For a capital addition whose cost exceeds \$20 million, the NU Companies will make rate base adjustments to estimates and in the true-up process to represent the estimated and actual in-service dates for the capital addition. Specifically, the NU Companies will adjust for transmission plant, CWIP, AFUDC regulatory liability, accumulated depreciation and accumulated deferred taxes.

#### I. Definitions

Capitalized terms not otherwise defined in the Tariff and as used in this formula have the following definitions:

#### A. Allocation Factors

1. <u>Transmission Wages and Salaries Allocation Factor</u> shall equal the ratio of the NU Companies' Transmission-related direct wages and salaries, including those of affiliated companies, to the NU Companies' total direct wages and salaries, including those of affiliated companies, excluding administrative and general wages and salaries. 2. <u>Plant Allocation Factor</u> shall equal the ratio of the sum of total investment in Transmission Plant and Transmission Related General Plant to Total Plant in Service.

B. Terms

<u>Administrative and General Expense</u> shall equal The NU Companies' expenses as recorded in FERC Account Nos. 920-935, excluding FERC Account Nos. 924, 928 and 930.1.

<u>AFUDC Regulatory Liability</u> shall equal the unamortized balance of the capitalized AFUDC booked on the NU Companies' transmission projects as recorded in FERC Account 254 consistent with Commission orders.

<u>Amortization of Loss on Reacquired Debt</u> shall equal the NU Companies' expenses as recorded in FERC Account No. 428.1.

<u>Amortization of Investment Tax Credits</u> shall equal the NU Companies' credits as recorded in FERC Account No. 411.4.

<u>Depreciation Expense for Transmission Plant</u> shall equal The NU Companies' transmission expense as recorded in FERC Account No. 403.

Dispatch Center means CL&P's CONVEX dispatch center.

<u>Dispatch Center Plant</u> shall equal CL&P's gross plant balance for the Dispatch Center as recorded in FERC Account Nos. 350-359 and 389-399.

<u>Dispatch Center Depreciation Expense</u> shall equal the Dispatch Center depreciation expense as recorded in FERC Account No. 403.

<u>Dispatch Center Amortization of Investment Tax Credits</u> shall equal the Dispatch Center amortization of investment tax credits as recorded in FERC Account No. 411.4.

Dispatch Center Accumulated Deferred Income Taxes shall equal the net of the NU Companies' Dispatch Center deferred tax balance as recorded in FERC Account Nos. 281-283 and the NU Companies' Dispatch Center deferred tax balance as recorded in FERC Account No. 190.

<u>Dispatch Center Municipal Tax Expense</u> shall equal the Dispatch Center municipal tax expense as recorded in FERC Account Nos. 408.1 and 409.1.

<u>General Plant</u> shall equal the NU Companies' gross plant balance as recorded in FERC Account Nos. 389-399, less the Dispatch Center general plant.

<u>General Plant Depreciation Expense</u> shall equal the NU Companies' general plant expenses as recorded in FERC Account No. 403.

<u>General Plant Depreciation Reserve</u> shall equal the NU Companies' general plant reserve balance as recorded in FERC Account No. 108 less the portion of such reserve for the Dispatch Center.

<u>Other Regulatory Assets/Liabilities</u> – FAS 106 shall equal the net of the NU Companies' FAS 106 balance as recorded in FERC Account No. 182.3 and any FAS 106 balance as recorded in the NU Companies' FERC Account No. 254.

<u>Other Regulatory Assets/Liabilities</u> – FAS 109 shall equal the net of the NU Companies' FAS 109 balance in FERC Account No. 182.3 and any FAS 109 balance as recorded in the NU Companies' FERC Account No. 254.

<u>Payroll Taxes</u> shall equal those payroll expenses as recorded in the NU Companies' FERC Account Nos. 408.1 and 409.1.

Plant Held for Future Use shall equal the NU Companies' balance in FERC Account No. 105.

Prepayments shall equal the NU Companies' prepayment balance as recorded in FERC Account No. 165.

Property Insurance shall equal the NU Companies' expenses as recorded in FERC Account No. 924.

<u>Total Accumulated Deferred Income Taxes</u> shall equal the net of the NU Companies' deferred tax balance as recorded in FERC Account Nos. 281-283 and the NU Companies' deferred tax balance as recorded in FERC Account No. 190.

<u>Total Loss on Reacquired Debt</u> shall equal the NU Companies' expenses as recorded in FERC Account 189.

<u>Total Municipal Tax Expense</u> shall equal the NU Companies' expenses as recorded in FERC Account Nos. 408.1, 409.1.

<u>Total Plant in Service</u> shall equal the NU Companies' total gross plant balance as recorded in FERC Account Nos. 301-399.

<u>Total Transmission Depreciation Reserve</u> shall equal the NU Companies' Transmission reserve balance as recorded in FERC Account 108 less the portion of such reserve for the Dispatch Center.

<u>Transmission Operation and Maintenance Expense</u> shall equal the NU Companies' expenses as recorded in FERC Account Nos. 560, 561.5 – 561.8, 562-564 and 566-576.5 and shall exclude all HQ HVDC expenses booked to accounts 560 through 576.5 and expenses already included in Transmission Support Expense, as described in Section I below, that are included in FERC Account Nos. 560-576.5.

<u>Transmission Plant</u> shall equal the NU Companies' gross plant balance as recorded in FERC Account Nos. 350-359, less Dispatch Center transmission plant.

<u>Transmission Plant Materials and Supplies</u> shall equal the NU Companies' balance as assigned to transmission, as recorded in FERC Account 154.

<u>Transmission Related Construction Work in Progress</u> shall equal the NU Companies' investment in Transmission-related projects as recorded in FERC Account 107 consistent with commission orders.

II. Calculation of Transmission Revenue Requirements

The Transmission Revenue Requirement shall equal the sum of the NU Companies' (A) Return and Associated Income Taxes, (B) Transmission Depreciation Expense, (C) Transmission Related Amortization of Loss on Reacquired Debt, (D) Transmission Related Amortization of Investment Tax Credits, (E) Transmission Related Municipal Tax Expense, (F) Transmission Related Payroll Tax Expense, (G) Transmission Operation and Maintenance Expense, (H) Transmission Related Administrative and General Expense (I) Transmission Support Expense, and(J) Transmission Related Taxes and Fees Charge.

A. <u>Return and Associated Income Taxes</u> shall equal the product of the Transmission Investment Base and the Cost of Capital Rate.

# 1. Transmission Investment Base

The Transmission Investment Base will be the average balances of (a) Transmission Plant, plus (b) Transmission Related General Plant, plus (c) Transmission Plant Held for Future Use, plus (d) Transmission Related Construction Work in Progress, less (e) Transmission Related Depreciation Reserve, less (f) Transmission Related Accumulated Deferred Taxes, plus (g) Transmission Related Loss on Reacquired Debt, plus (h) Other Regulatory Assets/Liabilities, less (i) AFUDC Regulatory Liability, plus (j) Transmission Prepayments, plus (k) Transmission Materials and Supplies, plus (l) Transmission Related Cash Working Capital.

- (a) <u>Transmission Plant</u> will equal the balance of the NU Companies' investment in Transmission Plant.
- (b) <u>Transmission Related General Plant</u> shall equal the NU Companies' balance of investment in General Plant multiplied by the Transmission Wages and Salaries Allocation Factor.
- (c) <u>Transmission Plant Held for Future Use</u> shall equal the balance of Transmission Plant Held for Future Use.
- (d) <u>Transmission Related Construction Work in Progress</u> shall equal the portion of the NU Companies' investment in Transmission-related projects as recorded in FERC Account 107 consistent with Commission orders.
- (e) <u>Transmission Related Depreciation Reserve</u> shall equal the balance of Total Transmission Depreciation Reserve, plus the balance of Transmission Related General Plant Depreciation Reserve. Transmission Related General Plant Depreciation Reserve shall

equal the product of General Plant Depreciation Reserve and the Transmission Wages and Salaries Allocation Factor.

- (f) <u>Transmission Accumulated Deferred Taxes</u> shall equal the NU Companies' electric balance of Total Accumulated Deferred Income Taxes multiplied by the Plant Allocation Factor, less the transmission and general plant components of Dispatch Center Accumulated Deferred Income Taxes.
- (g) <u>Transmission Related Loss on Reacquired Debt</u> shall equal the NU Companies' electric balance of Total Loss on Reacquired Debt multiplied by the Plant Allocation Factor.
- (h) <u>Other Regulatory Assets/Liabilities</u> shall equal the NU Companies' electric balance of any deferred rate recovery of FAS 106 expense multiplied by the Transmission Wages and Salaries Allocation Factor, plus the NU Companies' electric balance of FAS 109 multiplied by the Plant Allocation Factor.
- (i) <u>AFUDC Regulatory Liability</u> shall equal the unamortized balance of the capitalized AFUDC booked on the NU Companies' transmission projects as recorded in FERC Account 254 consistent with Commission orders.
- (j) <u>Transmission Prepayments</u> shall equal the NU Companies' electric balance of Prepayments multiplied by the Transmission Wages and Salaries Allocation Factor.
- (k) <u>Transmission</u> Materials and Supplies shall equal the NU Companies' electric balance of Transmission Plant Materials and Supplies.
- <u>Transmission Related Cash Working Capital</u> shall be a 12.5% allowance (45 days/360 days) of Transmission Operation and Maintenance Expense and Transmission Related Administrative and General Expense.

# 2. Cost of Capital Rate

The Cost of Capital Rate will equal (a) the NU Companies' Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.

- (a) <u>The Weighted Cost of Capital</u> will be calculated based upon the capital structure at the end of each year and will equal the sum of:
- (i) <u>the long term debt component</u>, which equals the product of the actual weighted average embedded cost to maturity of the NU Companies' long-term debt then outstanding and the ratio that long-term debt is to the NU Companies' total capital.
- (ii) <u>the preferred stock component</u>, which equals the product of the actual weighted average embedded cost to maturity of the NU Companies' preferred stock then outstanding and the ratio that preferred stock is to the NU Companies' total capital.
- (iii) <u>the return on equity component</u>, shall equal the product of Northeast Utilities' return on equity ("ROE") of 10.57% and the ratio that common equity is to Northeast Utilities' total capital.
- (b) Federal Income Tax shall equal

[(A+[(C+B)/D]x (FT)] divided by (1-FT)]

where FT is the Federal Income Tax Rate and A is the sum of the preferred stock component and the return on equity component, as determined in Sections II.A.2.(a)(ii) and (iii) above, B is Transmission Related Amortization of Investment Tax Credits, as determined in Section II.D., below, C is the Equity AFUDC component of Transmission Depreciation Expense, as defined in Section II.B., and D is Transmission Investment Base, as Determined in II.A.1., above.

- (c) State Income Tax shall equal
- [A+[(C+B)/D] + Federal Income Tax)x(ST)] divided by (1-ST)

where ST is the State Income Tax Rate, A is the sum of the preferred stock component and return on equity component determined in Sections II.A.2.(a)(ii) and (iii) above, B is the Amortization of Investment Tax Credits as determined in Section II.D. below, C is the equity AFUDC component of Transmission Depreciation Expense, as defined in Section II.B., D is the Transmission Investment Base, as determined in II.A.1., above and Federal Income Tax is the rate determined in Section II.A.2.(b) above.

B. <u>Transmission Depreciation Expense</u> shall equal the sum of Depreciation Expense for Transmission Plant, plus an allocation of General Plant Deprecation Expense calculated by multiplying General Plant Depreciation Expense by the Transmission Wages and Salaries Allocation Factor, less the amortization of AFUDC Regulatory Credit as recorded in Account 407.4, less the transmission plant and general plant components of Dispatch Center Depreciation Expense.

C. <u>Transmission Related Amortization of Loss on Reacquired Debt</u> shall equal the NU Companies' electric Amortization of Loss on Reacquired Debt multiplied by the Plant Allocation Factor.

D. <u>Transmission Related Amortization of Investment Tax Credits</u> shall equal the NU Companies' electric Amortization of Investment Tax Credits multiplied by the Plant Allocation Factor less the transmission plant and general plant components of Dispatch Center Amortization of Investment Tax Credits.

E. <u>Transmission Related Municipal Tax Expense</u> shall equal the NU Companies' electric Total Municipal Tax Expense multiplied by the Plant Allocation Factor, less the transmission plant and general plant components of Dispatch Center Municipal Tax Expense.

F. <u>Transmission Related Payroll Tax Expense</u> shall equal the NU Companies' electric Payroll Tax expense, multiplied by the Transmission Wages and Salaries Allocation Factor.

G. <u>Transmission Operation and Maintenance Expense</u> shall equal Transmission Operation and Maintenance Expenses.

H. <u>Transmission Related Administrative and General Expenses</u> shall equal the sum of (1) the NU Companies' Administrative and General Expenses multiplied by the Transmission Wages and Salaries Allocation Factor, (2) Property Insurance multiplied by the Transmission Plant Allocation Factor, (3) Expenses included in Account 928 related to FERC Assessments multiplied by the Plant Allocation Factor, plus any other Federal and State transmission related expenses or assessments in Account 928 plus specific transmission related expenses included in Account 930.1 and, (4) specific transmission related public education expenses included in Account 426.54.

I. <u>Transmission Support Expense</u> shall equal the expense paid by the NU Companies' for transmission support.

J. <u>Transmission Related Taxes and Fees Charge</u> shall include any fee or assessment imposed by any governmental authority on service provided under this Local Service Schedule that is not specifically identified under any other section of this Local Service Schedule.

# ATTACHMENT NU-I ANNUAL LOCALIZED TRANSMISSION REVENUE REQUIREMENT

#### Attachment NU-I Methodology

This formula sets forth the method that the NU Companies will use to determine their annual total revenue requirements for each Localized Facility ("Localized Transmission Revenue Requirement"). Subsequent references in this formula to "Localized Facility" and "Localized Transmission Revenue Requirement" refer to the Localized Facility and Localized Facility Revenue Requirement for each individual Localized Transmission Project. Each Localized Facility is identified in Section 16.3.

The Localized Transmission Revenue Requirement will be calculated for an initial term for a Localized Facility commencing on the date of the New England System Operator's Schedule 12C cost allocation determination for the Localized Facility and ending on the May 31<sup>st</sup> following the date approved by the Commission for including the costs of the Localized Facilities in this Attachment NU-I ("Initial Term"), and continuing thereafter for successive 12 month periods commencing each June 1st ("Rate Year"). The Localized Transmission Revenue Requirement for the Initial Term for a Localized Facility will be calculated based on the estimated cost of the Localized Facilities for such period, and will be charged to customers in equal monthly installments beginning on the date permitted by the Commission, and continuing through the end of the Initial Term. The Localized Transmission Revenue Requirement for the appropriate calendar year by June 30th of the succeeding year(s) based on actual costs for the Initial Term.

The Localized Transmission Revenue Requirement for a Localized Transmission Project for a Rate Year commencing after the Initial Term (and for succeeding Rate Years) will be an annual calculation based on the previous calendar year's Localized Transmission Revenue Requirements, plus the forecasted revenue requirements of Localized Facilities to be placed in service in the upcoming Rate Year. Each June 30th,

the Localized Transmission Revenue Requirement in effect during the portion of the Rate Year that occurred in the previous calendar year will be trued-up based on actual costs from such previous calendar year.

The true-up information will be based on actual data, in lieu of allocated data if specifically identified in the FERC Form 1, or based on allocated data if such specific information is not identified. For a capital addition whose cost exceeds \$20 million, the NU Companies will make rate base adjustments to estimates and in the true-up process to represent the estimated and actual in-service dates for the capital addition. Specifically, the NU Companies will adjust for transmission plant, accumulated depreciation and accumulated deferred taxes.

The Localized Transmission Revenue Requirement for the NU Companies that is based on data for calendar year 2004 or later shall include a Localized Incremental Return and Associated Income Taxes on the NU Companies' Localized PTF transmission plant investments placed in-service on or after January 1, 2004 (such investments referred to herein as "Localized Post-2003 PTF Investment"). The Localized Incremental Return and Associated Income Taxes for Localized Post-2003 Investment shall incorporate an incentive ROE adder of 100 basis points for plant investments placed in service by December 31, 2008 or as otherwise permitted in Docket Nos. ER04-157 et al. for any projects included in the Regional System Plan ("RSP"), and shall incorporate any incentive ROE adder approved by the FERC under Order No. 679 for other plant investments. The total ROE for any project, including any authorized ROE incentives for Post-2003 PTF Investment and any other incentive ROE approved by FERC under Order No. 679 shall be capped by the top of the applicable zone of reasonableness determined by FERC for the relevant period. The data used in determining the NU Companies' Localized Incremental Return and Associated Taxes for Localized Post-2003 Investment shall be based on actual data in lieu of allocated data if specifically identified in the NU Companies' accounting records.

I. Definitions

Capitalized terms not otherwise defined in the Tariff and as used in this formula have the following definitions:

A. Allocation Factors

1. <u>Localized Transmission Allocation Factor</u> shall equal the ratio of Localized Transmission Plant in Service to total investment in Transmission Plant.

2. <u>Total Localized Plant Allocation Factor</u> shall equal the ratio of Localized Transmission Plant in Service to Total Plant in Service.

3. <u>Transmission Wages and Salaries Allocation Factor</u> shall equal the ratio of the NU Companies' Transmission-related direct wages and salaries, including those of affiliated companies, to the NU Companies' total direct wages and salaries, including those of affiliated companies, and excluding administrative and general wages and salaries.

B. Terms

<u>Administrative and General Expense</u> shall equal the NU Companies' expenses as recorded in FERC Account Nos. 920-935, excluding FERC Account Nos. 924, 928 and 930.1.

<u>Amortization of Loss on Reacquired Debt</u> shall equal the NU Companies' expenses as recorded in FERC Account No. 428.1.

<u>Amortization of Investment Tax Credits</u> shall equal the NU Companies' expenses as recorded in FERC Account No. 411.4.

<u>Depreciation Expense for Localized Transmission Plant</u> shall equal the NU Companies' Localized Facilities expenses as recorded in FERC Account No. 403.

Dispatch Center means CL&P's CONVEX dispatch center.

<u>Dispatch Center Plant</u> shall equal CL&P's gross plant balance for the Dispatch Center as recorded in FERC Account Nos. 350-359 and 389-399.

<u>General Plant</u> shall equal the NU Companies' gross plant balance as recorded in FERC Account Nos. 389-399 less Dispatch Center general plant.

<u>General Plant Depreciation Expense</u> shall equal the NU Companies' general plant expenses as recorded in FERC Account No. 403 less the portion of such expense for the Dispatch Center.

<u>General Plant Depreciation Reserve</u> shall equal the NU Companies' general plant reserve balance as recorded in FERC Account No. 108 less the portion of such reserve for the Dispatch Center.

<u>Payroll Taxes</u> shall equal those payroll expenses as recorded in NU Companies' FERC Account Nos. 408.1 and 409.1.

Prepayments shall equal the NU Companies' prepayment balance as recorded in FERC Account No. 165.

Property Insurance shall equal the NU Companies' expenses as recorded in FERC Account No. 924.

<u>Total Accumulated Deferred Income Taxes</u> shall equal the net of the NU Companies' deferred tax balance as recorded in FERC Account Nos. 281-283 and NU Companies' deferred tax balance as recorded in FERC Account No. 190.

<u>Total Loss on Reacquired Debt</u> shall equal the NU Companies' expenses as recorded in FERC Account 189.

<u>Total Municipal Tax Expense</u> shall equal the NU Companies' expenses as recorded in FERC Account Nos. 408.1, 409.1.

<u>Localized Transmission Plant in Service</u> shall equal the NU Companies' Localized Facilities gross plant balance as recorded in FERC Account Nos. 350-359.

Localized Transmission Plant Held for Future Use shall equal the NU Companies' Localized Facilities balance as recorded in FERC Account 105.

<u>Localized Transmission Depreciation Reserve</u> shall equal the NU Companies' Localized Facilities reserve balance as recorded in FERC Account 108.

<u>Transmission Operation and Maintenance Expense</u> shall equal NU Companies' expenses as recorded in FERC Account Nos. 560, 561.5 – 561.8, 562-564 and 566-576.5 and shall exclude all HQ HVDC expenses booked to accounts 560 through 576.5 and expenses already included in Transmission Support Expense, as described in Section I below, which are included in FERC Account Nos. 560-576.5.

<u>Transmission Plant</u> shall equal the NU Companies' gross plant balance as recorded in FERC Account Nos. 350-359.

<u>Transmission Plant Materials and Supplies</u> shall equal the NU Companies' balance as assigned to transmission, as recorded in FERC Account 154.

<u>Total Plant in Service</u> shall equal the NU Companies' total gross plant balance as recorded in FERC Account Nos. 301-399.

II. Calculation of Localized Transmission Revenue Requirements

The Localized Transmission Revenue Requirements shall equal the sum of the NU Companies' (A) Localized Return and Associated Income Taxes (including the Incremental Return and Associated Income Taxes for Post-2003 PTF Investment), (B) Localized Transmission Depreciation Expense, (C) Localized Transmission Related Amortization of Loss on Reacquired Debt, (D) Localized Transmission Related Amortization of Investment Tax Credits, (E) Localized Transmission Related Municipal Tax Expense, (F) Localized Transmission Related Payroll Tax Expense, (G) Localized Transmission Operation and Maintenance Expense, (H) Localized Transmission Related Administrative and General Expense , (I) Localized Transmission Support Expense, and (J) Localized Transmission Related Taxes and Fees Charge. The Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment for the NU Companies shall be calculated using the investment base components specifically identified in Section A.1 of the formula below.

A. <u>Localized Return and Associated Income Taxes</u> shall equal the product of the Localized Transmission Investment Base and the Cost of Capital Rate. To calculate the Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment, Localized Transmission Plant will only include Sections II.A.1.(a), (c), and (d), in the manner indicated.

#### 1. Localized Transmission Investment Base

The Localized Transmission Investment Base will be the average balances of (a) Localized Transmission Plant, plus (b) Localized Transmission Plant Held for Future Use less (c) Localized Transmission Related Depreciation Reserve, less (d) Localized Transmission Related Accumulated Deferred Taxes, plus (e) Localized Transmission Related Loss of Reacquired Debt, plus (f) Localized Transmission Prepayments, plus (g) Localized Transmission Materials and Supplies, plus (h) Localized Transmission Related Cash Working Capital.

(a) <u>Localized Transmission Plant</u> will equal the balance of (1) the NU Companies' investment in Localized Transmission Plant plus, (2) the NU Companies' balance of investment in General Plant multiplied by the Transmission Wages and Salaries Allocation Factor, further multiplied by the Localized Transmission Allocation Factor. In order to calculate the Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment, Localized Post-2003 PTF Transmission Plant shall be separately identified.

(b) <u>Localized Transmission Plant Held for Future Use</u> shall equal the NU Companies' balance of Localized Transmission Plant Held for Future Use.

(c) Localized Transmission Related Depreciation Reserve shall equal the balance of Localized Transmission Depreciation Reserve plus the balance of Localized Transmission Related General Plant Depreciation Reserve. Localized Transmission Related General Plant Depreciation Reserve shall equal the product of General Plant Depreciation Reserve and the Transmission Wages and Salaries Allocation Factor, further multiplied by the Localized Transmission Allocation Factor. In order to calculate the Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment, Localized Transmission Related Depreciation Reserve associated with Localized Post-2003 PTF Investment shall equal the NU Companies' balance of Localized Transmission Depreciation Reserve.

(d) <u>Localized Transmission Related Accumulated Deferred Taxes</u> shall equal the NU Companies' electric balance of Total Accumulated Deferred Income Taxes, multiplied by the Total Localized Plant Allocation Factor. To calculate the Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment, Localized Transmission Related Accumulated Deferred Taxes associated with Localized Post-2003 PTF Investment shall equal the NU Companies' electric balance of Total Accumulated Deferred Income Taxes multiplied by the Total Localized Plant Allocation Factor.

(e) <u>Localized Related Loss on Reacquired Debt</u> shall equal the NU Companies' electric balance of Total Loss on Reacquired Debt multiplied by the Total Localized Plant Allocation Factor.

(f) <u>Localized Transmission Prepayments</u> shall equal the NU Companies' electric balance of Prepayments multiplied by the Transmission Wages and Salaries Allocation Factor and further multiplied by the Localized Transmission Allocation Factor.

(g) <u>Localized Transmission Materials and Supplies</u> shall equal the NU Companies' electric balance of Transmission Plant Materials and Supplies multiplied by the Localized Transmission Allocation Factor.

(h) <u>Localized Transmission Related Cash Working Capital</u> shall be a 12.5% allowance (45 days/360 days) of (i) Localized Transmission Operation and Maintenance Expense, plus (ii) Localized Administrative and General Expense.

# 2. Cost of Capital Rate

The Cost of Capital Rate will equal (a) the NU Companies' Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.

(a) <u>The Weighted Cost of Capital</u> will be calculated based upon the average capital structure and will equal the sum of:

(i) <u>the long term debt component</u>, which equals the product of the actual weighted average embedded cost to maturity of the NU Companies' long-term debt then outstanding and the ratio that long-term debt is to the NU Companies' total capital. (ii) <u>the preferred stock component</u>, which equals the product of the actual weighted average embedded cost to maturity of the NU Companies' preferred stock then outstanding and the ratio that preferred stock is to the NU Companies' total capital.

(iii) <u>the return on equity component</u> shall equal the product of the NU Companies' return on equity ("ROE") of 11.07% and the ratio that common equity is to the NU Companies' total capital. In order to calculate the Localized Incremental Return and Associated Taxes for Post-2003 PTF Investment, the Localized Incremental Return on Equity shall be the product of (1) the NU Companies' incremental return on equity of 1% for transmission plant investments associated with projects included in the RSP and placed in service by December 31, 2008 or otherwise permitted in Docket Nos. ER04-157 et al., and (2) any ROE incentive adder approved by the FERC under Order No. 679 for other transmission plant investments, provided that the total ROE for any project, including any such ROE incentives, shall be capped by the top of the applicable zone of reasonableness determined by FERC for the relevant period; and (3) the ratio of that common equity to total capital.<sup>1</sup>

#### (b) <u>Federal Income Tax</u> shall equal

#### $[(A+[(C+B)/D]) \times (FT)]$ divided by (1-FT)

where FT is the Federal Income Tax Rate and A is the sum of the preferred stock component and the return on equity component, as determined in Sections II.A.2.(a)(ii) and (iii) above, B is Localized Transmission Related Amortization of Investment Tax Credits, as determined in Section II.D., below, C is the Equity AFUDC component of Localized Transmission Depreciation Expense, as defined in Section II.B., and D is Localized Transmission Investment Base, as Determined in II.A.1., above.

<sup>1</sup> FERC Form-730 contains a list of transmission projects for which FERC has granted incentives under Order No. 679.

(c) <u>State Income Tax</u> Shall equal:

[(A+[(C+B)/D] + Federal Income Tax) x (ST)] divided by (1-ST)

where ST is the State Income Tax Rate, A is the sum of the preferred stock component and return on equity component determined in Sections II.A.2.(a)(ii) and (iii) above, B is the

Localized Transmission Related Amortization of Investment Tax Credits as determined in Section II.D. below, C is the equity AFUDC component of Localized Transmission Depreciation Expense, as defined in Section II.B., D is the Localized Transmission Investment Base, as determined in II.A.1. above and Federal Income Tax is the rate determined in Section II.A.2.(b) above.

B. <u>Localized Transmission Depreciation Expense</u> shall equal the sum of Depreciation Expense for Localized Transmission Plant, plus an allocation of General Plant Deprecation Expense calculated by multiplying General Plant Depreciation Expense by the Transmission Wages and Salaries Allocation Factor and further multiplied by the Localized Transmission Allocation Factor.

C. <u>Localized Transmission Related Amortization of Loss on Reacquired Debt</u> shall equal the NU Companies' electric Amortization of Loss on Reacquired Debt multiplied by the Total Localized Plant Allocation Factor.

D. <u>Localized Transmission Related Amortization of Investment Tax Credits</u> shall equal the NU Companies' electric Amortization of Investment Tax Credits multiplied by the Total Localized Plant Allocation Factor.

E. <u>Localized Transmission Related Municipal Tax Expense</u> shall equal the NU Companies' Total Municipal Tax Expense multiplied by the Total Localized Plant Allocation Factor.

F. <u>Localized Transmission Related Payroll Tax Expense</u> shall equal the NU Companies' electric Payroll Taxes expense, multiplied by the Transmission Wages and Salaries Allocation Factor, and further multiplied by the Localized Transmission Allocation Factor. G. <u>Localized Transmission Operation and Maintenance Expense</u> shall equal the NU Companies' Transmission Operation and Maintenance Expense multiplied by the Localized Transmission Allocation Factor.

H. Localized Transmission Related Administrative and General Expense shall equal the sum of (1) the NU Companies' Administrative and General Expense multiplied by the Transmission Wages and Salaries Allocation Factor and further multiplied by the Localized Transmission Allocation Factor, (2) Property Insurance multiplied by the Total Localized Plant Allocation Factor, (3) Expenses included in Account 928 related to FERC Assessments multiplied by the Total Localized Plant Allocation Factor, (4) Federal and State transmission related expenses or assessments in Account 928 multiplied by the Localized Transmission related expenses included in Account No. 930.1, multiplied by the Localized Transmission Allocation Factor, and (6) specific Localized Facility related public education expenses included in Account 426.54.

I. <u>Transmission Support Expense</u> shall equal the expense paid by the NU Companies' for transmission support for Localized Facilities.

J. <u>Transmission Related Taxes and Fees Charge</u> shall include any fee or assessment imposed by any governmental authority on transmission service provided under this Local Service Schedule that is not specifically identified under any other section of this Local Service Schedule, multiplied by the Localized Transmission Allocation Factor.

# SCHEDULE 21-NU ATTACHMENT NU-L Creditworthiness Procedures

# 1. General Information

All customers taking any service under Schedule 21-NU, the Local Service Schedule ("LSS"), and the associated schedules of The Connecticut Light and Power Company, Western Massachusetts Electric Company, and Public Service Company of New Hampshire (the "NU Companies") must meet the terms of this Attachment NU-L.

#### 2. Establishing Creditworthiness

a) Each customer's creditworthiness must be established before receiving transmission services from the NU Companies. A customer will be evaluated at the time that its application for transmission service is provided to the NU Companies based on the creditworthiness information required under this Attachment NU-L. The NU Companies shall conduct a credit review of each Transmission Customer not less than annually or upon reasonable request by the Transmission Customer.

**b**) The NU Companies will review the customer's creditworthiness information for completeness and will notify the customer if additional information is required.

c) Upon completion of a creditworthiness evaluation of a customer, the NU Companies will forward a written evaluation to the customer if they determine that Financial Assurance must be provided.

# 3. Financial Information

Customers requesting transmission service must submit if available the following:

a) All current rating agency reports of the customer from Standard and Poor's ("S&P"), Moody's Investors Service ("Moody's"), and/or Fitch Ratings ("Fitch").

**b**) A Management Discussion and Analysis ("MD&A") along with audited financial statements provided by an independent registered public accounting firm or a registered

independent auditor for the three (3) most recent fiscal years, or the period of the customer's existence, if shorter than three (3) years.

# 4. Creditworthiness – Qualification for Unsecured Credit

a) A customer may receive unsecured credit from the NU Companies equivalent to three (3) months of the transmission charges. The customer must meet at least one of the following criteria:

- (i) If rated, the customer's lowest rating from the three rating agencies on its senior unsecured long-term debt; or if the customer does not have such a rating, then one rating level below the rating then assigned to the customer's corporate credit rating, as follows:
- 1. a Standard and Poor's or Fitch rating of at least BBB, or
- 2. a Moody's rating of least Baa2.
- (ii) If un-rated or if rated below BBB/Baa2, as described in 4(a)(i) above, the customer must meet all of the following creditworthiness criteria for the three (3) most recent fiscal years:
- A Capitalization Ratio (Debt divided by the sum of shareholders' equity and Debt) of no more than 60 percent Debt, where "Debt" is defined as the sum of all long-term and short-term debt, preferred securities and capital leases. Each of which is recorded in accordance with generally accepted accounting principles;
- 2. Earnings before interest, taxes, depreciation and amortization ("EBITDA") in the most recent fiscal quarter divided by interest expense (ratio of EBITDA-to-interest expense of at least three (3) times); and
- 3. Audited Financial Statements with an unqualified auditor opinion.

**b**) If the customer relies on the creditworthiness of a parent company, the parent company must satisfy the ratings criteria in Section 4(a) above, and must provide to the NU Companies a

written guarantee that it will be unconditionally responsible for all financial obligations associated with the customer's receipt of transmission service from the NU Companies.

c) If the customer or the customer's parent company do not qualify for unsecured credit under Sections 4(a) or (b) above, the customer can still qualify for unsecured credit equivalent to three (3) months of transmission service charges, if:

- the customer has, on a rolling basis, 12 consecutive months of payments to the NU
   Companies with no missed, late or defaults in payment; or
- (ii) the customer has an executed long-term contract for the sale of the full output (energy and capacity) of its generating unit and either has executed a corresponding service transmission service agreement under Schedule 21-NU for the transmission of that output or the execution of such agreement is pending the customer's demonstration of creditworthiness.

#### 5. Financial Assurance

If the customer does not meet the applicable requirements for unsecured credit set out in Section 4 then the customer must either:

a) pay in advance an amount equal to the lesser of the total charge for transmission service not less than five (5) days in advance of the commencement of service, in which case the NU Companies will pay to the customer interest on the amounts not yet due to the NU Companies, computed in accordance with 18 C.F.R. §35.19(a)(2)(iii) of the Commission's Regulations; or

**b**) obtain Financial Assurance in the form of a letter of credit or a parent guarantee equal to the equivalent of three (3) months of transmission service charges prior to receiving service.

(i) The letter of credit must be one or more irrevocable, transferable standby letters of credit issued by a United States commercial bank or a United States branch of a foreign bank provided that such customer is not an affiliate of such bank. The issuing bank must have a credit rating of at least A2 from Moody's or an A rating from S&P or Fitch, or an equivalent credit rating by another nationally recognized rating service reasonably acceptable to the NU Companies, provided that such bank shall have assets totaling not less than ten billion dollars (\$10,000,000,000). All costs of the letter of credit shall be borne by the applicant for such letter of credit. In the event of an inconsistency in the ratings by Moody's, S&P, or Fitch, a "split rating", the lowest credit rating shall apply.

(ii) If the credit rating of a bank or other financial institution issuing a letter of credit to a customer falls below the levels specified in Section 5(b)(i) above, the customer shall have three (3) business days to obtain a suitable letter of credit from another bank or other financial institution that meets the specified levels unless the NU Companies agree in writing to extend such period.

#### 6. Notifications

Each customer must inform the NU Companies in writing within three (3) business days of any material change in its or its letter of credit issuer's financial condition, and if the customer qualifies under Section 4(b), that of its parent company. A material change in financial condition may include, without limitation, the following:

- a) change in ownership by way of a merger, acquisition, or substantial sale of assets;
- **b**) downgrade by a recognized major financial rating agency;
- c) placement on credit watch with negative implications by a major financial rating agency;
- d) a bankruptcy filing by the customer or parent;
- e) any action requiring the filing of a SEC Form 8-K;
- f) declaration of or acknowledgement of insolvency;
- g) report of a significant quarterly loss or decline in earnings;
- **h**) resignation of key officer(s); or
- i) issuance of a regulatory order and/or the filing of a lawsuit that could materially adversely impact current or future financial results.

#### 7. Ongoing Financial Review

Each customer is required to submit to the NU Companies annually or when issued, as applicable:

- a) current rating agency reports;
- **b**) audited financial statements from an independent registered public accounting firm or a registered independent auditor; and
- c) SEC Forms 10-K and 8-K, promptly upon their filing.

#### 8. Change in Creditworthiness Status

A customer who has been extended unsecured credit pursuant to Section 4, must comply with the terms of Financial Assurance in Section 5, if one or more of the following conditions apply:

- a) the customer no longer meets the applicable criteria for unsecured credit in Section 4;
- b) the customer exceeds the amount of unsecured credit extended by the NU Companies, in which case Financial Assurance equal to the amount of exceeded unsecured credit must be provided within five (5) business days; or
- c) the customer has missed two or more payments for any of the transmission services provided by the NU Companies in the last twelve (12) months.

# 9. Procedures for Changes in Credit Levels and Collateral Requirements

- a) The NU Companies shall issue notice to a customer of any changes to the approved credit levels and/or collateral requirements within five (5) business days after (1) receiving notification of any material changes in financial condition under Section 6 above; (2) receiving the information required for the customer's ongoing financial review listed in Section 7 above; or (3) the occurrence of any of the events leading to a change in creditworthiness requirements listed in Section 8 above.
- b) A customer may submit a written request that the NU Companies provide an explanation of the reasons for the changes in credit levels and/or collateral requirements within five (5) business days after receiving notification of the changes. The NU Companies will provide a written response within five (5) business days after receiving such a request.

# **10.** Contesting Creditworthiness Determinations

A customer may contest the NU Companies' determination of its creditworthiness by submitting a written request for re-evaluation within 20 calendar days of being notified of the creditworthiness determination. The request should provide information supporting the basis for a re-evaluation of the customer's creditworthiness. The NU Companies will review the request and respond within 20 calendar days of receipt.

# **11.** Process for Changing Credit Requirements

- a) In the event the NU Companies plan to revise the Schedule 21-NU requirements for credit levels or collateral requirements described in this Attachment NU-L, they will make a filing under Section 205 of the Federal Power Act.
- **b**) The NU Companies shall provide written notification to ISO-NE and stakeholders of any filing described above, at least 30 days in advance of such filing.
- c) Filing notifications shall include a detailed description of the filing, including a redlined document containing revised changes(s) to this Attachment NU-L.
- d) The NU Companies shall consult with interested stakeholders upon request.
- Following Commission acceptance of such filing and upon the effective date, the NU
   Companies shall revise their Attachment NU-L an updated version of Schedule 21-NU
   shall be posed to the ISO-NE web site.
- f) When the NU Companies change their credit requirements for service under Schedule 21-NU, the customer is responsible for forwarding updated financial information to the NU Companies. The customer must indicate whether the change affects its ability to meet the requirements of Attachment NU-L. In cases where the customer's credit status has changed, the customer must take the necessary steps to comply with the revised credit requirements of Attachment NU-L by the effective date of the change.

# 12. Suspension of Service

The NU Companies may immediately suspend service (with notification to the Commission) to a customer, and may initiate proceedings with the Commission to terminate service, if the customer does not meet the terms described in Sections 4 through 8 at any time during the term of service or if the customer's payment obligations to the NU Companies exceed the amount of unsecured or secured credit to which it is entitled under this Attachment NU-L. A customer is not obligated to pay for transmission service that is not provided as a result of a suspension of service.

# **SCHEDULE 21 - UES**

UNITIL ENERGY SYSTEMS, INC. LOCAL SERVICE SCHEDULE

# **SCHEDULE 21-UES**

# Unitil Energy Systems, Inc. Local Service Schedule

# I. COMMON SERVICE PROVISIONS

Unitil Energy Systems, Inc. ("UES") is a participant in the New England Control Area and has agreed to provide transmission and ancillary services over PTF pursuant to the Tariff. The services provided under this Schedule 21-UES apply only to Non-PTF, except in the case of service to Network Customers that have all or part of their Network Load directly connected to the PTF in the Local Network. These Network Customers shall pay for Local Network Service pursuant to Attachment H to this Schedule 21-UES. Provisions of this Schedule 21-UES shall have priority over any conflicting provisions in the Tariff.

# 1 Definitions

**1.0 Annual Transmission Costs**: The total annual cost of the Local Network for purposes of Local Network Service shall be the amount specified in Attachment H until amended by UES or modified by the Commission.

**1.1 Curtailment**: A reduction in firm or non-firm transmission service in response to a transmission capacity shortage as a result of system reliability conditions.

**1.2** Load Ratio Share: Ratio of a Transmission Customer's Network Load to UES's total load computed in accordance with Sections II.10 and II.10(a) of this Schedule under Sections Supplementing Schedule 21 of the OATT and calculated on a rolling twelve month basis.

**1.3.1** Local Network: The transmission facilities owned, controlled, or operated by UES that are used to provide transmission service under Schedule 21 of the OATT.

**1.4** Local Network Service (LNS): The transmission service provided under Schedule 21 of the OATT and this Schedule.

**1.5** Network Load: The load that a Network Customer designates for Local Network

Service under Schedule 21 of the OATT. The Network Customer's Network Load shall include all load served by the output of any Network Resources designated by the Network Customer. A Network Customer may elect to designate less than its total load as Network Load but may not designate only part of the load at a discrete Point of Delivery. Where a Eligible Customer has elected not to designate a particular load at discrete points of delivery as Network Load, the Eligible Customer is responsible for making separate arrangements under Schedule 21 of the OATT for any Local Point-To-Point Service that may be necessary for such non-designated load.

**1.6** Network Upgrades: Modifications or additions to transmission-related facilities that are integrated with and support the UES's overall Local Network for the general benefit of all users of such Local Network.

**1.7 Parties**: UES and the Transmission Customer receiving service under this Schedule and the OATT.

# SECTIONS SUPPLEMENTING THE BODY OF THE TARIFF

#### Preamble

The following provisions supplement the provisions of the Tariff. Provisions of this Schedule 21-UES shall have priority over any conflicting provisions in the Tariff. The section numbers of this Schedule 21-UES correspond to or are consecutive to the section numbers in the body of the Tariff that are affected by the additional provisions herein.

# Sections Supplementing Section I: General Terms and Conditions

**1.7 Creditworthiness**: For the purpose of determining the ability of the Transmission Customer to meet its obligations related to service hereunder, UES may require reasonable credit review procedures in accordance with Attachment L of Schedule 21-UES.

# Sections Supplementing Section II of the Tariff: Open Access Transmission Tariff (OATT)

#### II.A. COMMON SERVICE PROVISIONS

II.4 Ancillary Services

Ancillary Services are needed with transmission service to maintain reliability within and among the Control Areas affected by the transmission service. UES is required to provide (or offer to arrange with the ISO as discussed below), and the Transmission Customer is required to purchase, Local Scheduling, System Control and Dispatch Service. The following Ancillary Services are available pursuant to Section II.4 of the Tariff only to the Transmission Customer serving load within the New England Control Area (i) Reactive Supply and Voltage Control Service, (iii) Regulation and Frequency Response, (iii) Energy Imbalance, (iv) Ten-Minute Spinning Reserve Service, (v) Ten-Minute Non-Spinning Reserve Service and (vi) Thirty-Minute Operating Reserve Service.

#### **II.8** Billing and Invoicing; Accounting

**8.2 Invoicing**: Within a reasonable time after the first day of each month, UES shall submit an invoice to the Transmission Customer for the charges for all services furnished under the OATT during the preceding month. The invoice shall be paid by the Transmission Customer within twenty (20) days of receipt. All payments shall be made in immediately available funds payable to UES, or by wire transfer to a bank named by the UES.

**8.4 Customer Default**: In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to UES on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after UES notifies the Transmission

Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, UES may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission so approves any such request. In the event of a billing dispute between UES and the Transmission Customer, UES will continue to provide service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending

resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then UES may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy.

#### II.10.2 Stranded Cost Recovery

UES may seek to recover stranded costs from the Transmission Customer pursuant to this OATT in accordance with the terms, conditions and procedures set forth in FERC Order No. 888. However, UES must separately file any specific proposed stranded cost charge under Section 205 of the Federal Power Act.

# SECTIONS SUPPLEMENTING SCHEDULE 21 OF THE OATT

# I. Local Point-to-Point Service Over the Local Network Owned by UES

#### Preamble

In addition to the provisions set forth in Schedule 21 of the OATT, the provisions of this Schedule 21-UES shall govern Local Point-To-Point transactions using the Local Network owned by UES. Provisions of this Schedule 21-UES shall have priority over any conflicting provisions in the Tariff. The section numbers of this Schedule 21-UES correspond to or are consecutive to the sections of Schedule 21 of the OATT that are affected by the additional provisions herein.

To the extent not otherwise covered in the OATT, the then-current ISO New England Operating Documents, or the TOA, or the rules adopted thereunder, whenever UES implements least-cost redispatch procedures in response to a transmission constraint, UES and the Transmission Customer(s) taking Local Point-To-Point Service will each bear a proportionate share of the total redispatch cost.

# **3** Service Availability

**b) Determination of Available Transfer Capability (ATC)**: A description of UES's specific methodology for assessing ATC is contained in Attachment C of this Schedule. In the event sufficient transfer capability may not exist to accommodate a service request, UES will respond by performing a System Impact Study.

**g) Real Power Losses**: Real power losses are associated with all transmission service. UES is not obligated to provide real power losses. The Transmission Customer is responsible for replacing losses associated with all transmission service as calculated by UES. The applicable real power loss factors tabulated below will be applied to metered loads and Reserved Capacity amounts to account for losses on UES's system. The applicable real power loss factors are as follows:

Firm Local Point-to-Point Service = 0.53% at 34.5 kV subtransmission. Non-firm Local Point-to-Point Service = 0.53% at 34.5 kV subtransmission

# 6) Procedures for Arranging Non-Firm Local Point-To-Point Service

**f) Determination of Available Transfer Capability**: Following receipt of a tendered schedule UES will make a determination on a non-discriminatory basis of ATC pursuant to Attachment C of this Schedule. Such determination shall be made as soon as reasonably practicable after receipt (during UES's normal business hours of 8:00 a.m. to 4:30 p.m., Monday to Friday), but not later than the following time periods for the following terms of service (i) thirty (30) minutes for hourly service, (ii) thirty (30) minutes for daily service, (iii) four (4) hours for weekly service, and (iv) two (2) days for monthly service.

# 11 Sale or Assignment of Local Point-to-Point Service

c) Information on Assignment or Transfer of Service: UES currently has waiver from the obligations of FERC Order No. 889 to maintain an OASIS. In the future, upon implementation of any UES OASIS site, resellers may use UES's OASIS site to post transmission capacity available for resale.

# II. Local Network Service using Non-PTF Owned by UES

# Preamble

In addition to the provisions set forth in Schedule 21 of the OATT, the provisions of this Schedule 21-UES shall govern Local Network Service using Non-PTF owned by UES. Provisions of this Schedule 21-UES shall have priority over any conflicting provision in the Tariff. The section numbers of this Schedule 21-UES correspond to the sections of Schedule 21 of the OATT that are affected by the additional provisions herein.

Local Network Service allows the Network Customer to integrate, economically dispatch, and regulate its current and planned Network Resources to serve its Network Load in a manner comparable to that in which UES utilizes its Non-PTF to serve its Native Load Customers. Local Network Service also may be used by the Network Customer to deliver economy energy purchases to its Network Load from non-

designated resources on an as-available basis without additional charge. Transmission service for sales to non-designated loads will be provided pursuant to the applicable terms and conditions of Schedule 21 of the OATT.

#### 2) Availability of Local Network Service

f) Real Power Losses: The Network Customer is responsible for replacing losses associated with all transmission service as calculated by UES. The applicable real power loss factors tabulated below will be applied to metered loads and Reserved Capacity amounts to account for losses on UES's system. The applicable real power loss factors are as follows:

Local Network Service = 0.53% at 34.5 kV subtransmission.

#### 8) Load Shedding and Curtailments

a) **Procedures**: Prior to the Service Commencement Date, UES and the Network Customer shall establish Load Shedding and Curtailment procedures pursuant to Section II.20 of the Tariff, with the objective of responding to contingencies on the Local Network. The Parties will implement such programs during any period when the ISO, the Local Control Center or UES determines that a system contingency exists and such procedures are necessary to alleviate such contingency. UES will notify all affected Network Customers in a timely manner of any scheduled Curtailment.

**b) Transmission Constraints**: During any period when UES determines that a transmission constraint exists on the Local Network, and such constraint may impair the reliability of UES's system, UES will take whatever actions, consistent with then-current ISO New England Operating Documents or the TOA, and the rules adopted thereunder, and with Good Utility Practice, that are reasonably necessary to maintain the reliability of UES's system. To the extent ISO determines that the reliability of the ISO New England transmission system can be maintained by redispatching resources, UES will initiate procedures pursuant to the OATT, the then-current ISO New England Operating Documents, or the TOA, and the rules adopted thereunder to redispatch all Network Resources and UES's own resources on a least-cost basis without regard to the ownership of such resources. Any redispatch under this section may not unduly discriminate between UES's use of the Local Network on behalf of its Native Load Customers and any Network Customer's use of the Local Network to serve its designated Network Load.

c) Cost Responsibility for Relieving Transmission Constraints: To the extent not otherwise

covered in the OATT, the then-current ISO New England Operating Documents, or the TOA, or the rules adopted thereunder, whenever UES implements least-cost redispatch procedures in response to a transmission constraint, UES and the Network Customer(s) will each bear a proportionate share of the total redispatch cost based on their respective Load Ratio Shares.

d) **Curtailments of Scheduled Deliveries**: If a transmission constraint on UES's Local Network cannot be relieved through the implementation of least-cost redispatch procedures and UES determines that it is necessary to Curtail scheduled deliveries, the Parties shall Curtail such schedules in accordance with Section II.22 of the Tariff.

e) Allocation of Curtailments: The ISO, the Local Control Center or UES shall, on a nondiscriminatory basis, Curtail the transaction(s) that effectively relieve the constraint. However, to the extent practicable and consistent with Good Utility Practice, any Curtailment will be shared by UES and Network Customers in proportion to their respective Load Ratio Shares. Neither the ISO, the Local Control Center nor UES shall direct the Network Customer to Curtail schedules to an extent greater than either would Curtail UES's schedules under similar circumstances.

f) Load Shedding: To the extent that a system contingency exists on UES's Local Network and the ISO, the Local Control Center or UES determines that it is necessary for UES and the Network Customers to shed load, the Parties shall shed load in accordance with previously established procedures in accordance with Section II.22 of the Tariff, the then-current ISO New England Operating Documents, or the TOA, and the rules adopted thereunder.

g) System Reliability: Notwithstanding any other provisions of this Schedule, UES reserves the right, consistent with Good Utility Practice and on a not unduly discriminatory basis, to Curtail Local Network Service without liability on the part of UES for the purpose of making necessary adjustments to, changes in, or repairs on UES's lines, substations, and facilities, and in cases where the continuance of Local Network Service would endanger persons or property. In the event of any adverse conditions or disturbances on UES's Local Network or on any other system(s) directly or indirectly interconnected with UES's Local Network, UES, consistent with Good Utility Practice, also may Curtail Local Network Service in order to (i) limit the extent or damage of the adverse condition(s) or disturbance(s), (ii) prevent damage to generating or transmission facilities, or (iii) expedite restoration of service. UES will give the Network Customer as much advance notice as is practicable in the event of such Curtailment. Any

Network on behalf of its Native Load Customers. UES shall specify the rate treatment and all related terms and conditions applicable in the event that the Network Customer fails to respond to established Load Shedding and Curtailment procedures.

# 9) Rates and Charges

In addition to the above sections that correspond to sections in Schedule 21 of the OATT, the following additional provision shall apply to Local Network Service over UES's Local Network.

a) Monthly Demand Charge: The Network Customer shall pay a Monthly Demand Charge which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of UES's Annual Transmission Revenue Requirement as specified in Attachment H to this Schedule 21-UES.

**10) Determination of Network Customer's Local Monthly Network Load**: The Network Customer's local monthly Network Load is its hourly load (including its designated Network Load not physically interconnected with UES under Section II.5(c) of Schedule 21 of the OATT) coincident with UES's Monthly Local Network Peak. Monthly revenue requirements not otherwise paid for through charges to Eligible Customers for Local Point-to-Point Service will be allocated among UES's Network Customers receiving service under the tariff on the basis of their loads during the hour in the month in which the total connected load to the local network is at its maximum, without any adjustment for credits for generation.

In addition to the above sections that correspond to sections in Schedule 21 of the OATT, the following three provisions shall apply to Local Network Service over UES's local network.

**10a) Determination of UES's Monthly Local Network Load**: UES's monthly Local Network Load is UES's Monthly Local Network Peak minus the coincident peak usage of all firm Local Point-To-Point Service customers pursuant to Schedule 21 of the OATT plus the Reserved Capacity of all firm Local Point-To-Point Service customers.

**10b) Recovery of PTF Transmission Revenue Requirements**: The portion of UES's annual transmission revenue requirements with respect to PTF which is not recovered through the distribution of revenues from Regional Network Service or Local Point-to-Point Service shall be recovered from Eligible Customers taking Regional Network Service or Local Point-to-Point Service pursuant to Section II.13 of

the Tariff.

#### **SCHEDULE 1**

#### Local Scheduling, System Control and Dispatch Service

This service is required to schedule the movement of power through, out of, within, or into UES's Local Network Control Area. Local Scheduling, System Control and Dispatch Service is to be provided directly by UES and the ISO. The Transmission Customer must purchase this service from UES. The charges for UES's Local Scheduling, System Control and Dispatch Service are to be based on the rates set forth below. To the extent that the ISO performs this service for UES, charges to the Transmission Customer are to reflect only a pass-through of the costs charged to UES by the ISO.

Each firm Local Point-To-Point Service Customer under this Tariff will be charged for Local Scheduling, System Control and Dispatch Services for the total Reserved Capacity specified in each reservation for firm Local Point-To-Point Service made under the Tariff at the rates set forth in Appendix A of this Schedule 1.

Each Network Customer under this Tariff will be charged a monthly Local Scheduling, System Control and Dispatch Service Demand Charge, which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of the Formula Requirements specified in Appendix B of this Schedule 1. Each Transmission Customer with generation within the ISO's Control Area shall be required also to provide for Scheduling, System Control and Dispatch Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting with the ISO for these services on an unbundled basis. UES will make available Generation Scheduling, System Control and Dispatch Service at the rates set forth in Appendix C of this Schedule 1.

Each Transmission Customer with generation located outside of the ISO Control Area shall be required to provide for Scheduling, System Control and Dispatching Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting for these services from the provider of these services within the Control Area where the generation is located. UES shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule 1 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

#### **SCHEDULE 1**

#### Appendix A

# Determination Of UES's Local Network Point-To-Point Formula Rate For Local Scheduling, System Control and Dispatch Service

UES's Formula Rate for Point-To-Point Local Scheduling, System Control and Dispatch Service ("Formula Rate") is an annual rate determined from the following formula.

 $\label{eq:FORMULA RATE} \begin{aligned} & FORMULA RATE_i = & A_{i\text{-}1} - B_{i\text{-}1} \\ & & \\ & & \\ & C_{i\text{-}1} \end{aligned}$ 

WHERE:

- i equals the calendar year during which service is being rendered ("Service Year").
- A<sub>i-1</sub> is the Annual Control Center Expenses (expressed in dollars) of UES for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule 1.
- B<sub>i-1</sub> is the actual local scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual local scheduling and dispatch revenues shall be those recorded on the books of UES in FERC Account No. 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.
- C<sub>i-1</sub> is the single annual coincident peak transmission and distribution load (expressed in kilowatts) of UES for the calendar year prior to the Service Year, as reported in FERC Form No. 1.

# Schedule 1 Appendix A Exhibit 1

# **Determination Of Annual Control Center Expenses**

The rate formula for determination of the annual control center expenses revenue requirements for UES is determined as follows:

A. <u>ANNUAL CONTROL CENTER EXPENSES</u> = Sum of UES's (Account 556 System Control and Load Dispatching Expense) + (Account 557 Other Expense) X .50\* for the calendar year prior to the Service Year.

\*This factor reflects allocation to the transmission function of a portion (50 percent) of the costs recorded in Accounts 556 and 557 associated with dispatching transmission and generating facilities. This 50 percent allocation of control center costs is based on two functions performed by the control center (i) control of generation and (ii) control of transmission.

# **SCHEDULE 1**

# Appendix B

Determination Of UES's Network Formula Requirements For Local Scheduling, System Control And Dispatch Service

UES's formula requirements for Network Local Scheduling, System Control and Dispatch Service is determined from the following formula.

Formula Requirements<sub>i</sub> =  $A_{i-1} - B_{i-1}$ 

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

•  $A_{i-1}$  is the Annual Control Center Expenses (expressed in dollars) of UES for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to Appendix A of Schedule 1.

•  $B_{i-1}$  is the actual local scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual local scheduling, system control and dispatch revenues shall be those recorded on the books of UES in FERC Account No. 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

# Appendix C

# Determination Of UES's Formula Rate For Generation Scheduling, System Control And Dispatch Service

UES's Formula Rate for Generation Scheduling, System Control and Dispatch Service ("Formula Rate") shall be calculated using the Formula Rate for Point-to-Point Local Scheduling, System Control and Dispatch Service in Appendix A of Schedule 21 - UES.

# Long-Term Firm Local and Short-Term Firm Local Point-to-Point Service

The Transmission Customer shall compensate UES each month for firm Reserved Capacity at the sum of the applicable charges set forth below:

- Yearly delivery: one-twelfth of the demand charge of
   \$ N/A /KW of firm Reserved Capacity per year.
- 2) Monthly delivery: \$ N/A /KW of firm Reserved Capacity per month.

3) Weekly delivery: \$ N/A /KW of firm Reserved Capacity per week.

4) **Daily delivery**: \$ N/A /KW of firm Reserved Capacity per day.

The total demand charge in any week, pursuant to a reservation for Daily delivery, shall not exceed the rate specified in section (3) above times the highest amount in kilowatts of firm Reserved Capacity in any day during such week.

5) **Discounts**: Three principal requirements apply to discounts for transmission service as follows (1) any offer of a discount made by UES must be announced to all Eligible Customers solely by posting on Unitil.com, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on Unitil.com, and (3) once a discount is negotiated, details must be immediately posted on Unitil.com. For any discount agreed upon for service on a path, from point(s) of receipt to point(s) of delivery, UES must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on UES's Local Network.

6) **Resales**: The rates and rules governing charges and discounts stated above shall not apply to resales of transmission service, compensation for which shall be governed by section I.11 (a) of Schedule 21 of the OATT.

#### Non-Firm Local Point-To-Point Service\*

The Transmission Customer shall compensate UES for non-firm Local Point-To-Point Service up to the sum of the applicable charges set forth below:

1) Monthly delivery: \$ N/A /KW of Reserved Capacity per month.

2) Weekly delivery: \$ N/A /KW of Reserved Capacity per week.

**3) Daily delivery**: \$ N/A /KW of Reserved Capacity per day.

The total demand charge in any week, pursuant to a reservation for Daily delivery, shall not exceed the rate specified in section (2) above times the highest amount in kilowatts of Reserved Capacity in any day during such week.

4) Hourly delivery: The basic charge shall be that agreed upon by the Parties at the time this service is reserved and in no event shall exceed \$ N/A /MWH. The total demand charge in any day, pursuant to a reservation for Hourly delivery, shall not exceed the rate specified in section (3) above times the highest amount in kilowatts of Reserved Capacity in any hour during such day. In addition, the total demand charge in any week, pursuant to a reservation for Hourly or Daily delivery, shall not exceed the rate specified in section (2) above times the highest amount in kilowatts of Reserved Capacity in any hour during such day.

5) **Discounts**: Three principal requirements apply to discounts for transmission service as follows (1) any offer of a discount made by UES must be announced to all Eligible Customers solely by posting on Unitil.com, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on Unitil.com, and (3) once a discount is negotiated, details must be immediately posted on Unitil.com. For any discount agreed upon for service on a path, from point(s) of receipt to point(s) of delivery, UES must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on UES's Local Network.

6) **Resales**: The rates and rules governing charges and discounts stated above shall not apply to resales of transmission service, compensation for which shall be governed by section I.11 (a) of

Schedule 21 of the OATT.

\* Rates reflect a 25% discount off the firm Point-To-Point rates

## **DISTRIBUTION ADDER UNDER TARIFF**

In the case where distribution facilities of UES are employed in providing service under Schedule 21 of the OATT, the Transmission Customer shall compensate UES for the use of such facilities. In addition to the charges contained in this Tariff, the compensation for such distribution facilities will be determined on a case-by-case basis.

All such charges shall be subject to appropriate regulatory approval.

#### ATTACHMENT C

#### Methodology To Assess Available Transfer Capability

#### 1. Introduction

ISO is the regional transmission organization (RTO) for the New England Control Area. The New England Control Area includes the transmission system located in the states of Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island, and Vermont, but does not include the transmission system in northern Maine (i.e., Aroostook and parts of Penobscot and Washington Counties) that is radially connected to New Brunswick and administered by the Northern Maine Independent System Administrator. The New England Control Area is comprised of PTF, non-PTF, OTF, MTF, and is interconnected to three neighboring Balancing Authority Areas ("BAA") with various interface types.

As part of its RTO responsibilities, the ISO is registered with the North American Electric Reliability Corporation ("NERC") as several functional model entities that have responsibilities related to the calculation of ATC as defined in the following NERS Standards: MOD-001 – Available Transmission System Capability ("MOD-001"). MOD-004 – Capacity Benefit Margin ("MOD-004"), and MOD-008 – Transmission Reliability Margin Calculation Methodology ("MOD-008"). The extent of those responsibilities is based on various Commission approved transmission operating agreements and the provisions of the ISO New England Operating Documents.

While the ISO is the Transmission Service Provider for regional transmission service ("Regional Transmission Service") associated with Pool Transmission Facilities, the Participating Transmission Owners ("PTOs") provide local transmission service over Non-Pool Transmission Facilities within the RTOP footprint and are responsible for calculating TTC and ATC associated with Local Transmission Service provided under Schedule 21 pursuant to the Transmission Operating Agreement ("TOA"). Pursuant to CFR § 37.6(b)<sup>10</sup> of the FERC Regulations, Transmission Provider's are obligated to calculate and post TTC and ATC for each Posted Path. The ISO is not responsible for the calculation of these values.

Posted Path is defined as any control area to control area interconnection; any path for which service is

<sup>10</sup> Section §37.6(b) Posting transfer capability. The available transfer capability on the Transmission Provider's system (ATC) and the total transfer capability (TTC) of that system shall be calculated and posted for each Posted 10 2 Path as set out in this section.

denied, curtailed or interrupted for more than 24 hours in the past 12 months; and any path for which a customer requests to have ATC or TTC posted. For this last category, the posting must continue for 180 days and thereafter until 180 days have elapsed from the most recent request for service over the requested path. For purposes of this definition, an hour includes any part of any hour during which service was denied, curtailed or interrupted.<sup>11</sup>

UES does not currently have any Posted Paths based on the above definition. However, to the extent that UES does in the future have a Posted Path, UES will calculate TTC using the NERC Standard MOD-029 – Rated System Path Methodology ("MOD-029") as outlined below.

## **1.1 Scope of Document**

The scope of this document is limited to those functions performed by UES as the Transmission Service Provider of Schedule 21-UES Point-to Point transmission service over Local Facilities pursuant to the PTOs' Transmission Operating Agreement and the ISO OATT:

- Methodology for calculating Total Transfer Capability (TTC)
- Methodology for calculating Available Transfer Capability (ATC)
- Existing Transmission Commitment (ETC)
- Use of Transmission Reliability Margin (TRM)
- Use of Capacity Benefit Margin (CBM)
- Use of Rollover Rights (ROR) in the calculation of ETC

TTC and ATC are required to be calculated only for certain non-PTF internal Posted Paths over which Point-to-Point transmission service is provided under Schedule 21-UES. TTC and ATC is not calculated by UES for Local Network Service because ISO employs a market model for economic, security constrained dispatch of generation, and UES does not require advance reservation for such network service.

## 2. Transmission Service in the New England Markets

Section § 37.6(b)(1)(i).

Since the inception of the OATT for New England, the process by which generation located inside New England supplies energy to the bulk electric system has differed from the Commission pro forma OATT. The fundamental difference is that internal generation is dispatched in an economic, security constrained manner by the ISO rather than utilizing a system of physical rights, advance reservations and point-to-point transmission service. Through this process, internal generation provides offers that are utilized by the ISO in the Real-Time Energy Market dispatch software. This process provides the least-cost dispatch to satisfy Real-Time load on the system.

In addition to offers from generation within New England, entities may submit External Transactions to move energy into the New England Control Area, out of the New England Control Area or through the New England Control Area. The New England Real-Time Energy Market clears these External Transactions based on forecast Locational Marginal Pricing (LMPs) and the transfer capability of the associated external interfaces. With those External Transactions in place, the Real-Time Energy Market dispatches internal generation in an economic, security constrained manner to meet Real-Time load within the region.

The process for submitting External Transactions into the Real-Time Energy Market does not require an advance physical reservation for use of the PTF. In the event that the net of the economic External Transactions is greater than the transfer capability of the associated external interface, the External Transactions selected to flow are selected based on the rules specified in the tariff. For any External Transactions that are confirmed to flow in Real-Time based on the economics of the system, a transmission reservation for RNS or Through or Out Service is created after-the-fact to satisfy the transparency needs of the market.

The process described above is applicable to the PTF within the ISO Area, and non-PTF Local Facilities where utilized for Local Network Service by generation or load. However, UES owns Local Facilities over which an advance transmission service reservation for firm or non-firm transmission service may be required. On those Local Facilities, the market participant may obtain a transmission service reservation from UES under Schedule 21-UES prior to delivery of energy into the Real-Time Energy Market.<sup>12</sup> This document addresses the calculation of ATC and TTC for these non-PTF internal paths.

## 3. Schedule 21-UES Total Transfer Capability (TTC)

The TTC on UES' non-PTF Local Facilities that require Point-to-Point transmission service reservations

<sup>12</sup> See n - 2, 3 and 6, supra.

are relatively static values and are calculated using the NERC Standard MOD-029 – Rated System Path Methodology. TTC is the amount of electric power that can be moved or transferred reliably from one area to another area of the interconnected transmission systems by way of all transmission lines (or paths) between those areas under specified system conditions. UES calculates TTC according to this definition applying the process as described below.

## 3.1 Guidelines and Principles

When estimating TTC, UES will apply the following, as amended and/or adopted from time to time

- Good Utility Practice
- NERC criteria and guidelines
- ISO New England criteria, rules and reliability standards
- Northeast Power Coordinating Council (NPCC) criteria and guidelines
- Unitil Energy Systems, Inc. guides

## 3.2 Transmission System Model Representation

UES will estimate TTC using transmission system load flow models developed for UES' system. The models may include representations of other neighboring systems. UES will use system models that it deems appropriate for study of the request for firm transmission service. Additional system models and operating conditions, including assumptions specific to a particular analysis, may be developed for conditions not available in the library of load flow cases. The system models may be modified, if necessary, to include additional system information on load, transfers and configuration, as it becomes available.

## 3.3 Contingency Analysis

UES will perform, if necessary, power flow and transient stability analysis to ensure that the interface's physical limits will not be violated for credible system contingencies per NERC, NPCC and ISO reliability criteria. TTC, based on contingency analysis, is the incremental transfer capability of the transmission system following the loss of the most critical element while maintaining thermal, and stability performance of the system within acceptable regional practices and consistent with guidelines of Item 3.1 of this Attachment.

## 3.4 Posting TTCs

When necessary, UES will estimate TTC as outlined above and post on its website.

#### 4. Capacity Benefit Margin (CBM)

CBM is defined as the amount of firm transmission transfer capability set aside by a TSP for use by the Load Serving Entities. The ISO does not set aside any CBM for use by the Load Serving Entities, because of the New England approach to capacity planning requirements in the ISO New England Operating Documents. Load Serving Entities operating within the New England Control Area are required to arrange for their Capacity Requirements prior to the beginning of any given month in accordance with ISO Tariff, Section III.13.7.3.1 (Calculation of Capacity Requirement and Capacity Load Obligation). Load Serving Entities do not utilize CBM to ensure that their capacity needs are met; therefore, CBM is not applicable within the New England market design. Accordingly, for purposes of ATC calculation, CBM for the New England Control Area is set to zero (0).

## Existing Transmission Commitments, Firm (ETC<sub>F</sub>)

The ETC<sub>F</sub> are those confirmed firm transmission reservations (PTP<sub>F</sub>) plus any rollover rights for firm transmission reservations (ROR<sub>F</sub>) that have been exercised. There are no allowances necessary for Native Load forecast commitments (NL<sub>F</sub>), Network Integration Transmission Service (NITS<sub>F</sub>), grandfathered Transmission Service (GF<sub>F</sub>) and other service(s), contract(s) or agreement(s) (OS<sub>F</sub>) to be considered in the ETC<sub>F</sub> calculation.

## Existing Transmission Commitments, Non-Firm(ETC<sub>NF</sub>)

The  $(\text{ETC}_{NF})$  are those confirmed non-firm transmission reservations  $(\text{PTP}_{NF})$ . There are no allowances necessary for non-firm Network Integration Transmission Service (NITS<sub>NF</sub>), non-firm grandfathered Transmission Service (GF<sub>NF</sub>) or other service(s), contract(s) or agreement(s) (OS<sub>NF</sub>).

## 5. Transmission Reliability Margin (TRM)

TRM is the amount of transmission transfer capability set aside to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as system conditions change. It is used only for external interfaces under the New England market design. UES, under Schedule 21, does not have any external interfaces, and therefore, TRM for UES' non-PTF facilities is zero.

#### 6. Calculation of ATC for UES' Local Facilities

#### **General Description**

This section defines the ATC calculations performed by UES for its non-PTF internal interfaces. Consistent with the NERC definition, the equation for Available Transfer Capability is: ATC = (TTC - CBM - TRM - Existing Transmission Commitments + Postbacks + counterflows). As discussed above, the CBM and TRM for the PTF interfaces for which UES calculates ATC are zero (0). As consistent with the ISO calculation, the equations for firm and non-firm Available Transfer Capability are:

Firm ATC = (TTC - CBM - TRM - firm ETC)Non-firm ATC = (TTC - CBM - TRM - firm and non-firm ETC).<sup>13</sup>

As discussed above, the TRM and CBM for UES's non-PTF paths are zero. The purpose of the Existing Transmission Commitments ("ETC") component of the ATC equation is for FG&E to reduce the amount of ATC by the amount of existing firm transmission commitments that are not otherwise included in CBM or TRM. There is no requirement to purchase transmission service in advance of flowing energy in Real-Time, and there is no MW amount set aside by FG&E on any interface. One such example is point-to-point service commitments. Point-to-point service commitments sharing common transmission paths would be combined through system modeling to calculate the net existing transmission capacity (ETC) impact. This ETC value is then used in the ATC calculation shown above. Therefore there are no Existing Transmission Commitments to be applied in the ATC equation. For this reason, ETC equals zero (0) for the purposes of ATC calculation. Because Postbacks and counterflows are related to ETC and ETC is zero (0), both Postbacks and counterflows also are equal to zero (0).

As described in Section 2, under Schedule 21-UES, UES requires the purchase of transmission service in advance of delivery of energy to the New England Wholesale Market over certain non-PTF paths, and those existing transmission commitments would be applied to the ATC equation for the specific posted path. As a practical matter, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

Entities submit their bids and offers to move energy into, out of and through the Energy Market through External Transactions. As Real-Time approaches, the ISO determines which of the submitted External

<sup>13</sup> Existing Transmission Commitments ("ETC")

Transactions will be scheduled in the coming hour in accordance with the rules set forth in the ISO New England Operating Documents. Basically, the ATC of the non-PTF assets in the New England market is almost always positive. The ATC is equal to the amount of External Transactions that the ISO will schedule on an interface for the designated hour. With this simplified version of ATC, there is no detailed algorithm to be described or posted other than: ATC equals TTC. Thus, for those non-PTF facilities that serve as a path for the UES' Schedule 21-UES Point-to-Point Transmission Customers, UES would post the ATC as 9999, consistent with industry practice. ATC on these paths varies depending on the time of day. However, it would be posted with an ATC of "9999" to reflect the fact that there are no restrictions on these paths for commercial transactions.

#### 6.1 Calculation of Schedule 21-UES Firm ATC (ATC<sub>F</sub>)

**6.1.1** Calculation of ATC<sub>F</sub> in the Planning Horizon (PH)

For purposes of this Attachment C, PH is any period before the Operating Horizon.

Consistent with the NERC definition,  $ATC_F$  is the capability for firm transmission reservations that remain after allowing for TRM, CBM,  $ETC_F$ , Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM are zero. Firm Transmission Service under Schedule 21-UES that is available in the Planning Horizon (PH) includes: Yearly, Monthly, Weekly, and Daily. Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-UES transmission reservations are not considered in the ATC calculation. Therefore,  $ATC_F$  in the PH is equal to the TTC minus  $ETC_F$ 

**6.1.2** Calculation of ATC<sub>F</sub> in the Schedule 21-UES Operating Horizon (OH)

For purposes of this Attachment C, OH is noon eastern prevailing time each day. At that time, the OH spans from noon through midnight of the next day for a total of 36 hours. As time progresses the total hours remaining in the OH decreases until noon the following day when the OH is once again reset to 36 hours.

Consistent with the NERC definition,  $ATC_F$  is the capability for firm transmission reservations that remain after allowing for  $ETC_F$ , CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM is zero. Daily firm Transmission Service under Schedule 21-UES is the only firm service offered in the Operating Horizon (OH). Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-UES transmission reservations are not considered in the  $ATC_F$  calculation. Therefore,  $ATC_F$  in the OH is equal to the TTC minus ETC<sub>F</sub>.

**6.1.3** Because firm Schedule 21-UES transmission service is not offered in the Scheduling Horizon (SH):  $ATC_F$  in the SH is zero.

## 6.2 Calculation of Schedule 21-UES Non-Firm ATC (ATC<sub>NF</sub>)

6.2.1 Calculation of ATC<sub>NF</sub> in the PH

 $ATC_{NF}$  is the capability for non-firm transmission reservations that remain after allowing for ETC <sub>F</sub>,  $ETC_{NF}$ , scheduled CBM (CBM<sub>S</sub>), unreleased TRM (TRM<sub>U</sub>), non-firm Postbacks (Postbacks<sub>NF</sub>) and non-firm counterflows (counterflows<sub>NF</sub>).

As discussed above, the TRM and CBM for Schedule 21-UES are zero. Non-firm ATC available in the PH includes: Monthly, Weekly, Daily and Hourly. TRM <sub>U</sub>, Postbacks<sub>NF</sub> and counterflows<sub>NF</sub> of Schedule 21-UES transmission reservations are not considered in this calculation. Therefore,  $ATC_{NF}$  in the PH is equal to the TTC minus ETC <sub>F</sub> and ETC<sub>NF</sub>.

 $6.2.2 \qquad \text{Calculation of ATC}_{\text{NF}} \text{ in the OH}$ 

ATC  $_{\rm NF}$  available in the OH includes: Daily and Hourly.

As discussed above TRM and CBM for Schedule 21-UES are zero.  $TRM_U$ , counterflows and  $ETC_{NF}$  are not considered in this calculation. Therefore,  $ATC_{NF}$  in the OH is equal to the TTC minus  $ETC_{F}$ , plus postbacks of  $PTP_F$  in OH as  $PTP_{NF}$  (Postbacks NF).

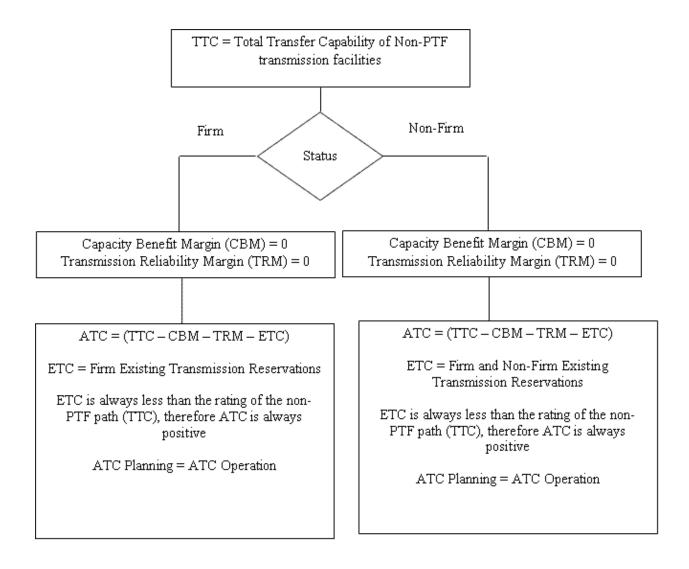
## 6.3 Negative ATC

As stated above, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

As stated above, UES' non-PTF facilities are primarily radial paths that provide transmission service to directly interconnected generators. It is possible, in the future, that a particular radial path may interconnect more nameplate capacity generation than the path's TTC. However, due to the ISO's security constrained dispatch methodology, the ISO will only dispatch an amount of generation interconnected to such path so as not to incur a reliability or stability violation on the subject path. Therefore, ATC in the PH, OH and SH may become zero, but will not become negative.

## ATC Process Flow Diagram for Non-PTF Interfaces

The process flow diagram illustrates the steps through which ATC is calculated both on an operating and planning horizon.



## 7. Posting of Schedule 21-UES ATC

## 7.1 Location of ATC Posting.

When necessary, UES will estimate ATC values for these internal paths as outlined above and post on its website, <u>http://www.unitil.net/nepool/nh/pdf/atc\_cbm\_ttc\_trm\_ues.pdf</u>.

## 7.2 Updates To ATC

When any of the variables in the ATC equations change, the ATC values are recalculated and immediately posted.

## 7.3 Coordination of ATC Calculations

Schedule 21-UES non-PTF has no external interfaces. Therefore it is not necessary to coordinate the values.

## 7.4 Mathematical Algorithms

A link to the actual mathematical algorithm for the calculation of ATC for UES' non-PTF internal interfaces is located at <u>http://www.unitil.com/sites/default/files/pdfs/ues\_atc\_algorithms\_3\_11.pdf</u>.

#### ATTACHMENT D

#### Methodology for Completing a System Impact Study

UES will perform System Impact Studies for the purpose of determining the feasibility of integrating Network Load and Network Resources into UES's Local Network under Schedule 21 of the OATT, or for the purpose of determining the feasibility of providing Local Point-To-Point Service under this Tariff. All System Impact Studies will be completed using the same method employed by UES to integrate into UES's Local Network (i) generation resources owned or acquired to serve its Native Load Customers, and (ii) its Native Load Customers' load. Specifically, System Impact Studies will be performed by applying the applicable criteria, rules, standards and operating procedures. In addition to applying the aforementioned applicable criteria, rules, standards and operating procedures , to determine the feasibility of providing service to Network Load and/or Local Point-To-Point Service, System Impact Studies will also be performed by applying Unitil Service Corp.'s "Electric System Planning Guide."

# ATTACHMENT E

# Index Of Local Point-To-Point Service Customers

Customer

Date of Service Agreement

### ATTACHMENT H

# Annual Transmission Revenue Requirement For Local Network Service

- 1. The Annual Transmission Revenue Requirement for purposes of the Local Network Service shall be \$ N/A.
- 2. The amount in (1) shall be effective until amended by UES or modified by the Commission.
- 3. If UES receives a distribution pursuant to Section II.13 of the Tariff from ISO out of revenues paid for Through or Out Service or for In Service (as defined in the OATT), the amounts received shall reduce its local network service revenue requirements.
- 4. Any rate developed hereunder shall employ a cost of equity of 10.57%.

# ATTACHMENT I

## Index Of Local Network Service Customers

Customer

Date of Service Agreement

Unitil Energy Systems, Inc.

December 1, 2002

#### Attachment L

#### **Creditworthiness Policy**

#### 1. Introduction

This guide establishes creditworthiness standards for transmission service and/or interconnection service customers ("Customers") entering into new or amended service agreements with Unitil Energy Systems, Inc. ("UES") under the ISO New England Open Access Transmission Tariff ("ISO-NE OATT").<sup>14</sup> In accordance with the Federal Energy Regulatory Commission's Policy Statement on Credit-Related Issues for Electric OATT Transmission Providers, Independent System Operators and Regional Transmission Organizations ("Policy Statement"), this Creditworthiness Policy is intended to make UES's credit-related practices more transparent and comprehensive. The following describes UES credit review procedures and the types of security that are acceptable to UES to protect against the risk of non-payment.

## 2. Creditworthiness

UES will evaluate the creditworthiness of Customers entering into new or amended transmission or interconnection service agreements with UES in order to assess a Customer's credit risk relative to the exposure of "Total Outstanding Obligation" as defined in Section 2.1 below, created by the transaction or transactions that UES has with the Customer. For purposes of determining the ability of a Customer to meet its obligations, UES may require the Customer to submit financial information for the credit review, including credit ratings, credit reports and audited financial statements for the last five years, including audited quarterly reports for the prior two years, if available. Further, the Customer will be expected to provide calculations of the following: Current Total Capitalization Ratio, Including Short-Term Debt; Tangible Net Worth for a period within sixty days of a Customer's request; Earnings Before Interest, Taxes, Depreciation and Amortization for twelve of the last fifteen consecutive months; and additional calculations and other information deemed necessary for the evaluation credit. In completing its evaluation, UES may consider other factors including but not limited to past billing history or the characteristics of service being requested.

## 2.1 Total Outstanding Obligation

The Customer's Total Outstanding Obligation to UES will be the sum total of the following components:

<sup>14</sup> See ISO New England Inc., ISO New England Inc. Transmission, Markets and Services Tariff, Section II. This policy is applicable to transmission or interconnection service agreements established from time-to-time under Schedules 21 - UES of the ISO-NE OATT and to individually negotiated agreements for similar transmission or interconnection services.

2.1.1 If the Customer is making payments to UES for ongoing expenses (including, but not limited to, O&M expenses related to interconnections or other monthly charges such as monthly transmission charges under Schedule 21 - UES) the Customer will be required to provide security pursuant to Section 2.2 below, for four months' worth of the Customer's average payment obligation for such charges.

2.1.2 In accordance with the provisions of the ISO-NE OATT, a Customer will pay a Contribution in Aid of Construction ("CIAC") or transfer ownership of facilities to UES for transmission or interconnection facilities that are to be constructed on behalf of a Customer at the Customer's sole expense. If UES determines in good faith that the receipt of CIAC payments or property from the Customer are non-taxable, UES will require a form of security from the customer pursuant to Section 2.2 below for the amount of the potential tax liability to UES that would occur if such facilities were deemed taxable.

2.1.3 In accordance with the provisions of Schedule 21 – UES to the ISO-NE OATT, a Customer will pay a formula rate over time for return of and on the cost of capital incurred by UES on behalf of a Customer at the Customer's sole expense. The Customer will also be required to provide security pursuant to Section 2.2 below, for the unamortized balance of plant in service reserved for the sole use of the Customer.

#### 2.2 Creditworthiness Requirements

A Customer will be considered creditworthy upon satisfying at least one of the following conditions or a combination of those conditions at the time that the customer enters into a transmission or interconnection service agreement and for so long as the Customer maintains satisfaction of at least one of these conditions for any outstanding obligations thereunder:

2.2.1 The Customer maintains a minimum credit rating from Standard & Poor's Long-term Issuer Credit Rating of BBB- or better or Moody's Investors Service Long-term Issuer Credit Rating of Baa3 or better so long as the Customer's Total Outstanding Obligation plus any other unsecured obligations with UES does not exceed the Credit Limits discussed in Section 4 below. When UES reviews a Customer's rating from two or more rating agencies and a split rating is present, the lower debt rating will apply. In the event that the Customer has no rating from either Standard & Poor's or Moody's Investors Service, a rating from Fitch may also be used with acceptable ratings equivalent to those from either Standard and Poor's or Moody's Investors Service. If unrated, the Customer's financial statements will be reviewed to determine an equivalent rating based on the Customer's unsecured credit limits and/or financial statements.

If, at any time, the Customer's rating falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify UES within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to UES, as described in this Section 2.2.

2.2.2 The Customer provides and maintains in effect during the term of and until full and final payment and performance of the service agreement an unconditional and irrevocable standby letter of credit for the Total Outstanding Obligation in the form and substance and issued by a bank reasonably acceptable to UES. A draft, acceptable form letter of credit is attached. Any such bank must satisfy the creditworthiness criteria described in 2.2.1 above.

If, at any time, the bank's rating falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify UES within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to UES, as described in this Section 2.2.

2.2.3 If the Customer's parent or an affiliate company satisfies the creditworthiness criteria described in 2.2.1 above and, subject to the Credit Limits stated in Section 4 below, such company submits to UES and maintains in effect a letter of guaranty reasonably acceptable to UES as to amount, form and substance for the term of and until full and final payment and performance of the service agreement.

If, at any time, the credit rating of the Customer's parent or affiliate providing the guaranty falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify UES within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to UES, as described in this Section 2.

2.2.4 The Customer makes an advance payment to UES in immediately available funds for the Total Outstanding Obligation.

## 3. Customer Costs Requiring Prepayment

In accordance with the provisions of the ISO-NE OATT, a Customer will pay a Contribution in Aid of Construction ("CIAC") for transmission or interconnection facilities to be constructed by UES on behalf of a Customer at the Customer's sole expense. The Customer will have the option to (i) prepay the CIAC in immediately available funds to UES, or (ii) make periodic CIAC progress payments, as defined in the Customer's service agreement, to prepay in increments capital costs scheduled to be incurred by UES. If UES determines in good faith that such payments or property transfers made by the Customer should be reported as income subject to taxation, the Customer shall also prepay all costs associated with the cost consequences of the current tax liability imposed on UES by those facilities (the "Tax Gross- up").

#### 4. Determination of Credit Limits

UES reserves the right to limit the total amount of unsecured credit extended to a Customer under 2.2.1 and 2.2.3 above such that the sum of all unsecured credit that such Customer has with UES, including the Total Outstanding Obligation, shall not exceed the Credit Limits defined below. Such limitations are based on an assessment of the Customer's or its Guarantor's credit rating and the net worth of the Customer's or its Guarantor's assets.

Standard and Poor's (or Equivalent) Rating	Unsecured Credit Limit as Percent of Customer's or Guarantor's Tangible Net Worth
A and above	1.00%
A-	0.50%
BBB+	0.30%
BBB	0.20%
BBB-	0.10%

Once UES has evaluated or reevaluated and determined the maximum Credit limits for each Customer, it will inform the prospective Customer of the amount of such credit limits. A customer may request in writing a reevaluation of the maximum Credit limits, within 14 days from the date that they were informed by UES of such limits. Justification for such a reevaluation should be contained in the request. All requests for reevaluation must be submitted directly to the UES Contract Administrator.

From time to time, principally due to unknown factors such as changing market, economic, banking or other financial conditions, but not solely limited to these factors, UES may find it necessary to modify or amend its creditworthiness policies and guidelines after a 15 day notice period and require that present and future Transmission Customers fulfill any additional conditions contained in the modified Creditworthiness Guide. Transmission Customers will have 30 days after the notice period to cure any deficiency.

## FORM LETTER OF CREDIT

\_\_\_\_\_ Bank

(address)

## IRREVOCABLE STANDBY LETTER OF CREDIT

DATE: \_\_\_\_\_

AMOUNT U.S. \$\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_

FOR INTERNAL	IDENTIFICATION PURPOSES ONLY	Ζ

\_\_\_\_

Our Number:

Beneficiary:

Applicant:

Attn: At the request of:

Ref:\_\_\_\_\_

## LADIES AND GENTLEMEN:

WE HEREBY ESTABLISH THIS IRREVOCABLE, AND UNCONDITIONAL, EXCEPT AS STATED HEREIN, LETTER OF CREDIT NUMBER \_\_\_\_\_\_\_ (LETTER OF CREDIT), BY ORDER OF, FOR THE ACCOUNT OF, AND ON BEHALF OF [CUSTOMER NAME] (ACCOUNT PARTY) IN FAVOR OF UNITIL ENERGY SYSTEMS, INC. (BENEFICIARY) FOR DRAWINGS, IN ONE OF MORE DRAFTS, UP TO AN AGGREGATE AMOUNT NOT EXCEEDING U.S. \$\_\_\_\_\_\_ EFFECTIVE IMMEDIATELY. THE TERM 'BENEFICIARY' INCLUDES ANY SUCCESSOR OF THE NAMED BENEFICIARY.

THIS LETTER OF CREDIT CANNOT BE AMENDED, MODIFIED OR REVOKED WITHOUT THE PRIOR WRITTEN CONSENT OF BOTH THE BANK AND THE BENEFICIARY. THE BENEFICIARY SHALL NOT BE DEEMED TO HAVE WAIVED ANY RIGHTS UNDER THIS LETTER OF CREDIT, UNLESS AN OFFICER OF THE BENEFICIARY SHALL HAVE SIGNED A WRITTEN WAIVER EXPRESSLY REFERENCING THE RIGHT TO BE WAIVED. NO SUCH WAIVER SHALL BE EFFECTIVE AS TO ANY TRANSACTION THAT OCCURS SUBSEQUENT TO THE DATE OF THE WAIVER, NOT AS TO ANY CONTINUANCE OF A BREACH AFTER THE WAIVER.

WE HEREBY UNDERTAKE TO PROMPTLY HONOR YOUR DRAFT(S) DRAWN ON US, INDICATING OUR LETTER OF CREDIT NUMBER \_\_\_\_\_\_ IS ISSUED, PRESENTABLE AND PAYABLE AND WE GUARANTY TO THE DRAWERS, ENDORSERS, AND BONA FIDE HOLDERS OF THIS LETTER OF CREDIT, THAT DRAFTS UNDER AND IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT WILL BE HONORED. THIS LETTER OF CREDIT MAY NOT BE TRANSFERRED OR ASSIGNED BY US.

SUBJECT TO THE EXPRESS TERMS AND CONDITIONS HEREIN, FUNDS UNDER THIS LETTER OF CREDIT ARE AVAILABLE TO YOU BY PRESENTATION AT OUR OFFICES LOCATED AT [\_\_\_\_\_] OF BENEFICIARY'S DRAWING CERTIFICATE ISSUED SUBSTANTIALLY IN THE FORM OF ANNEX 1 ATTACHED HERETO AND WHICH FORMS AN INTEGRAL PART HEREOF, DULY COMPLETED AND PURPORTEDLY BEARING THE ORIGINAL SIGNATURE OF AN OFFICER OF THE BENEFICIARY. PRRESENTATION OF ANY DRAWING CERTIFICATE UNDER THIS LETTER OF CREDIT MAY BE MADE IN PERSON TO US OR MAY BE SENT TO US BY TELEX TO [\_\_\_\_\_] OR BY FACSIMILE ALL COMMISSIONS AND CHARGES WILL BE BORNE BY THE ACCOUNT PARTY. IF DOCUMENTS, IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT, ARE RECEIVED BEFORE 10:00 AM (EASTERN TIME) ON A BUSINESS DAY, PAYMENT WILL BE EFFECTED ON OR BEFORE 5:00 PM (EASTERN TIME) ON THE NEXT BUSINESS DAY. IF DOCUMENTS, IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT ARE RECEIVED AFTER 10:00 AM ON A BUSINESS DAY, PAYMENT WILL BE EFFECTED ON OR BEFORE 5:00 PM ON THE SECOND BUSINESS DAY FOLLOWING SUCH DATE OF RECEIPT.

EXCEPT AS EXPRESSLY STATED HEREIN, THIS UNDERTAKING IS NOT SUBJECT TO ANY AGREEMENT, CONDITION OR QUALIFICATION. THIS LETTER OF CREDIT DOES NOT INCORPORATE, AND SHALL NOT BE DEEMED MODIFIED OR AMENDED BY REFERENCE TO ANY DOCUMENT, INSTRUMENT OR AGREEMENT (A) THAT IS REFERRED TO HEREIN (EXCEPT FOR THE UNIFORM CUSTOMS, AS DEFINED BELOW), OR (B) IN WHICH THIS LETTER OF CREDIT IS REFERRED TO OR TO WHICH THIS LETTER OF CREDIT RELATES.

OUR OBLIGATION UNDER THIS LETTER OF CREDIT SHALL BE OUR INDIVIDUAL OBLIGATION AND IS IN NO WAY CONTINGENT UPON THE REIMBURSEMENT WITH RESPECT THERETO, OR UPON OUR ABILITY TO PERFECT ANY LIEN, SECURITY INTEREST OR ANY OTHER REIMBURSEMENT.

THIS LETTER OF CREDIT EXPIRES WITH OUR CLOSE OF BUSINESS ON [364 days from effective date]; HOWEVER, IT IS A CONDITION OF THIS LETTER OF CREDIT THAT IT SHALL BE DEEMED AUTOMATICALLY EXTENDED WITHOUT AMENDMENT FOR 364 DAYS FROM THE PRESENT OR ANY FUTURE EXPIRATION DATE HEREOF, UNLESS AT LEAST SIXTY (60) DAYS BEFORE ANY SUCH EXPIRATION DATE WE NOTIFY YOU BY REGISTERED MAIL ADDRESSED TO: [address of beneficiary, ATTN: \_\_\_\_\_], THAT WE ELECT NOT TO RENEW THIS LETTER FOR SUCH ADDITIONAL PERIOD.

THIS LETTER OF CREDIT IS SUBJECT TO THE UNIFORM CUSTOMS AND PRACTICE FOR DOCUMENTARY CREDITS (1993 REVISION) INTERNATIONAL CHAMBER OF COMMERCE, PUBLICATION NO. 500. IF THIS LETTER OF CREDIT EXPIRES DURING THE INTERRUPTION OF BUSINESS AS DESCRIBED IN ARTICLE 17 THEREOF WE HEREBY SPECIFICALLY AGREE TO EFFECT PAYMENT IF THE LETTER OF CREDIT IS DRAWN AGAINST WITHIN 30 DAYS AFTER THE RESUMPTION OF BUSINESS.

# ANNEX 1 TO [BANKNAME] IRREVOCABLE LETTER OF CREDIT NO. \_\_\_\_\_

[INSERT DATE] [BANK NAME] [ATTENTION] [BANK ADDRESS 1] [BANK ADDRESS 2]

LADIES AND GENTLEMEN:

THE UNDERSIGNED \_\_\_\_\_\_\_, A DULY ELECTED AND ACTING OFFICER OF UNITIL ENERGY SYSTEMS, INC. (THE "BENEFICIARY"), HEREBY CERTIFIES TO [INSERT BANK NAME] (THE "BANK"), WITH REFERENCE TO IRREVOCABLE LETTER OF CREDIT NO. \_\_\_\_\_ DATED \_\_\_\_\_\_, ISSUED BY THE BANK IN FAVOR OF THE BENEFICIARY (THE "LETTER OF CREDIT"), AS FOLLOWS AS OF THE DATE THEREOF:

1. THE BENEFICIARY IS A PARTY TO THAT CERTAIN [INTERCONNECTION AGREEMENT], EFFECTIVE \_\_\_\_\_\_, BETWEEN THE BENEFICIARY AND [CUSTOMER NAME] (THE "AGREEMENT").

2. BENEFICIARY IS MAKING A DRAWING UNDER THE LETTER OF CREDIT IN THE AMOUNT OF \$\_\_\_\_\_BECAUSE [CHECK APPLICABLE PROVISION]:

[\_\_\_\_] (A) THERE CURRENTLY EXIST ONE OR MORE UNPAID AMOUNTS WHICH [CUSTOMER NAME] IS OBLIGATED TO PAY PURSUANT TO THE TERMS OF THE AGREEMENT.

[\_\_\_\_] (B) THE BENEFICIARY HAS RECEIVED NOTICE FROM THE BANK OF ITS INTENTION NOT TO RENEW THE LETTER OF CREDIT BEYOND THE CURRENT EXPIRATION DATE AND [CUSTOMER NAME] HAS FAILED, PRIOR TO THE CLOSE OF BUSINESS ON

[INSERT DATE WHICH IS NOT MORE THAN THIRTY (30) DAYS BEFORE THE PRESENT EXPIRATION DATE], TO DELIVER TO BENEFICIARY A REPLACEMENT LETTER OF CREDIT SATISFYING THE REQUIREMENTS OF THE AGREEMENT. 4. FUNDS PAID PURSUANT TO THE PROVISIONS OF THE LETTER OF CREDIT SHALL BE WIRE TRANSFERRED TO THE BENEFICIARY IN ACCORDANCE WITH THE FOLLOWING INSTRUCTIONS:

UNLESS OTHERWISE PROVIDED HEREIN, CAPITALIZED TERMS WHICH ARE USED AND NOT DEFINED HEREIN SHALL HAVE THE MEANING GIVEN EACH SUCH TERM IN THE LETTER OF CREDIT.

IN WITNESS WHEREOF, THIS CERTIFICATE HAS BEEN DULY EXECUTED AND DELIVERED ON BEHALF OF THE BENEFICIARY BY ITS DULY ELECTED AND ACTING OFFICER AS OF THIS \_\_\_\_\_ DAY OF \_\_\_\_\_\_.

BENEFICIARY: UNITIL ENERGY SYSTEMS, INC.

NAME:

TITLE:

#### **SCHEDULE 18 - MTF; MTF SERVICE**

This Schedule 18 contains the main substantive provisions regarding the treatment of MTF and MTF Service under the OATT.

#### 1. Definitions

Capitalized terms used and defined in this Schedule 18 shall have the meaning given them under this Schedule. Capitalized terms used and not defined in this Schedule 18 but defined in other provisions of the Tariff shall have the meaning given them under those provisions. Capitalized terms used in this Schedule 18 that are not defined in it or elsewhere in the Tariff shall have the meanings customarily attributed to such terms by the electric utility industry in New England.

**1.1 MTF:** The Cross Sound Cable high voltage, direct current Merchant Transmission Facilities of +/- 150 kV and associated dc/ac converter facilities that are directly interconnected with the 345 kV PTF in Connecticut at the East Shore substation, and the 138kV transmission facilities at the Shoreham substation on Long Island, New York that were subject to the Commission order in TransEnergie U.S., Ltd., 91 FERC 61,230 (2000) (Docket No. ER00-1-000).

**1.2 MTF Provider**: The owner of MTF, or its Designated Agent, that offers transmission service over the MTF to Eligible Customers through the MTF Transmission Provider Page on the OASIS.

1.3 MTF Service: Point-To-Point Transmission Service over MTF.

**1.4 MTF Service Charge:** The charge applicable to MTF Service, which shall be determined pursuant to arrangements between the MTF Provider and Eligible Customers that take MTF Service under this Schedule 18. The charge applicable to MTF Service shall be in accordance with the Commission's authorization for the MTF Provider to charge negotiated rates (i.e., rates established pursuant to market mechanisms as recognized for merchant transmission projects and not included in other OATT rates) for the use of transmission service over its MTF.

**1.5 MTF Transmission Provider Page:** The transmission provider page for the MTF located on the OASIS. Transmission Service over the MTF to Eligible Customers will be offered through the MTF Transmission Provider Page. Some of the information posted on the MTF Transmission Provider Page shall include: values for Available Transfer Capability (ATC); offerings for MTF Service (including

Firm, Non-Firm and secondary transmission rights); the parameters and results of the Commissionmandated open-season process used to initially allocate transmission rights; a description of the Commission-approved rights allocation process; and procedures for the application for and acquisition of MTF Service.

#### 2. Allocation of Available Transfer Capability Over MTF

**2.1 Commission-Approved Allocation Process:** All available transfer capability over MTF shall be allocated to the owner of the MTF who may assign it under a Commission-approved rights allocation process. The MTF Provider shall post the results of the Commission-approved rights allocation process on the MTF Transmission Provider Page. To the extent that transfer capability over MTF is not fully reserved through the Commission-approved rights allocation process, such excess transfer capability shall be available in accordance with this Schedule 18. In the event that the entire capability of the MTF is reserved under the Commission-approved rights allocation process, secondary rights to use the MTF, to the extent unused by the primary rights holders, shall be offered on the MTF Transmission Provider Page on the OASIS by MTF Providers in accordance with a Commission-approved process for offering such rights.

#### 3. MTF Service

#### 3.1 Nature of MTF Service

#### (a) Term of MTF Service:

- (i) Firm MTF Service: The minimum term of Firm MTF Service shall be one day and the maximum term shall be that specified in the MTF Transmission Service Agreement.
- (ii) Non-firm MTF Service: Non-Firm MTF Service will be available for periods ranging from one hour to one month and shall be that specified in the MTF Transmission Service Agreement. However, a Transmission Customer who purchases Non-Firm MTF Service will be entitled to reserve a sequential term of service (such as a sequential monthly term without having to wait for the initial term to expire before requesting another monthly term) so that the total time period for which the reservation applies may be greater than one month, subject to the requirements of this Schedule 18.

#### (b) Reservation, Interruption, and Curtailment Priority for MTF Service:

- (i) The MTF Provider shall post on the MTF Transmission Provider Page, rules setting reservation, interruption and Curtailment priorities for Firm and Non-Firm MTF Service. Such rules shall be non-discriminatory and consistent with the Commission's approval of the rights to charge negotiated rates (i.e., rates established pursuant to market mechanisms as recognized for merchant transmission projects and not included in other OATT rates).
- (ii) If an MTF Provider fails to post such rules, then reservation, interruption and Curtailment priorities for Firm and Non-Firm MTF Service shall be the same as those established under the OATT for transmission service over the PTF.
- (iii) MTF reservation priorities shall be established separately from OTF or PTF reservation priorities.
- (iv) Firm MTF Service: The MTF reservation priority for either Long-Term Firm MTF Service or Short-Term Firm MTF Service (which are based upon an award of rights to transmission service over the MTF pursuant to a Commission-approved rights allocation process) shall be determined by the date of the issuance of such award.
- (v) Non-Firm MTF Service: Non-Firm MTF Service shall be available from transfer capability in excess of that needed for reliable service to Long-Term and Short-Term Firm MTF Service. A higher reservation priority will be assigned to Non-Firm MTF Service reservations with a longer duration of service than those reservations with a shorter duration. Competing requests of equal duration for Non-Firm MTF Service will be prioritized based on the highest price offered by the Eligible Customer for the transmission service, or in the event the price for all Eligible Customers is the same, will be prioritized on a first-come, first-served basis (i.e., in the chronological sequence in which each Transmission Customer has reserved service). Eligible Customers that have already reserved shorter-term service over MTF have the right of first refusal to match any longer-term request before being preempted, provided that such Eligible Customer's advance reservation is consistent with any modified request for Non-Firm MTF Service.

- (c) Use of MTF Service By a Transmission Customer: If a Transmission Customer elects to take MTF Service, it may reserve transmission service to facilitate both the delivery of energy and/or capacity to it over the MTF (to the extent permitted under the Transmission, Markets and Services Tariff) commensurate with the associated MTF transmission reservation designated by it in Completed Applications and the delivery of Energy and/or capacity to or from it over the MTF to the extent permitted under the Transmission, Markets and Services Tariff. In order to fulfill its obligations to serve load or to consummate a transaction, a Transmission Customer that takes MTF Service under this Schedule 18 must also take service under Schedule 8 or 9 of this OATT for use of the PTF and under Schedule 21 of this OATT for use of the Non-PTF, as applicable. Any load-serving entity may use MTF Service to effect transactions in bilateral arrangements.
- (d) MTF Transmission Service Agreements: A standard form MTF Transmission Service Agreement (Attachment A) will be offered to an Eligible Customer when it submits a Completed Application for Long-Term Firm, Short-Term Firm or Non-Firm MTF Service pursuant to this Schedule 18. Executed MTF Transmission Service Agreements that contain the information required under this Schedule 18 will be filed with the Commission in compliance with applicable Commission regulations.

#### (e) Classification of MTF Service:

- (i) Transmission Customers requesting MTF Service for the transmission of capacity and energy do so with the full realization that such service is subject to availability and Curtailment pursuant to Section II.44 of this OATT and that the ISO will redispatch all Resources subject to its control, pursuant to the Transmission, Markets and Services Tariff, in order to meet load and to accommodate External Transactions. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with the Transmission, Markets and Services Tariff.
- (ii) Each Point of Receipt at which firm transmission capacity is reserved for Long-Term Firm MTF Service by the Transmission Customer shall be set forth in the MTF Transmission Service Agreement for such Service along with a corresponding capacity reservation over the MTF associated with each Point of Receipt.

- (iii) Points of Receipt and corresponding capacity reservations shall be as mutually agreed upon by the MTF Provider and the Transmission Customer for Short-Term Firm MTF Service. Each Point of Delivery at which firm transmission capacity is reserved for Short-Term Firm MTF Service by the Transmission Customer shall be set forth in the MTF Transmission Service Agreement for such Service along with a corresponding capacity reservation associated with each Point of Delivery. Points of Delivery and corresponding capacity reservations shall be as mutually agreed upon by the MTF Provider and the Transmission Customer for Short-Term Firm MTF Service.
- (iv) Non-Firm MTF Service shall be offered under applicable terms and conditions contained in this Schedule 18. Non-Firm MTF Service shall include transmission of energy on an hourly basis and transmission of scheduled short-term capacity and energy on a daily, weekly or monthly basis, but not to exceed one month's reservation for any one Application.
- (v) The greater of either (1) the sum of the capacity reservations at the Point(s) of Receipt, or (2) the sum of the capacity reservations at the Point(s) of Delivery shall be the Transmission Customer's Reserved Capacity over the MTF. The Customer's use may not exceed its capacity reserved over the MTF at each Point of Receipt and each Point of Delivery except as otherwise specified in this Schedule 18.
- (f) Scheduling Associated with MTF Service: Market External Transactions submitted into the Real-time Market and associated with MTF Service shall be dispatched pursuant to the Transmission, Markets and Services Tariff. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such dispatch in accordance with the Transmission, Markets and Services Tariff.
- (g) Curtailment Associated with MTF Service: When the ISO determines that an electrical emergency exists on the New England Transmission System and implements emergency procedures to effect a Curtailment of MTF Service, the Transmission Customer shall make the required reductions upon the ISO's request. The ISO reserves the right to effect a Curtailment, as necessary, in whole or in part, of any MTF Service provided under this Schedule 18 when, in the ISO's sole discretion, an emergency or other unforeseen

condition impairs or degrades the reliability of the New England Transmission System. The ISO will notify all affected Transmission Customers in a timely manner of any Curtailments. The ISO will redispatch all Resources subject to its control, pursuant to this Tariff, in order to meet load and to accommodate External Transactions. To the extent not otherwise provided for in this Section, External Transactions using MTF Service shall be Curtailed or interrupted in accordance with Section II.44 of this OATT. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with the Transmission, Markets and Services Tariff. Pursuant to such redispatch, in the event that the ISO exercises its right to effect a Curtailment, in whole or part, of Firm MTF Service, no credit or other adjustment shall be provided as a result of the Curtailment with respect to the charge payable by the Transmission Customer, unless provided for by the MTF Provider under arrangements between the MTF Provider and the Transmission Customer.

**3.2 Availability of MTF Service**: To the extent that transfer capability over MTF has not been fully allocated in accordance with Section 2 of this Schedule 18, a Transmission Customer that is an Eligible Customer (except as provided below) may reserve Firm or Non-Firm MTF Service. Such service shall be provided and administered by the MTF Provider(s) and shall be reserved pursuant to the applicable terms and conditions of this Schedule 18. MTF Service shall be reserved through the MTF Provider pursuant to this Schedule 18. Service on the MTF requires advance reservations.

MTF Service is available to any Eligible Customer unless an MTF Provider has informed the ISO that MTF Service shall not be made available to such Eligible Customer due to that Customer's failure to make necessary payments for previously assessed MTF Service Charges or failure to meet the creditworthiness or operational requirements posted by the MTF Provider on the MTF Transmission Provider Page on the OASIS.

**3.3 Reservation of MTF Service:** An Eligible Customer requesting Firm or Non-Firm MTF Service shall comply with the applicable provisions of this Schedule 18.

4. Transmission Customer Responsibilities

**4.1 Conditions Required of Transmission Customers:** MTF Service will be provided by the MTF Provider only if the following conditions are satisfied by the Transmission Customer. Conditions (a) thru (e) apply to both Firm or Non-Firm MTF Service while (f) applies to Firm MTF Service only.

- (a) The Transmission Customer has pending a Completed Application for service;
- (b) The Transmission Customer meets the creditworthiness criteria set forth in the information posted by the MTF Provider on the MTF Transmission Provider Page on the OASIS.
- (c) The Transmission Customer and the MTF Provider have executed a MTF Transmission Service Agreement pursuant to this Schedule 18;
- (d) The Transmission Customer agrees to have arrangements in place for any other transmission service necessary to effect the delivery from the generating source to the Point of Receipt prior to the time service under this OATT commences;
- (e) The Transmission Customer agrees to submit External Transactions into the New England Markets in accordance with the applicable ISO System Rules; and
- (f) The Transmission Customer agrees to pay for any facilities or upgrades constructed or any Congestion Costs or other redispatch costs chargeable to such Transmission Customer under this Schedule 18, and the Transmission, Markets and Services Tariff, whether or not the Transmission Customer takes service for the full term of its MTF reservation.

**4.2 Transmission Customer Responsibility for Third-Party Arrangements:** Any arrangements for transmission service and the scheduling of capacity and energy that may be required by neighboring electric systems shall be the responsibility of the Transmission Customer requesting service. The Transmission Customer shall provide, unless waived by the ISO, notification to the ISO identifying such neighboring electric systems and authorizing them to schedule the capacity and energy to be transmitted pursuant to this OATT on behalf of the Receiving Party at the Point of Delivery or the Delivering Party at the Point of Receipt. The Transmission Customer shall arrange for transmission service, as necessary, in accordance with this OATT, including Schedules 8, 9, 20 and 21. The ISO will undertake reasonable

efforts to assist the Transmission Customer in making such arrangements, including without limitation, providing any information or data required by such other electric system pursuant to Good Utility Practice.

# 5. Procedures for Arranging Firm MTF Service

**5.1 Application:** Eligible Customers seeking MTF Service must submit a Completed Application for MTF Service to the MTF Provider. MTF Service Applications should be submitted by entering the information listed below in the MTF Transmission Provider Pages on the OASIS. MTF Service requests should be submitted by transmitting the Completed Application in accordance with the MTF Transmission Provider's rules, as posted on the MTF Transmission Provider Page on the OASIS.

# 5.2 Request for Firm MTF Service

- (a) Timing: A request for Firm MTF Service for periods of one (1) year or longer must be made in an Application, delivered to the MTF Provider at their place of business. The request should be delivered at least sixty (60) days in advance of the calendar month in which service is requested to commence. The MTF Provider will consider requests for such Firm MTF Service on shorter notice when practicable. Requests for Firm MTF Service for periods of less than one (1) year will be subject to expedited procedures that will be negotiated between the MTF Provider and the party requesting service within the time constraints provided in this Schedule 18.
- (b) Completed Application: A Completed Application for Firm Point-To-Point Service shall provide all of the information included at 18 C.F.R. § 2.20 of the Commission's regulations, including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

- (ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under this Schedule 18;
- (iii) The location of the Point(s) of Receipt and Point(s) of Delivery and the identities of the Delivering Parties and the Receiving Parties;

- (iv) An estimate of the capacity and energy expected to be delivered to the Receiving Party;
- (v) The Service Commencement Date and the term of the requested MTF transmission service; and
- (vi) The transmission capacity requested for each Point of Receipt and each Point of Delivery on the PTF, MTF or OTF. Customers may combine their requests for service in order to satisfy the minimum transmission capacity requirement.
- (vii) In addition to the information specified above and when required to properly evaluate the application for service, the MTF Provider also may request that the eligible Customer provider the following:

• The location of the generating facility(ies) supplying the capacity and energy, and the location of the load ultimately served by the capacity and energy transmitted. The MTF Provider will treat this information as confidential in accordance with the MTF Provider's information policy except to the extent that disclosure of such information is required by this Schedule 18, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice; and

• A description of the supply characteristics of the capacity and energy to be delivered.

The MTF Provider will treat this information in (vii) as confidential at the request of the Transmission Customer except to the extent that disclosure of this information is required by the MTF Transmission Service Agreement, MTF Provider's Business Practices, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice. The MTF Provider will treat this information consistent with the standards of conduct contained in 18 C.F.R. Part 37 of the Commission's regulations.

## 5.3 Request for Non-Firm MTF Service

(a) Timing: When required, requests for monthly service shall be submitted no earlier than sixty (60) days before service is to commence; requests for weekly service shall be submitted no earlier than fourteen (14) days before service is to commence; requests for daily service shall be submitted no earlier than five (5) days before service is to

commence; and requests for hourly service shall be submitted no earlier than 9:00 a.m. the second day before service is to commence. Requests for service received later than noon of the day prior to the day service is scheduled to commence will be accommodated if practicable.

(b) **Completed Application:** A Completed Application for MTF Service shall provide all of the information included in 18 C.F.R. §2.20 including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

- (ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under this Schedule 18;
- (iii) The Point(s) of Receipt and the Point(s) of Delivery;
- (iv) The maximum amount of capacity requested at each Point of Receipt and Point of Delivery; and

(v) The proposed dates and hours for initiating and terminating transmission service hereunder.

- (vi) In addition to the information specified above, when required to properly evaluate the application for service, the MTF Provider also may ask the Transmission Customer to provide the following:
- The electrical location of the initial source of the power to be transmitted pursuant to the Transmission Customer's request for service; and
- The electrical location of the ultimate load.

The MTF Provider will treat this information in (vi.) as confidential at the request of the Transmission Customer except to the extent that disclosure of this information is required by the MTO pursuant to this Schedule 18, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice. The MTF Provider shall treat this information consistent with the standards of conduct contained in Part 37 of the Commission's regulations.

5.4 **Deposit:** If required by the MTF Provider, a Completed Application for MTF Service by a Transmission Customer shall also include a deposit of no more than (a) one (1) month's charge for Reserved Capacity over the MTF for service requests of one (1) month or greater or (b) the full charge for Reserved Capacity over the MTF for service requests of less than one (1) month. If the Application for MTF Service is rejected by the MTF Provider because it does not meet the conditions for service as set forth herein, or in the case of requests for service arising in connection with losing bidders in a request for proposals (RFP), the deposit will be returned with Interest, less any reasonable administrative costs incurred by the MTF Provider, the ISO or any affected Transmission Owners in connection with the review of the Application for MTF Service. The deposit also will be returned with Interest, less any reasonable administrative costs incurred by the MTF Provider, the ISO or any affected Transmission Owners if the new facilities or upgrades needed to provide the service cannot be completed. If an Application for MTF Service is withdrawn or the Eligible Customer decides not to enter into a MTF Transmission Service Agreement, the deposit will be refunded in full, with Interest, less reasonable administrative costs incurred by the MTF Provider, the ISO or any affected Transmission Owners to the extent such costs have not already been recovered from the Eligible Customer. The MTF Provider will provide to the Eligible Customer a complete accounting of all costs deducted from the refunded deposit, which the Eligible Customer may contest if there is a dispute concerning the deducted costs. Deposits associated with construction of new facilities or upgrades are subject to the provisions of this OATT. If a MTF Transmission Service Agreement for MTF Service is executed, the deposit, with Interest, will be returned to the Transmission Customer upon expiration or termination of the MTF Transmission Service Agreement. Applicable Interest will be calculated from the day the deposit is credited to the MTF Provider's account.

**5.5** Notice of Deficient Application: If an Application for MTF Service fails to meet the requirements of this Schedule 18, the MTF Provider will notify the entity requesting service within fifteen (15) days of the MTF Provider's receipt of the Application for MTF Service of the reasons for such failure. The MTF Provider will attempt to remedy minor deficiencies in the Application for MTF Service through informal communications with the Eligible Customer. If such efforts are unsuccessful, the MTF Provider will return the Application for MTF Service, along with any deposit (less the reasonable administrative costs incurred by the MTF Provider, the ISO or any affected Transmission Owners in connection with the Application for MTF Service), with Interest. Upon receipt of a new or revised

Application for MTF Service that fully complies with the requirements of this Schedule 18, the Eligible Customer will be assigned a new reservation priority based upon the date of receipt by the MTF Provider of the new or revised Application for MTF Service.

**5.6 Response to a Completed Application:** Following receipt of a Completed Application the Eligible Customer will be notified as soon as practicable, but not later than thirty (30) days after the date of receipt of a Completed Application for MTF Service. Responses by the MTF Provider must be made as soon as practicable to all Completed Applications for MTF Service and the timing of such responses must be made on a nondiscriminatory basis.

**5.7 Execution of MTF Transmission Service Agreement:** Whenever the MTF Provider determines that a System Impact Study is not required and that the requested service can be provided, it will notify the Eligible Customer as soon as practicable but no later than thirty (30) days after receipt of the Completed Application for MTF Service, and will tender a MTF Transmission Service Agreement to the Eligible Customer. Failure of an Eligible Customer to execute and return the MTF Transmission Service Agreement or request the filing of an unexecuted MTF Transmission Service Agreement, within fifteen (15) days after it is tendered by the MTF Provider shall be deemed a withdrawal and termination of the Application for MTF Service and any deposit (less the reasonable administrative costs incurred by the MTF Provider, the ISO and any affected Transmission Owners in connection with the Application for MTF Service) submitted will be refunded with Interest. Nothing herein limits the right of an Eligible Customer to file another Application for MTF Service after such withdrawal and termination. Where a System Impact Study is required, the provisions of this Schedule 18 will govern the execution of a MTF Transmission Service Agreement.

(a) Extensions for Commencement of Firm MTF Service: The Transmission Customer can obtain, subject to availability, up to five one-year extensions for the commencement of service. The Transmission Customer may postpone service by paying a non-refundable annual reservation fee equal to one-month's charge for Firm MTF Service for each year or fraction thereof within 15 days of notifying the MTF Provider that it intends to extend the commencement of service. If during any extension for the commencement of service an Eligible Customer submits a Completed Application for Firm MTF Service, and such request can be satisfied only by releasing all or part of the Transmission Customer's Reserved Capacity over the MTF, the original Reserved Capacity over the MTF will be released unless the following condition is satisfied: within thirty (30) days, the original Transmission Customer agrees to pay the applicable rate for Firm MTF Service for its Reserved Capacity over the MTF for the period that its reservation overlaps the period covered by such Eligible Customer's Completed Application for MTF Service. In the event the Transmission Customer elects to release the Reserved Capacity over the MTF, the reservation fees or portions thereof previously paid will be forfeited.

5.8 Confidentiality of Information and Standards of Conduct. The MTF Provider will treat all information included in the Application as confidential in accordance with the MTF Provider's information policy except to the extent that disclosure of such information is required by this Schedule 18, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice. The MTF Provider will treat this information consistent with the standards of conduct contained in 18 C.F.R. Part 37 of the Commission's regulations.

#### 6. Determination of Available Transfer Capability

Following approval of a tendered application for MTF Service, the MTF Provider will make a determination on a non-discriminatory basis of Available Transfer Capability pursuant to this Schedule 18 and Attachment C to this OATT. Such determination shall be made as soon as reasonably practicable after receipt, but not later than the following time periods for the following terms of service (i) thirty-five (35) minutes for hourly service, (ii) thirty-five (35) minutes for daily service, (iii) four (4) hours for weekly service, and (iv) two (2) days for monthly service.

# 7. Payment for MTF Service

A Transmission Customer shall pay the MTF Service Charge to the MTF Provider, or its designated agent, if the Customer: (i) receives Firm or Non-Firm MTF Service based upon an allocation of rights to transmission service over the MTF awarded to the Transmission Customer through a Commission-approved rights allocation process; (ii) reserves on the MTF Transmission Provider Page transfer capability over the MTF not initially allocated in the Commission-approved rights allocation process; or (iii) reserves on the MTF Transmission Provider Page transfer capability over the MTF Transmission Provider Page transfer capability over the MTF made available as a result of an assignment by a rights holder of MTF transfer capability, a default release pursuant to rules filed with the Commission and business practices or a capability forfeiture by a rights holder for non-use consistent with the terms of a Commission-approved rights allocation. The Transmission Customer will be billed for its Reserved Capacity over the MTF under the terms of this Schedule 18 for MTF.

# 8. Changes in Service Specifications of MTF Service

**8.1 Modification on a Firm Basis:** Any request by a Transmission Customer to modify Point(s) of Receipt and Point(s) of Delivery on a firm basis shall be treated as a new request for MTF Service in accordance with this Schedule 18, except that such Transmission Customer shall not be obligated to pay any additional deposit if the capacity reservation over the MTF does not exceed the amount reserved in the existing MTF Transmission Service Agreement. While such new request is pending, the Transmission Customer shall retain its reservation priority for service at the firm Point(s) of Receipt and Point(s) of Delivery specified in the Transmission Customer's MTF Transmission Service Agreement.

**8.2 Modifications on a Non-Firm Basis:** The Transmission Customer taking Firm MTF Service may submit a request to the MTF Provider for transmission service on a non-firm basis over Point(s) of Receipt and Point(s) of Delivery other than those specified in the MTF Transmission Service Agreement ("Secondary Receipt and Delivery Points"), in amounts not to exceed the Transmission Customer's firm capacity reservation over the MTF, without incurring an additional Non-Firm MTF Service charge or executing a new MTF Transmission Service Agreement, subject to the following conditions:

- (a) service provided over Secondary Receipt and Delivery Points will be non-firm only, on an as-available basis, and will not displace any firm or non-firm service reserved or scheduled by Transmission Customers under this OATT or by the Transmission Customers on behalf of their Native Load Customers or Excepted Transactions;
- (b) the Transmission Customer shall retain its right to schedule Firm MTF Service at the Point(s) of Receipt and Point(s) of Delivery specified in the relevant MTF Transmission Service Agreement in the amount of the Transmission Customer's original capacity reservation over the MTF; and
- (c) service over Secondary Receipt and Delivery Points on a non-firm basis shall not require the filing of an Application for Non-Firm MTF Service under the OATT. However, all other requirements of this OATT (except as to transmission rates) shall apply to transmission service on a non-firm basis over Secondary Receipt and Delivery Points.

#### 9. Sale, Assignment or Transfer of MTF Service

9.1 Procedures for Sale, Assignment or Transfer of Service: Pursuant to Commission-approved rules posted by the MTF Provider on the MTF Transmission Provider Pages on the OASIS, a Transmission Customer may sell, assign, or transfer all or a portion of its rights under its MTF Transmission Service Agreement, but only to another Eligible Customer (the "Assignee"). The Transmission Customer that sells, assigns or transfers its rights under its MTF Transmission Service Agreement is hereafter referred to as the "Reseller." Compensation to the Reseller shall be at rates established by the Reseller and posted on the MTF Transmission Provider Page. The Assignee must execute a service agreement with the MTF Provider governing reassignments of transmission service prior to the date on which the reassigned service. If the Assignee does not request any change in the Point(s) of Receipt or the Point(s) of Delivery, or a change in any other term or condition set forth in the original MTF Transmission Service Agreement, the Assignee shall receive the same services as did the Reseller and the transmission priority of service for the Assignee shall be the same as that of the Reseller. A Reseller shall notify the MTF Provider as soon as possible after any sale, assignment or transfer of service occurs, but in any event, notification must be provided prior to any provision of service to the Assignee. The Assignee shall be subject to all terms and conditions of this Schedule 18. If the Assignee requests a change in service, the reservation priority of service will be determined by the MTF Provider pursuant to this Schedule 18.

**9.2 Limitations on and Obligations of Assignment or Transfer of Service:** If the Assignee requests a change in the Point(s) of Receipt or Point(s) of Delivery, or a change in any other specifications set forth in the original MTF Transmission Service Agreement, the MTF Provider will consent to such change subject to the provisions of this Schedule 18, provided that the change will not impair the operation and reliability of the Market Participants' generation systems or TO's transmission or distribution systems. The Assignee shall compensate the MTF Provider, the ISO and any affected Transmission Owner for performing any System Impact Study needed to evaluate the capability of the MTF to accommodate the proposed change and any additional costs resulting from such change. The Reseller shall remain liable for the performance of all obligations under the MTF Transmission Service Agreement, except as specifically agreed to by the MTF Provider, the Reseller and the Assignee through an amendment to the MTF Transmission Service Agreement.

**9.3 Information on Assignment or Transfer of Service:** All re-sales or assignments of capacity must be conducted through or otherwise posted on the MTF Transmission Provider Page on or before the date the reassigned service commences and are subject to Section 9.1 of this Schedule 18. In accordance with this

Schedule 18, Transmission Customers may also use the MTF Transmission Provider Page to post information regarding transmission capacity over the MTF available for resale.

#### 10. Real Power Losses

Real power losses across MTF shall be allocated solely to Transmission Customers that use MTF. Such allocation for transactions across MTF shall be pursuant to the Transmission, Markets and Services Tariff.

## 11. No Obligation to Build

The MTF Provider status under the OATT shall not impose an obligation to build transmission facilities on the MTF Provider. The offering of MTF Service under this OATT shall not impose an obligation to build transmission facilities on the Market Participants, Transmission Owners or the ISO.

## 12. No Effect on Rates; No Allocation of Revenues

MTF and MTF Service shall not affect rates for service on the PTF under this OATT and MTF Providers shall not be allocated any revenues collected under this OATT for such service.

## 13. Ancillary Services

Ancillary Services costs associated with MTF Service shall be assessed pursuant to this Tariff.

#### 14. Congestion Costs and FTRs

Pursuant to the Transmission, Markets and Services Tariff, Congestion Costs will not be calculated, and therefore FTRs will not be offered, between any set of points on the MTF, so long as it remains MTF. Transmission Customers taking MTF Service, however, shall be subject to applicable Congestion Costs for any use of the PTF.

# SCHEDULE 18 - IMPLEMENTATION RULE CROSS-SOUND CABLE COMPANY, LLC PROCEDURES FOR THE REASSIGNMENT OF TRANSMISSION RIGHTS

The procedures for reassignment of CSC transmission rights are consistent with, and supplement, the provisions of the ISO-NE OATT governing the provision of MTF Service. The applicable ISO-NE OATT rules include ISO-NE OATT Schedule 18 and ISO-NE OATT Section II.44. The following procedures will apply to the release of unused transfer capability to third parties:

## 1. Definitions

- (a) "CSC" means the Cross Sound Cable.
- (b) "CSC LLC" means Cross-Sound Cable Company, LLC.
- (c) "CSC OASIS" means the CSC node on the ISO-NE OASIS site of the CSC.
- (d) "External Transaction" means a transaction as defined under Market Rule 1.
- (e) **"Firm MTF Service**" means firm service held by the primary rights holder to the transmission rights over the CSC.
- (f) "ISO-NE" means ISO New England, Inc.
- (g) "ISO-NE OATT" means the ISO-NE Open Access Transmission Tariff (Section II of the ISO-NE Transmission, Markets and Services Tariff), on file with the Federal Energy Regulatory Commission, as modified and amended from time to time.
- (h) "MTF Service" means service over the CSC taken under Schedule 18 and other relevant portions of the ISO-NE OATT.
- (i) "MTF Service Agreement" refers to the service agreement contained in Attachment A to Schedule 18 in the ISO-NE OATT, as modified and amended from time to time.

- (j) "New England OASIS" means the OASIS site of the New England System Operator.
- (k) "Non-Firm MTF Service" refers to any service over the CSC that is not Firm MTF Service.
- (I) "NYISO" refers to the New York Independent System Operator, Inc.
- (m) "OASIS" means Open Access Same Time Information System.
- (n) "Rights Holder" refers to the entity or entities that have an executed MTF Service Agreement for Firm MTF Service.
- (o) "System Operator" refers to the ISO-NE or any other entity that in the future has operational control over the CSC.

## 2. Process for Release

The release of unused transfer capability will be facilitated through the posting of available transfer capability on the CSC OASIS site. The posting of such releases and notices of assignment shall be consistent with FERC procedures regarding OASIS postings.

#### 3. Character of Service to be Released

Unless otherwise posted on the CSC OASIS, all releases of transfer capability will be for Non-Firm MTF Service. Such Non-Firm MTF Service may be released on a monthly, weekly, daily or hourly basis. MTF Service is unidirectional (i.e. scheduling from New Haven to Shoreham as an export transaction from New England or Shoreham to New Haven as an import transaction into New England). The characteristics of Firm MTF Service and Non-Firm MTF Service are set forth in Schedule 18 of the ISO-NE OATT.

#### 4. Assignment of Rights Holders' MTF Service Reservation

A Rights Holder may separately assign its advance reservation for MTF Service to third parties provided that notice of such assignment is provided to CSC LLC and ISO-NE with such information then posted on the CSC OASIS. The assignment of such advance reservation may be on either a firm or non-firm basis, be in whole or in part, in segments, on a full or partial term basis, with or without recall rights or any combination thereof.

# 5. Transmission Customers

Market participants seeking to acquire an advance reservation over the CSC must meet the creditworthiness and financial security standards established by CSC LLC and the relevant Rights Holder and have an executed MTF Service Agreement.

#### 6. Timing of Release

Rights Holder(s) shall notify CSC LLC and ISO-NE of the release of any transfer capability on a Monthly, Weekly, Daily and Hourly basis in accordance with the deadlines set forth below. All releases of transfer capability shall be posted on the CSC OASIS through an automated notification procedure.

a. Monthly Releases:

• No later than 7 calendar days

- b. Weekly Releases:No later than 3 calendar days
- c. Daily Releases:

• No later than Noon on the day before the Operating Day.

- **d.** Hourly Release:
  - No later than Noon on the day before the Operating Day.

The deadlines set forth above address voluntary releases of a Rights Holders' transfer capability to facilitate full access to transfer capability for third parties. Automatic release of transfer capability due to a Rights Holders' failure to schedule transmission service over the CSC is governed by and set forth below in the "Default Release" provision.

# 7. Award of Reservations

Releases of advance reservations for CSC transfer capability and bids for such advance reservations shall be submitted to the Transmission Provider via the CSC OASIS. The award of reservations shall be accomplished through either: (1) a public auction process conducted by the Rights Holder, with the released capability awarded to the highest bidder; or (2) the posting of released capability at a specified rate on the CSC OASIS, with the award of such capability performed on a first-come, first served basis for bidders that meet the posted rate for such capability. The rate for assignment either through a public

auction process or through a posting on the CSC OASIS shall be as determined by Section 9 of Schedule 18 of the ISO-NE OATT, and shall be posted on the CSC OASIS.

### 8. Effect of Advance Reservation

The issuance of an advance reservation is a prerequisite to scheduling an External Transaction in the ISO-NE Real-Time Energy Market that involves the use of the CSC. A party holding an advance reservation for Firm MTF Service or Non-Firm MTF Service and otherwise meeting the qualifications for submitting transactions under the ISO-NE OATT may submit scheduling transactions with ISO-NE that involve the submission of a bid/offer at the Shoreham node.

#### 9. Default Release

In the event that a Rights Holder or any other holder of an advance reservation for MTF Service fails to submit a schedule for its full MTF Service reservation by Noon of the day prior to the Operating Day, the difference between all remaining advance reservations for which accepted bids/offers have been submitted to the New England energy market by advance reservation holders and the Total Transfer Capability over the CSC in the scheduling hour shall be automatically released for scheduling by third parties and posted on the CSC as Available Transfer Capability. Advance reservations for released capability under default release rules will be issued on a first-come, first-served basis through the CSC OASIS.

#### 10. Priority of Capability Released Under the Default Release Provisions

Reservations for CSC transfer capability released due to the default release provisions shall be deemed Non-Firm MTF Service and assigned the NERC transmission service priority "2" (Hourly Non-Firm).

# 11. Curtailment and Interruptions of Service over MTF

Curtailment and interruptions of service over the CSC required to be initiated by the System Operator pursuant to the ISO-NE system rules or in response to conditions or constraints within the New York Control Area identified by the NYISO as requiring curtailment or interruption of service shall be based upon transmission priority. For Firm MTF Service, curtailment or interruptions within each reservation classification will be performed on a pro rata basis. Curtailment and interruptions within each reservation classification of Non-Firm MTF Service (i.e. Monthly, Weekly, Daily, Hourly) will be based upon the time stamp associated with the submission of valid bids/offers to the ISO-NE Real-Time Market. Curtailments and interruptions of service over the CSC that relate to conditions or constraints on the Pool Transmission Facilities that may otherwise affect service over the CSC will be conducted consistent with the priorities established in the ISO-NE Operating Procedures. The NYISO is responsible for determining the need for any curtailments and interruptions of service relating to conditions or constraints within the New York Control Area consistent with the priorities established by the NYISO's administration of its tariffs and procedures and will communicate the need for such curtailments or interruptions to the System Operator for implementation in compliance with prescribed NERC Policies.

#### 12. Liability

The Transmission Provider and any Rights Holder releasing its advance reservation through the voluntary or default release procedures of these rules shall be held harmless with regard to any claim which may be raised by any party regarding the selection of a bid, except to the extent that such party successfully establishes that the Transmission Provider or the Rights Holder, as the case may be, has incorrectly selected the bidder as the result of gross negligence or willful misconduct.

## 13. Billing

A party holding advance reservation through releases in accordance with these CSC Releases shall be billed by the Transmission Provider and shall make payments to the Transmission Provider in accordance with the terms of the Service Agreements and the Transmission Provider shall simultaneously credit (on a contingent basis) all reservation charges billed the party releasing such advance reservation. If party acquiring advance reservations through releases fails to pay the reservation charges by the due date, the Transmission Provider shall reverse the credit and bill the party releasing such advance reservation for said reservation charges, plus interest, and the advance reservation shall, at the election of the releasing party, revert to the releasing party for the remaining term of the release.

# SCHEDULE 18 - ATTACHMENTS SCHEDULE 18 - ATTACHMENT A

# Form of Blanket Service Agreement for MTF Service over the Cross Sound Cable Reserved via the Cross Sound Cable Transmission Provider Page on the ISO New England Inc. OASIS Node

1.0 This Service Agreement, dated as of \_\_\_\_\_\_, is entered into, by and between Cross-Sound Cable Company, LLC ("CSC LLC") and \_\_\_\_\_ ("Transmission Customer").

2.0 The Transmission Customer has been determined by CSC LLC to have a Completed Application for [Firm] [Non-Firm] MTF Transmission Service under the ISO New England Inc. ("ISO-NE")

Transmission, Markets and Services Tariff ("Tariff") and the Cross Sound Cable Business Practices.

- **3.0** If required, the Transmission Customer has provided to CSC LLC an Application deposit in accordance with the provisions of the Tariff and the Cross Sound Cable Business Practices.
- **4.0** MTF Service under this Service Agreement shall commence on the later of (1) the requested service commencement date, or (2) the date on which construction or any Direct Assignment Facilities and/or facility additions or upgrades are completed, or (3) such other date as it is permitted to become effective by the Commission. MTF Service under this Service Agreement shall terminate on such date as is mutually agreed upon by the parties. [The Service Agreement may include a blanket agreement for non-firmMTF service.]
- 5.0 CSC LLC agrees to provide, and the Transmission Customer agrees to take and pay for, Transmission Service in accordance with the provisions of Schedule 18 of the Tariff (or its successor tariff), the Cross Sound Cable Business Practices, the Schedule 18 Implementation Rule -Cross-Sound Cable Company, LLC Procedures for the Reassignment of Transmission Rights and this Service Agreement.
- **6.0** Any notice or request made to or by either party regarding this Service Agreement shall be made to the representative of the other party as indicated below, and shall be copied to the System Operator at the address below.

CSC LLC:

Cross-Sound Cable Company, LLC 200 Donald Lynch Blvd. Marlborough, MA 01752

Transmission Customer:

System Operator:

ISO New England Inc. One Sullivan Road Holyoke, MA 01040

7.0 The Tariff, including Schedule 18 and the Schedule 18 Implementation Rule, is incorporated in this Service Agreement and made a part hereof, except that all financial assurance requirements, billing arrangements, payment obligations and liabilities associated with MTF Service shall be solely the responsibility of CSC LLC and the Transmission Customer under this Service Agreement.

IN WITNESS WHEREOF, the Parties have caused this Service Agreement to be executed by their respective authorized officials.

Cross-Sound Cable Company, LLC:

Ву:		
Name	Title	Date
Transmission Customer:		
Ву:		
Name	Title	Date

# Specifications For MTF Service over the Cross Sound Cable Reserved via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS Node

A Transmission Customer must acquire an advance reservation for Firm MTF Service or Non-Firm MTF Service. The issuance of an advance reservation is a prerequisite to scheduling an External Transaction over the Cross Sound Cable in the ISO New England Real-Time Energy Market. While not required, an advance reservation for the ISO New England Day Ahead Market is highly recommended, as absent an advance reservation the financial transaction in the Day Ahead Market will not be supported by a corresponding External Transaction in the Real-Time Energy market, thus creating significant financial risks to the transacting party. A party holding an advance reservation and otherwise meeting the qualifications for submitting transactions under the ISO New England, Inc. ("ISO-NE") Transmission, Markets and Services Tariff ("Tariff") may submit scheduling transactions over the Cross Sound Cable with ISO-NE up to the total MW amount of the advance reservation.

1.0	Term of Transaction:	As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node
	Start Date:	As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node
	Termination Date:	As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node

2.0 Description of capacity and energy to be transmitted by Participants including the electric Control Area in which the transaction originates: As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the CSC OASIS node

3.0	Point(s) of Receipt:	Either Shoreham Substation in Brookhaven, New York, or East Shore Substation in New Haven, Connecticut, as specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node	
	Delivering party:	The Transmission Customer	
4.0	Point(s) of Delivery:	Either Shoreham Substation in Brookhaven, New York, or East Shore Substation in New Haven, Connecticut, as specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node	
	Receiving party:	The Transmission Customer	
5.0	Maximum amount of capacity and energy to be transmitted (Reserved Capacity): As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node		
6.0	Designation of party(ies) or other entity(ies) subject to reciprocal transmission service obligation: Not applicable		
7.0	Name(s) of any intervening systems providing transmission service: New York ISO or ISO-NE pursuant to their respective tariffs		
8.0	<b>8.0</b> MTF Service under this Service Agreement may be subject to some combination of the charges detailed below. (The appropriate charges for individual transactions will be determined in accordance with the terms and conditions of this Tariff.)		
8.1	MTF Transmission Charge: As specified in the Transmission Customer's advance reservation via the Cross Sound Cable Transmission Provider Page on the ISO-NE OASIS node		
8.2	System Impact Study a	and/or Facilities Study Charge(s): Not applicable	
8.3	Direct assignment expansion charge: Not applicable		
		Page 26	

# SCHEDULE 18 - ATTACHMENT C Cross-Sound Cable TTC, CBM, TRM and ATC Methodology Version 2.0; Issued: December 22, 2010

#### 1. Introduction

Cross-Sound Cable ("CSC") is an HVDC Transmission Facility located between New Haven, CT and Shoreham, NY (Long Island). The CSC is owned and operated by Cross-Sound Cable Company, LLC ("CSC LLC"). CSC LLC operates as Transmission Service Provider ("TSP") for the CSC, which is a Merchant Transmission Facility ("MTF") within the ISO New England ("ISO-NE") regional transmission organization ("RTO"). ISO-NE serves the New England states through reliable minute to minute operation of the New England Bulk Power System; development, oversight, and fair administration of New England's wholesale market; and management of comprehensive bulk electric power system and wholesale markets' planning processes. ISO-NE serves as the Balancing Authority for the New England Area ("ISO-NE Area"). The ISO-NE Area is interconnected to three neighboring Balancing Authority Areas ("BAAs"): New Brunswick System Operator Balancing Authority Area ("NBSO BAA"), New York Independent System Operator Balancing Authority Area ("NYISO BAA"), and Hydro-Quebec TransEnergie Balancing Authority Area ("HQTE BAA"). As the RTO for New England, ISO-NE performs the reliability functions related to the calculation of Total Transfer Capability ("TTC") for all of the external interfaces between the ISO Area and its neighboring Balancing Authority Areas and for the internal interfaces between the Pool Transmission Facilities ("PTF"), Other Transmission Facilities ("OTF") and MTF such as the CSC. As a TSP offering MTF service pursuant to Schedule 18 of the ISO-NE Tariff, CSC LLC retains the responsibility for determining and posting the Available Transfer Capability ("ATC") of its facilities.

# 1.1. Scope of Document

This document addresses the following items with respect to the CSC between ISO-NE and NYISO for Schedule 18 MTF Service:

- Total Transfer Capability (TTC) methodology
- Capacity Benefit Margin (CBM) methodology
- Transmission Reliability Margin (TRM) methodology
- Available Transfer Capability (ATC) methodology

#### 1.2. Overview of Cross-Sound Cable

The Cross-Sound Cable is a 330 MW High Voltage Direct Current Merchant Transmission Facility with associated AC/DC converter stations that are directly interconnected with the 345 kV PTF in New Haven, CT at the East Shore substation, and 138 kV transmission facilities at the Shoreham substation in Long Island, NY. Firm Transmission Service for the entire transfer capability of the CSC was awarded to Long Island Power Authority ("LIPA") through an allocation process approved by the Federal Energy Regulatory Commission ("FERC"). To the extent that the entire capacity of this firm Existing Transmission Commitment ("ETC<sub>F</sub>") is unused by LIPA, secondary rights to use the MTF service is offered on an hourly non-firm basis for the remaining ATC through non-firm Existing Transmission Commitment ("ETC<sub>NF</sub>"). CSC ATC is described in section 5 below.

## 2. CSC Total Transfer Capability ("TTC")

The Total Transfer Capability or TTC for an interface is the best engineering estimate of the total amount of electric power that can be transferred over the interface in a reliable manner in a given time frame. ISO-NE, acting as the Transmission Operator ("TOP"), determines the TTC for the Cross-Sound Cable based on the equipment ratings and availability provided by CSC LLC and system conditions, then posts the TTC on the ISO-NE OASIS Node. Due to the controllable and bi-directional nature of CSC, it is treated as two separate and independent transmission paths for scheduling purposes. Flow from ISO-NE to NYISO is treated as Export with a maximum TTC of 330 MW delivered, while flow from NYISO to ISO-NE is treated as Import with a maximum TTC of 346 MW received. Cross-Sound Cable is operated in accordance with the requirements of TTC methodology are addressed in Sections 1 and 3 of the ISO-NE NE document "Attachment C Available Transfer Capability Methodology".

# 3. CSC Capacity Benefit Margin ("CBM")

The use of Capacity Benefit Margin or CBM within the ISO-NE Area is governed by the overall ISO-NE approach to capacity planning requirements. Load Serving Entities ("LSEs") operating within the ISO Area do not utilize CBM to ensure their capacity needs are met; therefore CBM is not applicable within the New England market design. Accordingly, for the purpose of ATC calculation, CBM for the New England Control Area, including CSC, is set to zero (0). For additional information on CBM, refer to Section 4 of the ISO-NE document "Attachment C Available Transfer Capability Methodology".

# 4. CSC Transmission Reliability Margin ("TRM")

The Transmission Reliability Margin or TRM is the amount of transmission transfer capability set aside to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as the system conditions change.

ISO-NE, acting as a Transmission Operator, calculates the TRM on the CSC MTF interface by taking into account any operational uncertainties with CSC in accordance with MOD-008. Typically the operational uncertainties associated with an external HVDC facility are minimal and result in a TRM value of zero (0), as is the case for CSC.

For additional information on TRM, refer to Section 5.2.1 Calculation of TRM for the MTF and OTF of the ISO-NE document "Attachment C Available Transfer Capability Methodology".

#### 5. CSC Available Transfer Capability ("ATC")

This section defines the Available Transfer Capability calculations performed for MTF service over the CSC. The general equation for calculation of ATC is derived from MOD-029 as follows:

ATC = TTC - ETC - CBM - TRM + Postbacks + Counterflows

The CBM and TRM Values have been previously discussed (CBM = 0, TRM = 0). The purpose of the ETC component of the ATC equation is for the TSP to define all elements that are reducing the amount of ATC available to market participants. Details regarding the ETC component, Postbacks and Counterflows of the ATC calculation and its impact on Firm and Non-firm ATC are described below.

# 5.1. Firm ATC for MTF Transmission Services

Firm Available Transfer Capability (" $ATC_F$ ") is defined as the capability for firm transmission reservations that remains after allowing for CBM, TRM and firm existing transmission commitments. As described in Section 1.2, CSC LLC has a long term contract with LIPA for Yearly Firm Transmission Service for the entire transfer capability of the CSC.

Firm ATC is calculated using the following equation:

 $ATC_F = TTC - ETC_F - CBM - TRM + Postbacks_F + Counterflows_F$ 

Where

ATC<sub>F</sub> is the firm Available Transfer Capability for the ATC path during the period.
TTC is the Total Transfer Capability for the ATC path during the period.
ETC<sub>F</sub> is the sum of firm Existing Transmission Commitments scheduled by LIPA in the Day Ahead Market, under contractual agreement, for the ATC path during the period.

CBM is set to 0 by ISO-NE per section 3 of this document.

TRM is set to 0 by ISO-NE per section 4 of this document.

Postbacks<sub>F</sub> is set to 0 because any changes to the  $ATC_F$  would be released as secondary market capacity resulting in a change to the  $ETC_{NF}$  value used to determine the resulting  $ATC_{NF}$ .

 $\label{eq:counterflows_F} \mbox{ is set to 0 because Export point-to-point flow and Import point-to-point flow are treated as two independent directional paths. Since CSC calculates ATC in both directions independently, there are no Counterflows by definition.$ 

Essentially,  $ATC_F$  is equal to zero (0) as  $ETC_F$  owned by LIPA over both directions of flow is equal to the entire TTC. The  $ATC_F$  will be equal to the TTC until LIPA schedules their actual transfers in the Day Ahead Market. At this point, any portion of the  $ETC_F$  that LIPA does not schedule will get released into the hourly market as  $ATC_{NF}$ .

#### 5.2. Non-Firm ATC for MTF Transmission Services

Non-firm Available Transfer Capability ("ATC<sub>NF</sub>") is defined as the capability for non-firm transmission reservations that remain after allowing for CBM, TRM, ETC<sub>F</sub> and non-firm Existing Transmission Commitments ("ETC<sub>NF</sub>") that have been Confirmed and Accepted. Although the entire TTC of the CSC is contracted to LIPA for Yearly Firm Transmission Service, any portion of the capacity that is not scheduled by LIPA in the Day-Ahead market will be released on an hourly non-firm basis. Customers may then purchase capacity in the Hourly Market, creating an ETC<sub>NF</sub> contract which will in turn reduce the ATC<sub>NF</sub>. Incorporating this into the determination of ATC, non-firm ATC is calculated using the following equation:

 $ATC_{NF} = TTC - ETC_F - ETC_{NF} - CBM_S - TRM_U + Postbacks_{NF} + Counterflows_{NF}$ 

Where

 $ATC_{NF}$  is the non-firm Available Transfer Capability for the ATC path during the period. TTC is the Total Transfer Capability for the ATC path during the period.

ETC<sub>F</sub> is the sum of firm Existing Transmission Commitments scheduled by LIPA in the Day Ahead Market, under contractual agreement, for the ATC path during the period.
ETC<sub>NF</sub> is the sum of non-firm Existing Transmission Commitments purchased by Secondary Market Customers in the Hourly Market, for the ATC path during the period.
CBM is set to 0 by ISO-NE per section 3 of this document.
TRM is set to 0 by ISO-NE per section 4 of this document.
Postbacks<sub>NF</sub> is set to 0 because any changes to the non-firm ATC would be re-released as secondary market capacity resulting in a change to the ETC<sub>NF</sub> value.
Counterflows<sub>NF</sub> is set to 0 because Export point-to-point flow and Import point-to-point flow are treated as two independent directional paths. Since CSC calculates ATC in both directions

independently, there are no Counterflows by definition.

Additional capacity may be purchased for MTF service on an Hourly non-firm basis until the  $ATC_{NF}$  equals zero (0) for the subject path. Purchases may take place on both paths individually up to their full TTC, which would effectively result in no transfer across CSC. In no case would purchases on one path result in increased ATC on the other path.

# 6. Posting of CSC ATC

#### 6.1. ATC Values

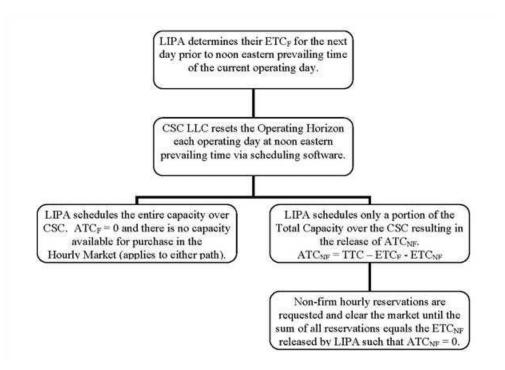
Using the process described in Section 5 above, the ATC calculations are performed for CSC automatically by the scheduling software. The ATC values for CSC are determined using the Mathematical Algorithms for Calculation of ATC

(https://www.oasis.oati.com/CSC/CSCdocs/Algorithms\_for\_ATC\_Calculation\_for\_CSC.pdf) and posted in accordance with NAESB standards on the CSC OASIS (https://www.oasis.oati.com/csc/index.html).

As discussed, firm ATC is equal to zero at all times. LIPA determines the  $ETC_F$  for the next day prior to noon eastern prevailing time of each operating day. CSC LLC then resets the Operating Horizon ("OH") through the scheduling software. The OH spans from noon of the current day through midnight of the next day, or for the next 36 hours calculating  $ATC_{NF}$  based on the  $ETC_F$  selected by LIPA.  $ATC_{NF}$  is calculated from the TTC and  $ETC_F$  and offered as non-firm Hourly MTF in the OH. Subsequent Capacity purchases are considered  $ETC_{NF}$ , which is then subtracted from the  $ATC_{NF}$ . Any changes to the  $ATC_{NF}$ are updated in real time through the scheduling software.

# 6.2. Diagram of Energy Transactions

Below is a diagram that describes how energy transactions are processed over the CSC interface. The timing of the submittal of the energy transactions is governed by the ISO-NE Market Rules.



# SCHEDULE 18 – ATTACHMENT L

**Creditworthiness Procedures** 

# I. Overview

The creditworthiness of each Transmission Customer seeking MTF Service must be established before receiving service from the MTF Provider. The MTF Provider shall make this credit review in accordance with procedures based on specific quantitative and qualitative criteria to determine the level of secured and unsecured credit required from the Transmission Customer. A summary of the MTF Provider's Creditworthiness Requirements are described in this Attachment L to Schedule 18. Detailed information regarding the MTF Provider's Creditworthiness Requirements is available in the MTF Provider's Business Practices as posted on the MTF Transmission Provider Page on the OASIS.

# II. Financial Information

Transmission Customers requesting MTF Service will be required to provide credit rating and financial information as part of the Credit Application for MTF Service. Required information may include: (a) all current credit rating reports from commercially accepted credit rating agencies including Standard and Poor's Inc. ("S&P"), Moody's Investors Service ("Moody's"), and Fitch Ratings ("Fitch"); (b) financial statements audited by a registered independent auditor; and (c) references from banks and utilities/vendors.

#### III. Creditworthiness Requirements and Process

Transmission Customers, rated and un-rated, will be required to meet the creditworthiness requirements specified in this Attachment L to Schedule 18 and the MTF Business Practices. Credit rating and financial information provided by Transmission Customers that would be used to establish creditworthiness include investment grade ratings for senior unsecured long-term debt and ratio analyses of audited financial statements. If the Customer does not meet the MTF Provider's creditworthiness requirements, the MTF Provider (at its discretion) may establish a credit limit for that Customer equal to the financial assurance (i.e., the security deposit) required from all Transmission Customers, as specified in this Attachment L to Schedule 18 and the MTF Provider's Business Practices.

The MTF Provider shall use the following criteria in reviewing the creditworthiness of Transmission Customers:

- 1. The Transmission Customer must meet and maintain the credit and financial assurance requirements applicable to market participants as established by ISO New England Inc.; and
- 2. The Transmission Customer must not be in default of any amounts owed to any MTF Providers.

If the Transmission Customer does not qualify using the above requirements, the MTF Provider may consider other qualitative factors on a case-by-case basis. The specific factors will depend upon the MTF Provider's Business Practices, and may include billing history and the Transmission Customer's anticipated use of the MTF service.

#### A. Procedure for Determining Creditworthiness

The MTF Service Credit Application is posted on the MTF Provider's OASIS and is available for download. The Credit Application may be submitted along with the Application for MTF Transmission Service. Because the amount of time required to complete the credit review varies widely, it is recommended that credit applications be submitted at least ten (10) business days before the Transmission Customer takes service for the first time. As part of the credit review process, the MTF Provider will assign a credit limit to each Transmission Customer. For a customer that holds a below investment grade rating from either S&P, Moody's or Fitch, or is not rated by any of those three rating agencies, the assigned credit limit will be the amount of the security deposit posted by such customer. For a customer that is rated by one or more of S&P, Moody's or Fitch and holds an investment grade rating from each agency that rates that customer, the credit limit will be established using standard commercial practices on a case-by-case basis based on an estimate of the customer's anticipated use of MTF Service.

#### IV. Financial Assurance

All Transmission Customers requesting MTF Service are required to submit a security deposit to the MTF Provider. For customers executing a Blanket MTF Transmission Service Agreement, the minimum security deposit shall be \$100,000.00, provided, however, that customers may choose to provide a higher security deposit. For customers executing a transaction-specific MTF Transmission Service Agreement, the security deposit requirement shall be determined on a case-by-case basis, the maximum security deposit that may be charged is equal to the cost of the Reserved Capacity over the MTF for the duration of the specific transaction. Security deposits will be held in separate accounts. Account statements will be provided to the customer on an annual basis upon request.

# V. Credit Levels

Transmission Customers meeting the above Creditworthiness Requirements will be extended credit based on levels specified in the MTF Provider's Business Practices. Transmission Customers that do not meet the MTF Provider's creditworthiness requirements will not receive unsecured credit from the MTF Provider. The MTF Provider will monitor the credit status of all approved customers and may modify credit limits (higher or lower) for such customer to the extent that company circumstances or service changes occur. In the event that a customer is downgraded such that it holds a below investment grade rating from S&P, Moody's or Fitch, or is not rated by any of the three agencies, the customer's credit limit shall be immediately reduced to the amount of security deposit posted by that customer.

# VI. Contesting Creditworthiness Determination

Should the MTF Provider reject a credit application, the MTF Provider will provide the customer the reasons for the rejection and an opportunity to revise and resubmit the credit application to address the identified deficiencies. Transmission Customers may also contest the MTF Provider's determination of creditworthiness by submitting a written request for re-evaluation. Such request should provide information supporting the basis for a request to re-evaluate a Transmission Customer's creditworthiness. The MTF Provider will review and respond to the request under the procedures outlined in this Attachment L to Schedule 18 and the MTF Provider's Business Practices.

# VII. Procedures for Changes in Credit Levels and Collateral Requirements

The MTF Provider will immediately notify customers of any modifications to credit limits or required security deposits. Upon request, the MTF Provider will provide customers a written explanation for any change in credit limits or required security deposits, including an opportunity to cure any credit deficiencies within a specified time period.

#### VIII. Posting Collateral Requirements

In the event that the MTF Providers revises the level of collateral required (e.g., security deposit) as a result of changes to the Transmission Customer's financial information, the MTF Provider's criteria, or other events that result in the Transmission Customer being determined to be non-creditworthy, the Transmission Customer shall have the opportunity to cure such deficiency consistent with the procedures in this Attachment L to Schedule 18 and the MTF Provider's Business Practices, as posted on the MTF Transmission Provider Page on the OASIS.

# IX. Additional Requirements

Along with the above criteria for determining creditworthiness, the MTF Provider may require the Transmission Customer to fulfill additional conditions under the MTF Provider's Business Practices, as posted on the MTF Transmission Provider Page on the OASIS.

# SCHEDULE 18 - ATTACHMENT Z Incorporation By Reference of NAESB Standards

In accordance with Commission Order No. 676- $\underline{H}$ , the NAESB <u>WEQ</u> Version 003 Standards listed below are hereby incorporated by reference to the extent that the requirements therein apply to Cross Sound Cable except as noted below:

- WEQ-000, Abbreviations, Acronyms, and Definition of Terms, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Oct. 4, 2012, Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-001, Open Access Same-Time Information Systems (OASIS), Version 2.0 WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013) excluding Standards , <u>-001-4.1, 001-4.7, 2.1, 001-9.15, 001-10.5, -through 001-10.8.7, 001-14.1.3, 001-15.1.2</u> and 001-106.2.5;
- WEQ-002, Open Access Same-Time Information Systems (OASIS) Business Practice Standards and Communication Protocols (S&CP), OASIS Version 2.0 WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- <u>WEQ-003</u>, Open Access Same-Time Information Systems (OASIS) Data Dictionary Business Practice Standards, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- —WEQ-004, Coordinate Interchange WEQ\_Version 003, July 31, 2012 (as modified by NAESB final actions ratified on December 28, 2012) excluding Standards 004-0.1 through 004-18.2, but including 004-A through 004-D;
- WEQ-005, Area Control Error (ACE) Equation Special Cases, WEQ Version 003, July 31, 2012;
- WEQ-006, Manual Time Error Correction, WEQ Version 003, July 31, 2012;

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WEQ-008, Transmission Loading Relief (TLR) – Eastern Interconnection, WEQ Version 003,		
July 31, 2012 (with minor corrections applied November 28, 2012);		
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WEQ-011, Gas/Electic Coordination, WEQ Version 003, July 31, 2012;		
WEQ-012, Public Key Infrastructure (PKI) WEQ Version 003, July 31, 2012, as modified by		
NAESB final actions ratified October 4, 2012102); March 11, 2009, with minor corrections		
applied on May 29, 2009 and September 8, 2009); and		
_WEQ-013, Open Access Same-Time Information Systems (OASIS) Implementation Guide,		
OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions		
ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013):-		
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WEQ-015, Measurement and Verification of Wholesale Electricity Demand Response, WEQ		
Version 003, July 31, 2012; and		
<u>version 005, July 51, 2012, and</u>		
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WEQ-021, Measurement and Verification of Energy Efficiency Products, WEQ Version 003,		
July 31, 2012.		
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CSC has requested waiver of the following NAESB Version 003 Standards, pursuant to a		<b>Formatted:</b> List Paragraph, Line spacing: single, No bullets or numbering
compliance filing submitted to the Commission on December 1, 2014 to comply with FERC-		Formatted: List Paragraph, Line spacing:
Order No. 676 H, Standards for Business Practices and Communication Protocols for Public		single
Utilities, 148 FERC ¶ 61,205 (2014), as modified by the Commission's October 3, 2014 Errata		
Notice, 149 FERC ¶ 61,014 (2014).		
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<u>WEQ-007, Inadvertent Interchange Payback, WEQ Version 003, July 31, 2012;</u> <u>WEQ-008, Transmission Loading Relief (TLR)</u> Eastern Interconnection, WEQ Version		
<u>WEQ-008, Fransmission Loading Relief (TLR)</u> Lastern Interconnection, WEQ Version 003, July 31, 2012 (with minor corrections applied November 28, 2012);		
WEO 011. Gas / Electric Coordination. WEO Version 003. July 31, 2012:		Formatted: Space After: 10 pt, Pattern:
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WEO Version 003, July 31, 2012; and-		Formatted: Font: Times New Roman

# WEQ-021, Measurement and Verification of Energy Efficiency Products, WEQ Version 003, July 31, 2012,-

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# SCHEDULE 20A POINT-TO-POINT SERVICE OVER THE PHASE I/II HVDC TRANSMISSION FACILITIES (PHASE I/II HVDC-TF SERVICE)

In order to ensure continuity of service to customers, all agreements for transmission service over the Phase I/II HVDC-TF in effect as of the effective date of this Schedule 20A will remain in full force and effect under this Schedule 20A. This Schedule 20A contains the general terms and conditions regarding the treatment of Phase I/II HVDC-TF Service under the Tariff. In the event of a conflict between the terms and conditions of Part I and Part II of this Schedule, the terms and conditions of Part II shall govern. Phase I/II HVDC-TF Service is a Point-To-Point Service offered by certain Interconnection Rights Holders ("IRH") under this Schedule 20A. Such IRH are referred to herein as the "Schedule 20A Service Providers", have Phase I/II HVDC-TF Service Schedules in Part II of this Schedule 20A, and are listed on the ISO OASIS. Phase I/II HVDC-TF Service shall be offered to Eligible Customers by Schedule 20A Service Providers through their Phase I/II HVDC-TF Transmission Provider Page in accordance with this Schedule 20A and the HVDC Transmission Operating Agreement and is subject to the rights and obligations of the IRHs under the Restated Use Agreement, the Support Agreements, and the Phase I/II HVDC-TF Transmission Service Administration Agreement. Phase I/II HVDC-TF Service under this Schedule 20A is offered by the Schedule 20A Service Providers based on their Use Rights and on any Use Rights that they offer on behalf of any other IRH that are not Schedule 20A Service Providers. Pursuant to Section 2 of Part 1 of this Schedule 20A and subject to mutually agreeable contractual arrangements, the Schedule 20A Service Providers will offer, through this Schedule 20A and their Phase I/II HVDC-TF Transmission Provider Page, the Use Rights of any IRHs that are not Schedule 20A Service Providers. This Schedule 20A also includes the specific rates, terms and conditions for Phase I/II HVDC-TF Service for individual Schedule 20A Service Providers. All Transmission Customers taking Phase I/II HVDC-TF Service shall be subject to and comply with the terms and conditions of this Schedule 20A and the Tariff. The specific terms and conditions for rates and charges of the individual Schedule 20A Service Providers' offering of their Phase I/II HVDC-TF Use Rights are found in the Phase I/II HVDC-TF Service Schedules in Part II of this Schedule 20A.

# I. PHASE I/II HVDC-TF POINT-TO-POINT SERVICE

#### 1. Definitions

Capitalized terms used and defined in this Schedule 20A shall have the meaning given them under this Schedule. Capitalized terms used and not defined in this Schedule 20A but defined in other sections of the Tariff shall have the meaning given them under those sections. Capitalized terms used in this Schedule 20A that are not defined in it or elsewhere in the Tariff shall have the meanings in the Restated Use Agreement or those customarily attributed to applicable criteria, rules, standards and operating procedures.

**1.1 Interconnection Rights Holders ("IRHs"):** means the entities that pay for and hold exclusive Use Rights to the transfer capability of the Phase I/II HVDC-TF, as granted under the Support Agreements and as further provided for under the Restated Use Agreement, either (i) directly, by virtue of being parties to the Support Agreements, or (ii) indirectly ("Indirect IRH(s)"), through a Transfer Agreement.

1.2 Phase I/II HVDC-TF: means the transmission facilities, identified in Schedule 2.01 (a) of the HVDC Transmission Operating Agreement or its successor schedule, constructed in two phases ("Phase I" and "Phase II") that comprise the United States segment of the 2000 MW transmission interconnection which connects the Hydro-Quebec TransÉnergie control area and the New England Control Area. Phase I is the United States portion of the 450 kV highvoltage, direct-current ("Phase I/II HVDC") transmission line from a terminal at the Des Cantons Substation on the Hydro-Quebec system near Sherbrooke, Quebec to a terminal with a nominal transfer capability of 690 MW at the Monroe Converter Station in New Hampshire. Phase II is the United States portion of the facilities required to increase to 2000 MW the nominal transfer capability of the Phase I/II HVDC-TF, including an extension of the Phase I/II HVDC transmission line from the terminus of Phase I at the Monroe Converter Station through New Hampshire to a terminal at the Sandy Pond Converter Station in Massachusetts. Phase I/II HVDC-TF is a form of OTF, as defined under Section II.1.85 of the Tariff.

1.3 Phase I/II HVDC-TF Owners: are: New England Hydro-Transmission Electric Company, Inc.; New England Hydro-Transmission Corporation; New England Electric Transmission Corporation; and Vermont Electric Transmission Company. The Phase I facilities in the United States are owned by New England Electric Transmission Corporation and Vermont Electric Transmission Company. The Phase II facilities in the United States are owned by New England Hydro-Transmission Electric Company, Inc. and New England Hydro-Transmission Corporation. The Phase I/II HVDC-TF Owners are parties to financial support agreements (the "Support Agreements") with the IRHs.

**1.4 Phase I/II HVDC-TF Service:** means Firm and Non-Firm Point-To-Point Service over the Phase I/II HVDC-TF.

**1.5 Phase I/II HVDC-TF Service Agreement:** means an executed or unexecuted agreement for Phase I/II HVDC-TF Service, as reflected in Attachment A to Part I of this Schedule 20A.

1.6 Phase I/II HVDC-TF Transmission Service Administration Agreement: means the agreement among the ISO, the Schedule 20A Service Providers, and the IRH Management Committee specifying the rights and obligations of the parties regarding transmission service over the Phase I/II HVDC-TF, dated April 1, 2005, as may be amended and restated from time to time, and any successor agreement.

1.7 Phase I/II HVDC-TF Service Charge: is the charge for Phase I/II HVDC-TF Service, which shall be determined pursuant to arrangements between the applicable Schedule 20A Service Provider and Eligible Customers that take Phase I/II HVDC-TF Service under this Schedule 20A. The charge for Phase I/II HVDC-TF Service shall be determined by the applicable Phase I/II HVDC-TF Service Schedule in Part II of this Schedule 20A.

**1.8** Phase I/II HVDC-TF Service Schedule: is an individual Schedule 20A Service Provider's schedule in Part II of this Schedule 20A that sets forth the terms and conditions for rates and charges, as applicable to Phase I/II HVDC-TF Service offered by that Schedule 20A Service Provider.

1.9 Phase I/II HVDC-TF Transmission Provider Page: means the respective Transmission Provider pages of the Schedule 20A Service Providers, which are located on the ISO OASIS, through which Phase I/II HVDC-TF Service is offered. Some of the information posted on the Transmission Provider pages of the Schedule 20A Service Providers shall include: values for Available Transmission Capability (ATC); offerings for Phase I/II HVDC-TF Service; and procedures for the application for and acquisition of Phase I/II HVDC-TF Service.

1.10 **Pre-Confirmed Request:** is an OASIS transmission service request that commits the Transmission Customer to take and pay for the requested Phase I/II HVDC-TF Service upon acceptance on OASIS by the Schedule 20A Service Provider that can provide the requested Phase I/II HVDC-TF Service.

1.11 **Restated Use Agreement:** is the Agreement among the IRH with respect to the Use Rights, dated as of December 1, 1981, as amended or restated as of September 1, 1985, November 19, 1997, April 8, 1998, and June 1, 2002, and as it may be further amended or restated from time to time.

**1.12** Schedule 20A Service Provider: is an individual IRH that has a Phase I/II HVDC-TF Service Schedule and offers its own Use Rights or the Use Rights of other IRHs under this Schedule 20A.

**1.12a Submittal Window:** is the 5 minute window, beginning immediately after the expiration of the "no earlier than" request time, within which all service requests will be deemed to have been submitted simultaneously.

**1.13 Support Agreements:** are the certain agreements between the Phase I/II HVDC-TF Owners and the IRH that are not Indirect IRHs, under which the IRH are granted the exclusive rights to the transfer capability of the Phase I/II HVDC-TF and the obligation to pay the costs of the Phase I/II HVDC-TF.

**1.14 Transfer Agreement:** is an agreement, pursuant to the Restated Use Agreement, under which an IRH may transfer all or part of its Use Rights to another entity for a specified period of time.

**1.15 Transmission Customer:** is, for purposes of this Schedule 20A, an Eligible Customer that is receiving or has received Phase I/II HVDC-TF Service.

**1.16** Use Rights: are the exclusive rights to the Combined Percentage Interest of the transfer capability of the Phase I/II HVDC-TF granted to the each of the IRH under the Support Agreement in exchange for the IRH's obligation to pay for the Phase I/II HVDC-TF. The maximum MW amount of Use Rights that a Schedule 20A Service Provider may make available is its Combined Percentage Interest times the posted TTC value, plus the maximum MW amount of Use Rights of any other IRH on whose behalf the Schedule 20A Service Provider is posting, rounded down to whole MW.

1.17 FERC: The Federal Energy Regulatory Commission.

# 2. Phase I/II HVDC-TF Service

Phase I/II HVDC-TF Service is a Point-To-Point Service offered by the Schedule 20A Service Providers over Phase I/II HVDC-TF using the transfer capability associated with their own Use Rights and the Use Rights of any other IRH that has contracted with a Schedule 20A Service Provider for the offering of Use Rights under this Schedule 20A. Not all IRHs are FERC-jurisdictional utilities and, as such, these IRHs are not required to offer transmission service for their share of the Phase I/II HVDC-TF. An IRH that is not a Schedule 20A Service Provider may, however, choose to make all or a portion of its rights available through an individual Schedule 20A Service Provider and its Phase I/II HVDC-TF Service Schedule by entering into a Transfer Agreement. Subject to a mutually agreeable Transfer Agreement and associated contractual arrangements, a Schedule 20A Service Provider will offer the Use Rights of any other IRH that wishes to make its Use Rights available under this Schedule 20A. In the event that the parties cannot agree on a Transfer Agreement and associated contractual arrangements, either party may petition the FERC for relief.

#### 2.1 Nature of Phase I/II HVDC-TF Service

#### (a) Term of Phase I/II HVDC-TF Service:

(i) Firm Phase I/II HVDC-TF Service: The minimum term of Firm Phase I/II HVDC-TF Service shall be one day and the maximum term shall be that specified in the Phase I/II HVDC-TF Service Agreement.

(ii) Non-Firm Phase I/II HVDC-TF Service: Non-Firm Phase I/II HVDC-TF Service will be available for periods ranging from one hour to one month and shall be that specified in the Phase I/II HVDC-TF Service Agreement. A Transmission Customer that purchases Non-Firm Phase I/II HVDC-TF Service will be entitled to reserve a sequential term of service (such as a sequential monthly term without having to wait for the initial term to expire before requesting another monthly term) so that the total time period for which the reservation applies may be greater than one month, subject to the requirements of this Schedule 20A.

(b) Reservation, Interruption and Curtailment Priority for Phase I/II HVDC-TF Service: (i) The Schedule 20A Service Providers, individually or collectively, shall post on the Phase I/II HVDC-TF Transmission Provider Page, rules setting reservation, interruption and Curtailment priorities for Firm and Non-Firm Phase I/II HVDC-TF Service. Such rules shall be non-discriminatory and consistent with Commission Orders and shall also be in accordance with the Restated Use Agreement.

In instances where an IRH is not a Schedule 20A Service Provider and it desires to offer its Use Rights, that IRH shall arrange for the posting of the associated transmission service and associated reservations on a Phase I/II HVDC-TF Transmission Provider Page.

Each Schedule 20A Service Provider shall be responsible for calculating the ATC for its Use Rights and for the Use Rights of any other IRH with whom it has contracted to offer such Use Rights, and for posting such ATC values on its Phase I/II HVDC-TF Transmission Provider Page.

Phase I/II HVDC-TF reservation priorities shall be established separately from PTF, other OTF or MTF reservation priorities.

(ii) If a Schedule 20A Service Provider fails to post such rules, then reservation, interruption and Curtailment priorities for Firm and Non-Firm Phase I/II HVDC-TF Service shall be those established by relevant reliability authorities (e.g., the Northeast Power Coordinating Council) and under such scheduling and curtailment rules as may be accepted and/or approved by the FERC for participation in the regional electricity markets.

(iii) Firm Phase I/II HVDC-TF Service Reservation Priority: The Phase I/II HVDC-TF reservation priority for either Long-Term or Short-Term Firm Phase I/II HVDC-TF Service shall be determined on a first come first served basis by the date and time of the service request, with requests received within the Submittal Window being subject to the procedures described in Section 2.1(b)(vi) below. However, Pre-Confirmed Requests for Short-Term Point-To-Point Transmission Service will receive priority over earlier-submitted requests that are not pre-confirmed and that have equal or shorter duration. Among requests with the same duration and, as relevant, pre-confirmation status (pre-confirmed or not pre-confirmed), priority will be given to a Transmission Customer's request that offers the highest price, followed by the date and time of the request.

If the Phase I/II HVDC-TF becomes oversubscribed, requests for service may preempt (iv) competing reservations up to the following conditional reservation deadlines: one day before the commencement of daily service, one week before the commencement of weekly service, and one month before the commencement of monthly service. Before the conditional reservation deadline, if available transfer capability is insufficient to satisfy all requests and reservations, a Transmission Customer with a reservation for shorter term service or equal duration service and lower price has the right of first refusal to match any longer term request or equal duration service with a higher price before losing its reservation priority. A longer term competing request for Firm Phase I/II HVDC-TF Service will be granted if the Transmission Customer with the right of first refusal does not agree to match the competing request within 24 hours (or earlier if necessary to comply with the scheduling deadlines provided in Section I.2.1(f) of this Schedule 20A) from being notified by the Schedule 20A Service Provider of a longer-term competing request for Firm Phase I/II HVDC-TF Service. When a longer duration request preempts multiple shorter duration reservations, the shorter duration reservations shall have simultaneous opportunities to exercise the right of first refusal. Duration, price and time of response will be used to determine the order by which the multiple shorter duration reservations will be able to exercise the right of first refusal. After the conditional reservation deadline, service will commence pursuant to the terms of this Schedule 20A. Firm Phase I/II HVDC-TF Service will always have a reservation priority over Non-Firm Phase I/II HVDC-TF Service under the Tariff.

(v) Non-Firm Phase I/II HVDC-TF Service Reservation Priority: Non-Firm Phase I/II HVDC-TF Service shall be available from transfer capability in excess of that needed for reliable service to Long-Term and Short-Term Firm Phase I/II HVDC-TF Service. A higher reservation priority will be assigned first to Non-Firm Phase I/II HVDC-TF Service requests or reservations with a longer duration of service than those reservations with a shorter duration and second to Pre-Confirmed Requests. Competing requests of the same pre-confirmation status and equal duration for Non-Firm Phase I/II HVDC-TF Service will be prioritized based on the highest price offered by the Transmission Customer for the transmission service, or in the event the price for all Transmission Customers is the same, will be prioritized on a first-come, first-served basis (i.e., in the chronological sequence in which each Transmission Customer has reserved service). Requests for monthly service received within the Submittal Window shall be subject to the procedures described in Section 2.1(b)(vi) below. Transmission Customers that have already reserved shorter-term service over Phase I/II HVDC-TF have the right of first refusal to match any longer-term request before being preempted, provided that such Transmission Customer's advance reservation is consistent with any modified request for Non-Firm Phase I/II HVDC-TF Service.

(vi) Requests for Firm and monthly Non-Firm Phase I/II HVDC-TF Service are subject to a Submittal Window and to an allocation in accordance with the procedures of this section.

Each Schedule 20A Service Provider will refuse those service requests for the same increment and class of service from the same Transmission Customer which, in aggregate, exceeds that Schedule 20A Service Provider's posted ATC. A single service request will be refused if it exceeds the posted ATC. If multiple identical service requests, as defined by NAESB Standard 001-0.5, for the entire posted ATC are received within the Submittal Window, only the first of those service requests will be considered valid. The remaining identical service requests will be refused.

If sufficient transfer capability is not available to meet all service requests for Phase I/II HVDC-TF Service submitted within the Submittal Window, the Schedule 20A Service Providers will allocate among valid requests received in the Submittal Window, allocating ATC pro-rata, on a whole MW basis, among those requests of the longest duration first and subject to the following order: pre-confirmed Firm, Firm, pre-confirmed Non-Firm and Non-Firm. If the total amount of valid pre-confirmed service requests exceeds a Schedule 20A Service Provider's Firm ATC, each valid pre-confirmed service request for Firm Phase I/II HVDC-TF Service will be multiplied by the ratio of that Schedule 20A Service Provider's Firm or Non-Firm ATC, as applicable, to the total MWs of valid Firm or Non-Firm pre-confirmed service requests, as applicable. If the total amount of valid pre-confirmed Firm service requests does not exceed ATC for Firm Phase I/II HVDC-TF Service, then any remaining non pre-confirmed Firm service requests will be allocated similarly across remaining ATC. Non-Firm service requests for monthly service will follow the same methodology for any remaining ATC.

If a customer withdraws its service request after it has been accepted but prior to the Customer Confirmation Time Limit as identified in FERC Order 638, the pro rata allocation of ATC for the remaining valid service requests will be recalculated and the service requests will be updated accordingly on OASIS. The Schedule 20A Service Providers will address queue flooding, queue hoarding and denial of service in accordance with in NAESB WEQ-001. If the Schedule 20A Service Providers detect any of the above activities, the Schedule 20A Service Providers may extend the Submittal Window by additional 5 minute increments.

Each Schedule 20A Service Provider reserves the right to develop additional allocation criteria in the event that the above criteria do not address a particular situation that occurs during the Submittal Window. Such criteria shall either be included in the Business Practice posted on the Schedule 20A Service Provider's Phase I/II HVDC-TF Transmission Provider Page or the Schedule 20A Service Providers will file with the Commission, changes to this Schedule 20A, in compliance with applicable Commission regulations.

In cases where valid service requests received in the Submittal Window result in residual MW(s), the Schedule 20A Service Providers will allocate, via counter offer, the residual MW(s) to the first valid service request queued in the Submittal Window. In cases where more than one residual MW is available, 1 MW will be allocated, via counter offer, to each valid service request, starting with the first valid service request in the Submittal Window and moving to the next until all such MW(s) have been allocated.

(c) Use of Phase I/II HVDC-TF Service By a Transmission Customer: A Transmission Customer shall take and pay for Phase I/II HVDC-TF Service for the transmission of any scheduled Real-Time Energy Market transaction (including imports of energy into, exports of energy out of, and wheels of energy through, the New England Control Area ) that requires the use of the Phase I/II HVDC-TF. If a Transmission Customer elects to take Phase I/II HVDC-TF Service, it must first reserve transmission capability (i.e., a confirmed advance Phase I/II HVDC-TF Service reservation) to allow both the delivery of energy and/or capacity to it over the Phase I/II HVDC-TF (to the extent permitted under the Tariff) commensurate with the associated Phase I/II HVDC-TF Service reservation designated by it in a Completed Application for Phase I/II HVDC-TF to the extent permitted under the Tariff. A Transmission Customer that takes Phase I/II HVDC-TF Service under this Schedule 20A must also take any other applicable service, in accordance with the Tariff. (d) Phase I/II HVDC-TF Service Agreements: A standard form Phase I/II HVDC-TF Service Agreement (Attachment A to Part I of this Schedule 20A) will be offered to an Eligible Customer when it submits a Completed Application for Phase I/II HVDC-TF Service pursuant to this Schedule 20A. Executed Phase I/II HVDC-TF Service Agreements that contain the information required under this Schedule 20A will be reported and/or filed by the Schedule 20A Service Provider with the Commission in compliance with applicable Commission regulations. An Eligible Customer that uses Phase I/II HVDC-TF Service at a Point of Receipt or Point of Delivery that it has not reserved and that has not executed a Phase I/II HVDC-TF Service Agreement will be deemed, for purposes of assessing any appropriate charges and penalties, to have executed the appropriate Service Agreement.

# (e) Classification of Phase I/II HVDC-TF Service:

(i) Transmission Customers requesting Phase I/II HVDC-TF Service do so with the full realization that such service is subject to availability and Curtailment pursuant to Section II.44 of the Tariff and that the ISO will redispatch all Resources subject to its control, pursuant to the Tariff, in order to meet load and to accommodate External Transactions. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with the Tariff.

(ii) The Point of Receipt and Point of Delivery on the Phase I/II HVDC-TF at which transmission capacity is reserved for Phase I/II HVDC-TF Service by the Transmission Customer shall be set forth in the Phase I/II HVDC-TF Service Agreement for such service along with a corresponding capacity reservation over the Phase I/II HVDC-TF. The Point of Receipt and Point of Delivery for Phase I/II HVDC-TF Service shall be as mutually agreed upon by the Schedule 20A Service Provider and the Transmission Customer for Phase I/II HVDC-TF Service.

(iii) Non-Firm Phase I/II HVDC-TF Service shall be offered on an hourly, daily, weekly or monthly basis, under applicable terms and conditions contained in this Schedule 20A, and shall not exceed one month's reservation. Firm Phase I/II HVDC-TF Service shall be offered on a daily, weekly, monthly or yearly basis under the applicable terms and conditions contained in this Schedule 20A.

(iv) The Transmission Customer's Reserved Capacity over the Phase I/II HVDC-TF shall be the sum of its Phase I/II HVDC-TF Service reservations.

(f) Scheduling Associated with Phase I/II HVDC-TF Service: An advance reservation is required for Phase I/II HVDC-TF Service for any External Transaction that imports energy into, exports energy out of, or wheels energy through, the New England Control Area over the Phase I/II HVDC-TF. The External Transaction, with its supporting advance reservation, shall be submitted by the Transmission Customer for inclusion in the Real-Time Energy Market pursuant to the Tariff and in accordance with applicable ISO New England Operating Procedures. External Transactions submitted into the Real-Time Energy Market and associated with Phase I/II HVDC-TF Service shall be dispatched pursuant to the Tariff. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such dispatch in accordance with the Tariff.

(g) Curtailment Associated with Phase I/II HVDC-TF Service: When the ISO

determines that an electrical emergency exists on the New England Transmission System, the ISO shall implement emergency procedures to effect a Curtailment of Phase I/II HVDC-TF Service. The ISO will redispatch all Resources subject to its control, pursuant to the Tariff, in order to meet load and to accommodate External Transactions. External Transactions using Phase I/II HVDC-TF Service shall be curtailed or interrupted in accordance with Section II.44 of the Tariff. Transmission Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with the Tariff. Pursuant to such redispatch, in the event that ISO exercises its right to effect a Curtailment of Phase I/II HVDC-TF Service, in whole or part, no credit or other adjustment shall be provided as a result of the Curtailment with respect to the charges payable by the Transmission Customer.

**2.2 Transmission Customer Responsibility for Other Service:** Phase I/II HVDC-TF Service only provides transmission service over the Phase I/II HVDC-TF. The Transmission Customer is responsible for obtaining and paying any applicable costs associated with any service on other transmission facilities that may be required to complete a transaction that utilizes Phase I/II HVDC-TF Service.

**2.3** Availability of Phase I/II HVDC-TF Service: An Eligible Customer having a Phase I/II HVDC-TF Service Agreement with a Schedule 20A Service Provider is a Transmission

Customer (except as provided below) that may utilize the Use Rights offered by that Schedule 20A Service Provider for the transmission of any scheduled Real-Time transaction (includes imports of energy into, exports of energy out of, and wheels of energy through, the New England Control Area ) that requires the use of the Phase I/II HVDC-TF. Such service shall be provided and administered by the individual Schedule 20A Service Provider and shall be requested pursuant to the applicable terms and conditions of this Schedule 20A. Phase I/II HVDC-TF Service is available to any Eligible Customer who meets the financial assurance requirements of this Schedule 20A. The provision of Phase I/II HVDC-TF Service under this Schedule 20A requires that the Transmission Customer acquire an advance reservation over the Phase I/II HVDC-TF prior to the scheduling of an associated Real-Time transaction that requires the use of the Phase I/II HVDC-TF.

2.4 Reservation Priority For Existing Firm Service Customers: Existing firm service customers (wholesale requirements and transmission-only, with a contract term of five years or more), have the right to elect to continue to take Phase I/II HVDC-TF Service from the Schedule 20A Service Providers when the contract expires, rolls over or is renewed, subject to the rights and obligations of the Schedule 20A Service Providers under the Restated Use Agreement, the Support Agreements, and the Phase I/II HVDC-TF Transmission Service Administration Agreement. This transmission reservation priority is independent of whether the existing customer continues to purchase capacity and energy from the Schedule 20A Service Provider or elects to purchase capacity and energy from another supplier. If at the end of the contract term, the Schedule 20A Service Provider's Use Rights cannot accommodate all of the requests for Phase I/II HVDC-TF Service, the existing firm service customer must agree to accept a contract term at least equal to the longest competing request by any new Transmission Customer and to pay the current just and reasonable rate, as approved by the Commission, for such service; provided that, the firm service customer shall have a right of first refusal at the end of such service only if the new contract is for five years or more. The existing firm service customer must provide notice to the Schedule 20A Service Provider whether it will exercise its right of first refusal no less than one year prior to the expiration date of its Phase I/II HVDC-TF Service Agreement. This transmission reservation priority for existing firm service customers is an ongoing right that may be exercised at the end of all firm contract terms of five years or longer, subject to the rights and obligations of the Schedule 20A Service Providers under the Restated Use Agreement, the Support Agreements, and the Phase I/II HVDC-TF Transmission Service Administration Agreement. Service Agreements subject to a right of first refusal entered into

prior to the date of the Schedule 20A Service Providers' filing adopting the reformed rollover language herein in compliance with Order No. 890 or associated with a transmission service request received prior to July 13, 2007, unless terminated, will become subject to the five year/one year requirement on the first rollover date after the date of the Schedule 20A Service Providers' filing adopting the reformed rollover language herein in compliance with Order No. 890; provided that, the one year notice requirement shall apply to such service agreements with five years or more left in their terms as of the date of the Schedule 20A Service Providers' filing adopting the reformed rollover language herein in compliance with Order No. 890.

#### 3. Transmission Customer Responsibilities

**3.1 Conditions Required of Transmission Customers:** Phase I/II HVDC-TF Service will be provided by the Schedule 20A Service Provider only if the following conditions are satisfied by the Transmission Customer.

(a) The Transmission Customer has submitted a Completed Application for Phase I/II
 HVDC-TF Service in accordance with this Schedule 20A;

(b) The Transmission Customer continues to qualify as an Eligible Customer;

(c) The Transmission Customer and the Schedule 20A Service Provider have executed a Phase I/II HVDC-TF Service Agreement pursuant to this Schedule 20A;

(d) The Transmission Customer agrees to have arrangements in place for any other transmission service necessary to effect the delivery from the generating source to the Point of Receipt prior to the time service commences;

(e) The Transmission Customer agrees to submit External Transactions into the New England Markets in accordance with the applicable ISO New England Operating Documents;

(f) The Transmission Customer agrees to pay for Phase I/II HVDC-TF Service Charges, any Congestion Costs or other redispatch costs chargeable to such Transmission Customer under this Schedule 20A, and the Tariff, whether or not the Transmission Customer takes service for the full term of its Phase I/II HVDC-TF Service reservation;

(g) The Transmission Customer has an advance reservation with a Schedule 20A Service Provider for Phase I/II HVDC-TF Service;

(h) The Transmission Customer meets the creditworthiness procedures in Attachment L to the Schedule 20A Service Provider's Phase I/II HVDC-TF Service Schedule in Part II of Schedule 20A; and

(i) The Transmission Customer provides the information required by the ISO's regional system planning process.

**3.2 Transmission Customer Responsibility for Third-Party Arrangements:** Any arrangements for Transmission Service and the scheduling of transactions that may be required by neighboring electric systems shall be the responsibility of the Transmission Customer requesting service. The Transmission Customer shall provide, unless waived by ISO, notification to ISO identifying such neighboring electric systems and authorizing them to schedule the transactions to be transmitted pursuant to the Tariff on behalf of the Receiving Party at the Point of Delivery or the Delivering Party at the Point of Receipt.

The Transmission Customer shall arrange for Transmission Service, as necessary, in accordance with the Tariff. The ISO will undertake reasonable efforts to assist the Transmission Customer in making such arrangements, including without limitation, providing any information or data required by such other electric system pursuant to Good Utility Practice.

#### 4. Procedures for Arranging Phase I/II HVDC-TF Service

**4.1 Application:** Eligible Customers seeking Phase I/II HVDC-TF Service must submit a Completed Application for Phase I/II HVDC-TF Service to the Schedule 20A Service Provider in accordance with the applicable section of this Schedule 20A and in accordance with the Schedule 20A Service Provider's rules, as posted on the Phase I/II HVDC-TF Transmission Provider Page. The Schedule 20A Service Provider shall post a copy of its form of Application for Phase I/II HVDC-TF Service on its Phase I/II HVDC-TF Transmission Provider Page.

**4.2 Completed Application:** A Completed Application for Phase I/II HVDC-TF Service shall provide all of the information included at 18 C.F.R. § 2.20 of the Commission's regulations, including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

(ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under this Schedule 20A;

(iii) The Point(s) of Receipt and Point(s) of Delivery;

(iv) The maximum amount of capacity and energy expected to be utilized under the Phase I/II
 HVDC-TF Service Agreement;

(v) The Service Commencement Date and the term of the requested Phase I/II HVDC-TF Service;

 (vi) The transmission capacity requested for each Point of Receipt and each Point of Delivery on the Phase I/II HVDC-TF. Customers may combine their requests for Phase I/II HVDC-TF
 Service in order to satisfy the minimum transmission capacity requirement;

(vii) A statement indicating that if the Transmission Customer submits a Pre-Confirmed Request, then the Transmission Customer will take and pay for the requested Phase I/II HVDC-TF Service upon acceptance on OASIS by the Schedule 20A Service Provider that can provide the requested Phase I/II HVDC-TF Service; and

(viii) Any additional information required by the ISO's regional system planning process.

(ix) In addition to the information specified above and when required to properly evaluate the application for service, the Schedule 20A Service Provider also may request that the Eligible Customer provide the following:

The location of the generating facility(ies) supplying the capacity and energy, and the location of the load ultimately served by the capacity and energy transmitted.
 A description of the supply characteristics of the capacity and energy to be delivered.

4.3 Deposit: If required by the Schedule 20A Service Provider, a Completed Application for Phase I/II HVDC-TF Service by a Transmission Customer shall also include a deposit of either (a) one (1) month's charge for Reserved Capacity over the Phase I/II HVDC-TF for service requests of one (1) month or greater or (b) the full charge for Reserved Capacity over the Phase I/II HVDC-TF for service requests of less than one (1) month. If the Application for Phase I/II HVDC-TF Service is rejected by the Schedule 20A Service Provider because it does not meet the conditions for service as set forth herein, or in the case of requests for service arising in connection with losing bidders in a request for proposals (RFP), the deposit will be returned with interest, less any reasonable costs incurred by the Schedule 20A Service Provider, the ISO or any affected Transmission Owners in connection with the review of the Application for Phase I/II HVDC-TF Service. If an Application for Phase I/II HVDC-TF Service is withdrawn or the Eligible Customer decides not to enter into a Phase I/II HVDC-TF Service Agreement, the deposit will be refunded in full, with interest, less reasonable costs incurred by the Schedule 20A Service Provider, the ISO or any affected Transmission Owners to the extent such costs have not already been recovered from the Eligible Customer. The Schedule 20A Service Provider will provide to the Eligible Customer a complete accounting of all costs deducted from the refunded deposit, which the Eligible Customer may contest if there is a dispute concerning the deducted costs. If a Phase I/II HVDC-TF Service Agreement is executed, the deposit, with interest, will be returned to the Transmission Customer upon expiration or termination of the Phase I/II HVDC-TF Service Agreement. Applicable interest will be calculated in accordance with Commission regulations from the day the deposit is credited to the Schedule 20A Service Provider's account.

**4.4 Notice of Deficient Application:** If an Application for Phase I/II HVDC-TF Service fails to meet the requirements of this Schedule 20A, the Schedule 20A Service Provider will notify the entity requesting service within fifteen (15) days of the Schedule 20A Service Provider's receipt of the Application for Phase I/II HVDC-TF Service of the reasons for such failure. The Schedule 20A Service Provider and the Eligible Customer will attempt to remedy minor deficiencies in the Application for Phase I/II HVDC-TF Service through informal communications. If such efforts are unsuccessful, the Schedule 20A Service Provider will return the Application for Phase I/II HVDC-TF Service Provider will return the Application for Phase I/II HVDC-TF Service Provider will return the Application for Phase I/II HVDC-TF Service Provider will return the Application for Phase I/II HVDC-TF Service Provider will return the Application for Phase I/II HVDC-TF Service Provider will return the Application for Phase I/II HVDC-TF Service Provider will return the Application for Phase I/II HVDC-TF Service Provider Will return the Application for Phase I/II HVDC-TF Service Provider Will return the Application for Phase I/II HVDC-TF Service Provider Will return the Application for Phase I/II HVDC-TF Service Provider Will return the Application for Phase I/II HVDC-TF Service Provider Will return the Application for Phase I/II HVDC-TF Service Provider Will return the Application for Phase I/II HVDC-TF Service Provider Will Phase I/II HVDC-TF Service Provider Will Phase I/II HVDC-TF Service Pha

costs incurred by the Schedule 20A Service Provider, the ISO or any affected Transmission Owners in connection with the Application for Phase I/II HVDC-TF Service), with interest, to the Eligible Customer. Upon receipt of a new or revised Application for Phase I/II HVDC-TF Service that fully complies with the requirements of this Schedule 20A, the Eligible Customer will be assigned a new reservation priority based upon the date of receipt by the Schedule 20A Service Provider of the new or revised Application for Phase I/II HVDC-TF Service.

**4.5 Response to a Completed Application:** Following receipt of a Completed Application for Phase I/II HVDC-TF Service, the Eligible Customer will be notified as soon as practicable, but not later than thirty (30) days after the date of receipt of a Completed Application for Phase I/II HVDC-TF Service. Responses by the Schedule 20A Service Provider must be made as soon as practicable to all Completed Applications for Phase I/II HVDC-TF Service and the timing of such responses must be made on a nondiscriminatory basis.

**4.6 Execution of Phase I/II HVDC-TF Service Agreement:** Whenever the Schedule 20A Service Provider determines that the requested service can be provided, it will notify the Eligible Customer as soon as practicable but no later than thirty (30) days after receipt of the Completed Application for Phase I/II HVDC-TF Service, and will tender a Phase I/II HVDC-TF Service Agreement to the Eligible Customer. Failure of an Eligible Customer to execute and return the Phase I/II HVDC-TF Service Agreement or request the filing of an unexecuted Phase I/II HVDC-TF Service Agreement, within fifteen (15) days after it is tendered by the Schedule 20A Service Provider, shall be deemed a withdrawal and termination of the Application for Phase I/II HVDC-TF Service Provider, the ISO and any affected Transmission Owners in connection with the Application for Phase I/II HVDC-TF Service) submitted will be refunded with interest. Nothing herein limits the right of an Eligible Customer to file another Completed Application for Phase I/II HVDC-TF Service after such withdrawal and termination.

**4.7 Reservation of Phase I/II HVDC-TF Service:** OASIS requests for yearly or monthly service shall be submitted no earlier than sixty (60) days before service is to commence; requests for weekly, daily and hourly service shall be submitted no earlier than twenty-one (21) days before service is to commence.

#### 4.8 Extensions for Commencement of Firm Phase I/II HVDC-TF Service: The

Transmission Customer can obtain, subject to availability, up to five one-year extensions for the commencement of service. The Transmission Customer may postpone service by paying a non-refundable annual reservation fee equal to one- month's charge for Firm Phase I/II HVDC-TF Service for each year or fraction thereof within 15 days of notifying the Schedule 20A Service Provider it intends to extend the commencement of service. If during any extension for the commencement of service an Eligible Customer submits a Completed Application for Firm Phase I/II HVDC-TF Service, and such request can be satisfied only by releasing all or part of the Transmission Customer's Reserved Capacity over the Phase I/II HVDC-TF, the original Reserved Capacity over the Phase I/II HVDC-TF, the original Reserved Capacity over the Phase I/II HVDC-TF will be released unless the following condition is satisfied: within thirty (30) days, the original Transmission Customer agrees to pay the applicable rate for Firm Phase I/II HVDC-TF Service for its Reserved Capacity over the Phase I/II HVDC-TF for the period that its reservation overlaps the period covered by such Eligible Customer's Completed Application for Phase I/II HVDC-TF Service. In the event the Transmission Customer elects to release the Reserved Capacity over the Phase I/II HVDC-TF, the reservation for Phase I/II HVDC-TF, the reservation fees or portions thereof previously paid will be forfeited.

**4.9 Confidentiality of Information and Standards of Conduct.** The Schedule 20A Service Provider will treat all information included in the Completed Application for Phase I/II HVDC-TF Service as confidential in accordance with the standards of conduct contained in 18 C.F.R. Part 37 of the Commission's regulations except to the extent that disclosure of such information is required by this Schedule 20A, the Phase I/II HVDC-TF Service Agreement, Schedule 20A Service Provider's Business Practices, by regulatory or judicial order, or for reliability purposes pursuant to Good Utility Practice.

#### 5. Determination of Available Transfer Capability

The Schedule 20A Service Provider will make a determination on a non-discriminatory basis of ATC pursuant to Attachment C to this Schedule 20A and Section II, Attachment C of the Tariff.

#### 6. Payment for Phase I/II HVDC-TF Service

**6.1 Phase I/II HVDC-TF Service Charge:** A Transmission Customer shall pay the Schedule 20A Service Provider's Phase I/II HVDC-TF Service Charge to the Schedule 20A Service Provider under the terms of this Schedule 20A.

**6.2 Discounts:** Information regarding any discounts to the Phase I/II HVDC-TF Service Charge shall be offered by the Schedule 20A Service Provider in a not unduly discriminatory manner and posted on its Phase I/II HVDC-TF Transmission Provider Page pursuant to Commission regulations. Three principal requirements apply to discounts for transmission service over the Phase I/II HVDC-TF: (1) any offer of a discount made by a Schedule 20A Service Provider must be announced to all Eligible Customers solely by posting on the OASIS, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on the OASIS, and (3) once a discount is negotiated, details must be immediately posted by the Schedule 20A Service Provider on the OASIS. For any discount agreed upon for service on a path, from Point(s) of Receipt to Point(s) of Delivery, the individual Schedule 20A Service Provider must offer the same discounted Phase I/II HVDC-TF Service rate for the same time period to all of its Eligible Customers.

**6.3 Resales:** The rates and rules governing charges and discounts stated in Sections 6.1 and 6.2 above shall not apply to resales of transmission service, compensation for which shall be governed by Section 8 of this Schedule 20A.

#### 7. Changes in Service Specifications of Phase I/II HVDC-TF Service

7.1 Modification on a Firm Basis: Any request by a Transmission Customer to modify Point(s) of Receipt and Point(s) of Delivery on a firm basis shall be treated as a new request for Phase I/II HVDC-TF Service in accordance with this Schedule 20A, except that such Transmission Customer shall not be obligated to pay any additional deposit if the capacity reservation over the Phase I/II HVDC-TF does not exceed the amount reserved in the existing Phase I/II HVDC-TF Service Agreement. While such new request is pending, the Transmission Customer shall retain its reservation priority for service at the firm Receipt Point(s) and Delivery Point(s) specified in the Transmission Customer's existing Phase I/II HVDC-TF Service Agreement.

**7.2 Modifications on a Non-Firm Basis:** The Transmission Customer taking Firm Phase I/II HVDC-TF Service may submit a request to the Schedule 20A Service Provider for transmission service on a non-firm basis over Point(s) of Receipt and Point(s) of Delivery other

than those specified in the Phase I/II HVDC-TF Service Agreement ("Secondary Receipt and Delivery Points"), in amounts not to exceed the Transmission Customer's firm capacity reservation over the Phase I/II HVDC-TF, without incurring an additional Non-Firm Phase I/II HVDC-TF Service charge or executing a new Phase I/II HVDC-TF Service Agreement, subject to the following conditions:

(a) Phase I/II HVDC-TF Service provided over Secondary Receipt and Delivery Points will be non-firm only, on an as-available basis, and will not displace any firm or non-firm Phase I/II HVDC-TF Service reserved by Transmission Customers under this Schedule;

(b) the Transmission Customer shall retain its right to schedule Firm Phase I/II HVDC-TF Service at the Point(s) of Receipt and Point(s) of Delivery specified in the relevant Phase I/II HVDC-TF Service Agreement in the amount of the Transmission Customer's original Phase I/II HVDC-TF Service reservation over the Phase I/II HVDC-TF; and

(c) Phase I/II HVDC-TF Service over Secondary Receipt and Delivery Points on a non-firm basis shall not require the filing of an Application for Non-Firm Phase I/II HVDC-TF Service under this Schedule. However, all other requirements of this Schedule (except as to Phase I/II HVDC-TF Service charges) shall apply to Phase I/II HVDC-TF Service on a non-firm basis over Secondary Receipt and Delivery Points.

# 8. Sale, Assignment or Transfer of Phase I/II HVDC-TF Service

**8.1 Procedures for Sale, Assignment or Transfer of Service:** Pursuant to Commissionapproved rules posted by the Schedule 20A Service Provider on its Phase I/II HVDC-TF Transmission Provider Page, and subject to the requirements of the Restated Use Agreement, a Transmission Customer may sell, assign, or transfer all or a portion of its rights under its Phase I/II HVDC-TF Service Agreement, but only to another Eligible Customer (the "Assignee"). The Transmission Customer that sells, assigns or transfers its rights under its Phase I/II HVDC-TF Service Agreement is hereafter referred to as the "Reseller" as the term is used throughout this Schedule 20A. Compensation to Resellers shall be at rates established by agreement between the Reseller and the Assignee. The Assignee must execute a service agreement with the Schedule 20A Service Provider governing reassignments of transmission service prior to the date on which the reassigned service commences. The Schedule 20A Service Provider shall charge the Reseller, as appropriate, at the rate stated in the Reseller's Service Agreement with the Schedule 20A Service Provider or the associated OASIS schedule and credit the Reseller with the price reflected in the Assignee's Service Agreement with the Schedule 20A Service Provider or the associated OASIS schedule; provided that, such credit shall be reversed in the event of non-payment by the Assignee. If the Assignee does not request any change in the Point(s) of Receipt or the Point(s) of Delivery, or a change in any other term or condition set forth in the original Phase I/II HVDC-TF Service Agreement, the Assignee shall receive the same services as did the Reseller. The Assignee shall be subject to all terms and conditions of this Schedule 20A. If the Assignee requests a change in service, the reservation priority of service will be determined by the Schedule 20A Service Provider pursuant to this Schedule 20A.

**8.2** Limitations on and Obligations of Assignment or Transfer of Service: If the Assignee requests a change in the Point(s) of Receipt or Point(s) of Delivery, or a change in any other specifications set forth in the original Phase I/II HVDC-TF Service Agreement, the Schedule 20A Service Provider will consent to such change subject to the provisions of this Schedule 20A, provided that the change will not impair the operation of the New England Markets or the operation and reliability of the New England Transmission System. The Reseller shall remain liable for the performance of all obligations under the Phase I/II HVDC-TF Service Agreement, and the Assignee through an amendment to the Phase I/II HVDC-TF Service Agreement.

**8.3** Information on Resale of Service: In accordance with this Schedule 20A, Transmission Customers may use the Phase I/II HVDC-TF Transmission Provider Page to post information regarding transmission capacity over the Phase I/II HVDC-TF available for resale. All sales or assignments of capacity must be conducted through or otherwise posted on the Schedule 20A Service Provider's OASIS on or before the date the reassigned service commences and are subject to Section 8.1.

9. Real Power Losses

Real power losses across the Phase I/II HVDC-TF shall be allocated solely to Transmission Customers that use Phase I/II HVDC-TF. Such allocation for transactions across the Phase I/II HVDC-TF shall be pursuant to the Tariff and in accordance with the operating protocols adopted by TransÉnergie and the Phase I/II HVDC-TF Owners. The Transmission Customer will be responsible for the losses associated with Phase I/II HVDC-TF Service, in addition to any losses associated with other transmission service under the Tariff.

#### 10. No Obligation to Build or Expand the Phase I/II HVDC-TF

A Schedule 20A Service Provider's status under the Tariff shall not impose any obligation on it to build transmission facilities or expand the Phase I/II HVDC-TF. The offering of Phase I/II HVDC-TF Service under the Tariff shall not impose on the Phase I/II HVDC-TF Owners, the IRH or the ISO an obligation to build any transmission facilities to accommodate Phase I/II HVDC-TF Service.

## 11. No Effect on PTF Rates

Inclusion of Phase I/II HVDC-TF Service under the Tariff shall not affect rates for service on the PTF under the Tariff.

#### 12. Ancillary Services

Transmission Customers taking service over the Phase I/II HVDC-TF Transmission System are required to acquire Ancillary Services from (a) the Schedule 20A Service Provider pursuant to the provisions within Section II to this Schedule 20A and (b) the Control Area Operator pursuant to the provisions within the Tariff. The specific Ancillary Services, prices and/or compensation methods are described in Section II to this Schedule 20A and in the applicable Schedules of the OATT.

#### 13. Congestion Costs and FTRs

Congestion Costs will not be calculated, and therefore FTRs will not be offered, between any set of points on the Phase I/II HVDC-TF. Transmission Customers taking Phase I/II HVDC-TF Service in conjunction with service over the PTF, however, shall be subject to applicable Congestion Costs for any use of the PTF.

#### 14. Creditworthiness

Each Schedule 20A Service Provider will specify its Creditworthiness procedures in Attachment L to its Phase I/II HVDC-TF Service Schedule in Part II of Schedule 20A.

## 15. Billing and Payment

**15.1 Billing Procedure:** Within a reasonable time after the first day of each month, the Schedule 20A Service Provider shall submit an invoice to the Transmission Customer for the charges for all Phase I/II HVDC-TF Service furnished under this Schedule 20A during the preceding month. The invoice shall be paid by the Transmission Customer within twenty (20) days of receipt. All payments shall be made in immediately available funds payable to the Schedule 20A Service Provider, or by wire transfer to a bank named by the Schedule 20A Service Provider.

**15.2 Interest on Unpaid Balances:** Interest on any unpaid amounts (including amounts placed in escrow) shall be calculated in accordance with the methodology specified for interest on refunds in the Commission's regulations. Interest on delinquent amounts shall be calculated from the due date of the bill to the date of payment. When payments are made by mail, bills shall be considered as having been paid on the date of receipt by the Schedule 20A Service Provider.

15.3 Customer Default: In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to the Schedule 20A Service Provider on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after the Schedule 20A Service Provider notifies the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, the Schedule 20A Service Provider may initiate a proceeding with the Commission to terminate Phase I/II HVDC-TF Service but shall not terminate such service until the Commission approves any such request. In the event of a billing dispute between the Schedule 20A Service Provider and the Transmission Customer, the Schedule 20A Service Provider will continue to provide Phase I/II HVDC-TF Service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of Phase I/II HVDC-TF Service, then the Schedule 20A Service Provider may provide notice to the Transmission Customer of its intention to suspend such service in sixty (60) days, in accordance with Commission policy.

#### 16. Standards for Business Practices and Communication Protocols for Public Utilities

The following NAESB WEQ Version 003 Standards are hereby incorporated by reference in this

Schedule 20A to the extent they apply to the Schedule 20A Service Providers:

- -WEQ-000, Abbreviations, Acronyms, and Definition of Terms, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Oct. 4, 2012, Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-001, Open Access Same-Time Information System (OASIS), OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013) excluding Standards 001-9.5, 001-10.5, 001-14.1.3, 001-15.1.2 and 001-106.2.5;
- WEQ-002, Open Access Same-Time Information System (OASIS) Business Practice Standards and Communication Protocols (S&CP), OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-003, Open Access Same-Time Information System (OASIS) Data Dictionary Business Practice Standards, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013).

WEQ-004, Coordinate Interchange, WEQ Version 003, July 31, 2012 (as modified by NAESB final actions ratified on December 28, 2012);

WEQ-005, Area Control Error (ACE) Equation Special Cases, WEQ Version 003, July 31, 2012);

WEQ-006, Manual Time Error Correction, WEQ Version 003, July 31, 2012;

WEQ-007, Inadvertent Interchange Payback, WEQ Version 003, July 31, 2012;

<u>WEQ-008,Transmission Loading Relief (TLR) – Eastern Interconnection, WEQ Version 003,</u> July 31, 2012 (with minor corrections applied November 28, 2012);

• WEQ-011, Gas / Electric Coordination, WEQ Version 003, July 31, 2012;

WEQ-012, Public Key Infrastructure (PKI) WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on October 4, 2012); and

• WEQ-013, Open Access Same-Time Information System (OASIS) Implementation Guide, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013):

WEQ-015, Measurement and Verification of Wholesale Electricity Demand Response, WEQ
 Version 003, July 31, 2012; and

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# • <u>WEQ-021</u>, Measurement and Verification of Energy Efficiency Products, WEQ Version 003, July 31, 2012.

The Schedule 20A Service Providers have requested a waiver of the following NAESB Version 003-Standards pursuant to a compliance filing submitted to the Commission on December 1, 2014 and a-Supplemental Waiver Request on April 14, 2015 to comply with FERC Order No. 676-H, *Standards for-Business Practices and Communication Protocols for Public Utilities*, 148 FERC ¶ 61,205 (2014), asmodified by the Commission's October 3, 2014 *Errata Notice*, 149 FERC ¶ 61,014 (2014).

- WEQ-005, Area Control Error (ACE) Equation Special Cases, WEQ Version 003, July 31, 2012);
- WEQ 006, Manual Time Error Correction, WEQ Version 003, July 31, 2012;
- WEQ-007, Inadvertent Interchange Payback, WEQ Version 003, July 31, 2012;
- WEQ 008, Transmission Loading Relief (TLR) Eastern Interconnection, WEQ Version 003, July 31, 2012 (with minor corrections applied November 28, 2012);
- WEQ-011, Gas / Electric Coordination, WEQ Version 003, July 31, 2012; (To the extent that this standard does apply to an individual Schedule 20A Service Provider, the incorporation of thisstandard shall be addressed within the respective Schedule 20A Service Provider-specificschedule under Part II of this Schedule 20A.)
- WEQ-015, Measurement and Verification of Wholesale Electricity Demand Response, WEQ-Version 003, July 31, 2012; -
- WEQ 021, Measurement and Verification of Energy Efficiency Products, WEQ Version 003, July 31, 2012;and
- WEQ-000, WEQ-001, WEQ-002 and WEQ-003, related to Network Integration Transmission

Service ("NITS"), WEQ Version 003, July 31, 2012; and

WEQ-000, WEQ-001, WEQ-002, WEQ-003 and WEQ-013, related to Service Across Multiple-

Transmission Systems ("SAMTS"), WEQ Version 003, July 31, 2012.

# **SCHEDULE 20A**

# ATTACHMENT A

# PHASE I/II HVDC-TF SERVICE AGREEMENT

This Phase I/II HVDC-TF Service Agreement ("Service Agreement"), dated as of \_\_\_\_\_\_, is entered into, by and between \_\_\_\_\_\_ ("Schedule 20A Service Provider") and \_\_\_\_\_\_ ("Transmission Customer").

# **PART I – General Terms and Conditions**

1. Service Provided: Phase I/II HVDC-TF Service under Part II, Schedule 20A of the ISO New England Inc., Transmission, Markets and Services Tariff ("Tariff") (Check applicable service):

\_\_Non-Firm (Part I) \_\_Firm (Parts I & II)

2. The Transmission Customer is an Eligible Customer under the Tariff and is a party to either a Market Participant Service Agreement or a Transmission Service Agreement.

3. The Transmission Customer has submitted a Completed Application and the required deposit, if applicable, for Phase I/II HVDC-TF Service under this Service Agreement and the Tariff.

4. The Transmission Customer agrees to supply information associated with its request for Phase I/II HVDC-TF Service to the Schedule 20A Service Provider that the Schedule 20A Service Provider deems reasonably necessary in accordance with Schedule 20A and Good Utility Practice in order for it to receive the requested service.

5. The Schedule 20A Service Provider agrees to provide and the Transmission Customer agrees to take and pay for Phase I/II HVDC-TF Service in accordance with the provisions of the Tariff and this Service Agreement.

6. Service will be subject to some combination of the charges detailed in Part II, Schedule 20A of the Tariff. The appropriate charges will be determined in accordance with the terms and conditions of Schedule 20A.

7. Any notice or request made to or by either party regarding this Service Agreement shall be made to the representative of the other party as indicated below.

Transmission Customer:

Schedule 20A Service Provider:

8. The Tariff is incorporated herein and made a part hereof.

9. Nothing contained in this Service Agreement shall be construed as affecting in any way the right of the Schedule 20A Service Provider to file with the Commission under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of this Service Agreement. Nothing contained in this Service Agreement shall be construed as affecting in any way the ability of the Transmission Customer to file with the Commission under Section 206 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of the Service Agreement.

Phase I/II HVDC-TF Service under this Service Agreement shall commence on the later of: (1)
 \_\_\_\_\_\_, or (2) such other date as it is permitted to become effective by the Commission.
 Service shall terminate on \_\_\_\_\_\_.

# PART II – Firm Phase I/II HVDC-TF Service

- 1. Specifications for Phase I/II HVDC-TF Service.
  - a. Term of Transaction:
  - b. Description of capacity and energy to be transmitted over the Phase I/II HVDC-TF including the electric Control Area in which the transaction originates:
  - c. Point(s) of Receipt and Capacity Reservation:
  - d. Delivering Party: \_\_\_\_\_
  - e. Point(s) of Delivery and Capacity Reservation:
  - f. Receiving Party: \_\_\_\_\_
  - g. Reserved Capacity: \_\_\_\_\_

h. Service under this Service Agreement shall be subject to the following charges:

Additional terms and conditions as may be specified in individual Schedule 20A Service Providers' Service Schedule:

IN WITNESS WHEREOF, the Parties have caused this Phase I/II HVDC-TF Service Agreement to be executed by their respective authorized officials.

Transmission Customer:		
Ву:		
Name	Title	Date
Print Name		
Schedule 20A Service Provider:		
3y:		
Name	Title	Date
Print Name		

## **SCHEDULE 20A**

#### ATTACHMENT A-1

# Form of PHASE I/II-TF Service Agreement For The Resale, Reassignment or Transfer of Point-To-Point Phase I/II HVDC-TF Service

This Phase I/II HVDC-TF Service Agreement ("Service Agreement"), dated as of \_\_\_\_\_\_
is entered into, by and between \_\_\_\_\_\_ ("Schedule 20A Service Provider") and
 ("Assignee").

2. The Assignee has been determined by the Schedule 20A Service Provider to be an Eligible Customer under the Tariff pursuant to which the transmission service rights to be transferred were originally obtained.

3. The terms and conditions for the transaction entered into under this Service Agreement shall be subject to the terms and conditions of Part I of Schedule 20A and the Schedule 20A Service Provider's Service Schedule of Schedule 20A, except for those terms and conditions negotiated by the Reseller of the reassigned transmission capacity (pursuant to Section I.8.1 of this Tariff) and the Assignee, to include: contract effective and termination dates, the amount of reassigned capacity or energy, point(s) of receipt and delivery. Changes by the Assignee to the Reseller's Points of Receipt and Points of Delivery will be subject to the provisions of Section I.8.2 of this Tariff.

4. The Schedule 20A Service Provider shall credit the Reseller for the price reflected in the Assignee's Service Agreement or the associated OASIS schedule.

5. Any notice or request made to or by either Party regarding this Service Agreement shall be made to the representative of the other Party as indicated below.

Schedule 20A Service Provider:

Assignee:

6. The Tariff is incorporated herein and made a part hereof.

IN WITNESS WHEREOF, the Parties have caused this Service Agreement to be executed by their respective authorized officials.

Schedule 20A Service Provider:

Title	Date
Title	Date

Print Name

# Specifications For The Resale, Reassignment Or Transfer of Long-Term Firm Point-To-Point Phase I/II HVDC-TF Service

1. Term of Transaction:

Start Date: \_\_\_\_\_

Termination Date: \_\_\_\_\_

2. Description of capacity and energy to be transmitted by the Schedule 20A Service Provider including the electric Control Area in which the transaction originates.

3. Point(s) of Receipt:\_\_\_\_\_

Delivering Party:\_\_\_\_\_

4. Point(s) of Delivery:\_\_\_\_\_

Receiving Party:\_\_\_\_\_

5. Maximum amount of reassigned capacity:

6. Designation of party(ies) subject to reciprocal service obligation:

7. Name(s) of any Intervening Systems providing transmission service:

(Name of Transmission Owner) Open Access Transmission Tariff

8. Service under this Service Agreement may be subject to some combination of the charges detailed below. (The appropriate charges for individual transactions will be determined in accordance with the terms and conditions of the Tariff.)

8.1 Transmission Charge:\_\_\_\_\_

8.2 System Impact and/or Facilities Study Charge(s):

8.3 Direct Assignment Facilities Charge:\_\_\_\_\_

8.4 Ancillary Services Charges: \_\_\_\_\_

9.0 Name of Reseller of the reassigned transmission capacity:

# II. PHASE I/II HVDC-TF SERVICE SCHEDULES

The specific terms and conditions for rates and charges of the individual Schedule 20A Service Providers' offering of their Phase I/II HVDC-TF Use Rights are found in the Phase I/II HVDC-TF Service Schedules in this Part II of Schedule 20A.

# SCHEDULE 20A

#### ATTACHMENT C

# METHODOLOGY TO ASSESS AVAILABLE TRANSFER CAPABILITY

# 1. INTRODUCTION

This Attachment C to Schedule 20A applies to the calculation of transfer capability of the Phase I/II HVDC-TF by the Schedule 20A Service Providers.

1.1 Scope of Document

This Attachment C to Schedule 20A addresses the following items with respect to the Phase I/II HVDC-TF between the Hydro-Quebec Control Area and the New England Control Area for the Schedule 20A Service Providers:

- Total Transfer Capability (TTC) methodology
- Available Transfer Capability (ATC) methodology
- Existing Transmission Commitments (ETC)
- Use of Transmission Reliability Margin (TRM)
- Use of Capacity Benefit Margin (CBM)
- Use of Roll-over Rights (ROR) in the calculation of ETC

1.2 Overview of Phase I/II HVDC-TF

The Phase I/II HVDC-TF is a 2,000 MW HVDC tie line in New England that interconnects the New England Control Area with the Hydro-Québec Control Area in the Province of Québec, Canada. This HVDC line has one termination point in New England (with paired operation with complementary facilities in Québec). The specific facilities in New England are the Sandy Pond HVDC Terminal, which interconnects Central Massachusetts and the Nicolet and/or Radisson HVDC terminals of Hydro-Québec. Additional information on the Phase I/II HVDC-TF can be found at ISO New England OASIS web site under the "IRH".

#### **1.3** Definitions

Capitalized terms used and defined in this Attachment C to Schedule 20A shall have the meaning given them under this Attachment. Capitalized terms used and not defined in this Schedule 20A but defined in other sections of Schedule 20A or the ISO Tariff shall have the meaning given them under those sections. Capitalized terms used in this Attachment C to Schedule 20A that are not defined in it or elsewhere in Schedule 20A or the ISO Tariff shall have the meanings in the Restated Use Agreement or those customarily attributed to applicable criteria, rules, standards and operating procedures.

**Balancing Authority (BA):** The responsible entity that integrates resource plans ahead of time, maintains load-interchange-generation balance within a Balancing Authority Area, and supports Interconnection frequency in real time.

**Balancing Authority Area:** The collection of generation, transmission, and loads within the metered boundaries of the Balancing Authority. The Balancing Authority maintains load-resource balance within this area.

Export: New England to Hydro-Quebec

Import: Hydro-Quebec to New England

Operating Horizon (OH): For the purposes of this document,

• CVPS resets the OH at 16:00 eastern prevailing time each day. At that time, the OH spans from 16:00 through midnight two days out for a total of 56 hours. As time progresses the total hours remaining in the OH decreases until 16:00 the following day when the OH is once again reset to 56 hours.

• All SSPs (except CVPS) individually reset their OHs at noon eastern prevailing time each day. At that time, the OH spans from noon through midnight of the next day for a total of 36 hours. As time progresses the total hours remaining in the OH decreases until noon the following day when the OH is once again reset to 36 hours.

**Planning Horizon (PH):** For the purpose of this Attachment C to Schedule 20A, PH for any Schedule 20A Service Provider is any period before the OH.

**Scheduling Horizon (SH):** For the purpose of this Attachment C to Schedule 20A, SH is Real-Time and the hour before and utilizes Firm and Non-Firm Phase I/II HVDC-TF Service pursuant to ISO New England Operating Documents.

#### 2. PHASE I/II HVDC-TF TOTAL TRANSFER CAPABILITY (TTC)

The Total Transfer Capability (TTC) is the amount of electric power that can be moved or transferred reliably from one area to another area of the interconnected transmission systems by way of all transmission lines (or paths) between those areas under specified system conditions. TTC for the Phase I/II HVDC-TF is calculated by the ISO as Transmission Operator using the NERC Standard MOD-029-1 Rated System Path Methodology and posted on the ISO New England OASIS site. Therefore, all requirements associated with the documentation of TTC methodology are addressed in Sections 1 and 3 of Section II, Attachment C – Available Transfer Capability Methodology of the ISO Tariff.

# 3. PHASE I/II HVDC-TF AVAILABLE TRANSFER CAPABILITY (ATC)

#### General

NERC standards: MOD-001-1 – Available Transmission System Capability and MOD-029-1 – Rated System Path Methodology define the required items to be identified when describing a transmission provider's ATC methodology. However, several of those items are not applicable to the Phase I/II HVDC-TF due to the fact that the Phase I/II HVDC-TF is a DC facility and sinks into a region where advance transmission service is not required. Because of this arrangement, loop flow is not an issue; and since associated Regional Transmission Service is not sold in advance of real-time flow within ISO New England, the flow on the Phase I/II HVDC-TF does not typically impact the calculation of any other transfer capability.

Each Schedule 20A Service Provider, based on its Planning and Operating Horizon timing guidelines, will calculate and post as specified in Section 5 of this document Firm and Non-Firm Phase I/II HVDC-TF ATC separately using the NERC Standard MOD-029-1 Rated System Path Methodology.

#### Phase I/II HVDC-TF Capacity Benefit Margin (CBM)

CBM is defined as the amount of firm transmission transfer capability set aside by a TSP for use by the Load Serving Entities. The use of CBM on Phase I/II HVDC-TF is governed by the overall ISO approach

to capacity planning requirements in the ISO New England Operating Documents. Load Serving Entities operating within the New England Control Area are required to arrange their Capacity Requirements prior to the beginning of any given month in accordance with the ISO Tariff. As such, no CBM on Phase I/II HVDC-TF is set aside by any SSP for use by Load Serving Entities in ATC calculations. Therefore CBM is zero and will not be included in the calculations of ATC. As long as this market design is in place in New England, the CBM will continue to be set to zero.

### Existing Transmission Commitments, Firm (ETC<sub>F</sub>)

The ETC<sub>F</sub> are those Phase I/II HVDC-TF confirmed Firm transmission reservation (PTP<sub>F</sub>) plus any rollover rights for Firm transmission reservations (ROR<sub>F</sub>) that have been exercised. There are no allowances necessary for Native Load forecast commitments (NL<sub>F</sub>), Network Integration Transmission Service (NITS<sub>F</sub>), grandfathered Transmission Service (GF<sub>F</sub>) and other service(s), contract(s) or agreement(s) (OS<sub>F</sub>) to be considered in the ETC<sub>F</sub> calculation.

### Existing Transmission Commitments, Non-Firm (ETC<sub>NF</sub>)

The ETC<sub>NF</sub> are those Phase I/II HVDC-TF confirmed Non-Firm transmission reservations (PTP<sub>NF</sub>). There are no allowances necessary for Non-Firm Network Integration Transmission Service (NITS<sub>NF</sub>), Non-Firm grandfathered Transmission Service (GF<sub>NF</sub>) or other service(s), contract(s) or agreement(s) (OS<sub>NF</sub>).

#### Transmission Reliability Margin (TRM)

The TRM is the amount of transmission transfer capability necessary to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as system conditions change. TRM is only applicable to Firm Phase I/II HVDC-TF ATC and shall not be applied to Non-Firm Phase I/II HVDC-TF ATC.

The ISO, as Transmission Operator, is responsible for calculating the TRM on the Phase I/II HVDC-TF interface. The Phase I/II HVDC-TF interface poses one of the largest contingency risks in the NYISO, PJM and New England Control Areas. As such, the Import TRM on the Phase I/II HVDC-TF is directly related to these operational limits which can be enforced at any time and the Import TRM is calculated as TTC minus the largest single source contingency. Therefore the SSPs set the Import TRM at 800 MW such that Firm Transmission Service is not sold above this operational limit.

Export TRM is established based on the methodology to account for operational uncertainties on the Hydro-Quebec TransEnergie transmission system. Therefore, the Export TRM is calculated as TTC minus these operational uncertainties.

For additional information on TRM, refer to the ISO Tariff, Attachment C – Available Transfer Capability Methodology, Section 5.2.2 – TRM Calculation for the OTF.

## 4. CALCULATION OF PHASE I/II HVDC-TF ATC

## 4.1 Calculation of Phase I/II HVDC-TF Firm ATC (ATC<sub>F</sub>)

### 4.1.1 Calculation of ATC<sub>F</sub> in the PH

Consistent with the NERC definition,  $ATC_F$  is the capability for Firm transmission reservations that remain after allowing for ETC<sub>F</sub>, CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, Phase I/II HVDC-TF CBM is zero. Firm Transmission Service over the Phase I/II HVDC-TF that is available in the Planning Horizon (PH) includes: Yearly, Monthly, Weekly, and Daily. Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Phase I/II HVDC-TF transmission reservations are not considered in the ATC<sub>F</sub> calculation. Therefore, ATC<sub>F</sub> in the PH is equal to the TTC minus  $ETC_F$  and TRM.

## 4.1.2 Calculation of $ATC_F$ in the OH

Consistent with the NERC definition,  $ATC_F$  is the capability for Firm transmission reservations that remain after allowing for  $ETC_F$ , CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, Phase I/II HVDC-TF CBM is zero. Daily Firm Transmission Service over the Phase I/II HVDC-TF is the only firm service offered in the Operating Horizon (OH). Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Phase I/II HVDC-TF transmission reservations are not considered in the  $ATC_F$  calculation. Therefore,  $ATC_F$  in the OH is equal to the TTC minus  $ETC_F$  and TRM.

4.2 Calculation of Non-Firm ATC (ATC<sub>NF</sub>)

4.2.1 Calculation of ATC<sub>NF</sub> in the PH

 $ATC_{NF}$  is the capability for Non-Firm transmission reservations that remain after allowing for  $ETC_{F}$ ,  $ETC_{NF}$ , scheduled CBM (CBM<sub>S</sub>), unreleased TRM (TRM<sub>U</sub>), Non-Firm Postbacks (Postbacks<sub>NF</sub>) and Non-Firm counterflows (counterflows<sub>NF</sub>).

As discussed above, the CBM for Phase I/II HVDC-TF is zero. Non-Firm ATC available in the PH includes: Monthly, Weekly, Daily and Hourly. TRM  $_{\rm U}$ , Postbacks $_{\rm NF}$  and counterflows $_{\rm NF}$  of Phase I/II HVDC-TF transmission reservations are not considered in this calculation. Therefore, ATC $_{\rm NF}$  in the PH is equal to the TTC minus ETC $_{\rm F}$  and ETC $_{\rm NF}$ .

### $4.2.2 \qquad Calculation of ATC_{\rm NF} in the OH$

 $ATC_{\mbox{\scriptsize NF}}$  available in the OH includes: Daily and Hourly.

 $TRM_U$  and counterflows<sub>NF</sub> are not considered in this calculation and CBM is zero. Therefore,  $ATC_{NF}$  in the OH is equal to the TTC minus  $ETC_{F_i}$  and  $ETC_{NF}$  plus Postbacks<sub>NF</sub>.

## 4.3 Negative ATC

Due to the calculation methodologies defined above, typically there should not be negative ATC values posted.

### 5. POSTING OF PHASE I/II HVDC-TF ATC

## 5.1 Location of ATC Posting

ATC values are posted separately on the Phase I/II HVDC-TF Transmission Provider's Page for the Schedule 20A Service Providers. In addition, a summary of the level of service available from the Schedule 20A Service Providers is available on the ISO New England OASIS site under the "IRH".

## 5.2 Updates To ATC

When any of the variables in the ATC equations change, the ATC values are recalculated and immediately posted.

### 5.3 Coordination of ATC Calculations

The Phase I/II HVDC-TF is a controllable DC inter-Control Area tie line. Therefore it is not necessary to coordinate the Phase I/II HVDC-TF ATC values with the Hydro-Québec Control Area.

## 5.4 Load Forecast

The Phase I/II HVDC-TF is a controllable DC inter-Control Area tie line. Therefore, the ISO load forecast has no impact on the Phase I/II HVDC-TF ATC. The ISO is responsible for calculating the load forecast for the region and posts the load forecast on the ISO New England OASIS site.

## 5.5 ATC Mathematical Algorithms

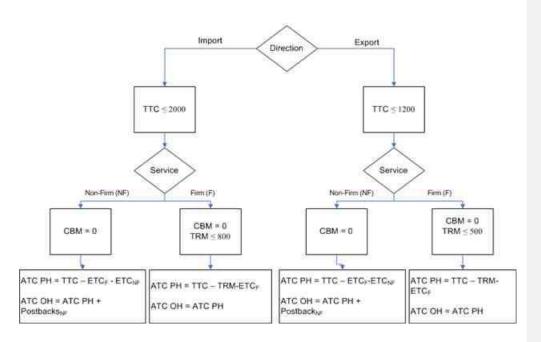
The mathematical algorithms are posted on the ISO New England OASIS web site at http://www.oatioasis.com/ISNE/ISNEdocs/sched20A\_atc\_algorithm.docx. Each SSP will provide a link to this document on their individual web sites.

# 5.6 Generation and Transmission Outages

The Phase I/II HVDC-TF is a controllable DC inter-Control Area tie line and therefore generation or transmission outages have no impact on the Phase I/II HVDC-TF ATC.

# 6. ATC PROCESS FLOW DIAGRAM

#### ATC Process Flow Diagram



Northeast Utilities Companies

SCHEDULE 20A-NU

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## SCHEDULE 20A-NU

In accordance with Commission Order No. 676-H, the NAESB Version 003 Standards listed below applyto the provision of transmission service pursuant to this Schedule-20A NU for service provided hereunder by Public Service Company of New Hampshire:

 WEQ 011, Gas / Electric Coordination, WEQ Version 003, July 31, 2012, Standards 011 1.2 and 011-1.3.

# NORTHEAST UTILITIES COMPANIES PHASE I/II HVDC-TF SERVICE NU

This Schedule 20A-NU contains the main substantive provisions applicable to the NU Companies' portion of Phase I/II HVDC-TF Service. It includes rates, terms and conditions for Phase I/II HVDC-TF Point-to-Point Service and NU-specific Phase I/II HVDC-TF Service Schedules. All Transmission Customers taking Phase I/II HVDC-TF Service from the NU Companies shall be subject to and comply with the rates, terms and conditions of this Schedule 20A-NU. In the event of a conflict between any rate, term or condition in the Tariff and any rate, term or condition in this Schedule 20A-NU, this Schedule 20A NU shall govern.

The NU Companies will perform their functions under this Schedule 20A in a manner that is not inconsistent with the ISO's provision of regional service, administration of the regional markets, dispatch of resources, and operation of the New England Transmission System for purposes of reliability.

## I. <u>COMMON SERVICE PROVISIONS</u>

1. **Definitions:** Capitalized terms not defined herein shall have the meanings as defined within the Tariff.

1.1 **Interest:** The amount computed in accordance with the Commission's regulations at 18 CFR §35.19a(a)(2)(iii). Interest on deposits shall be calculated from the day the deposit check is credited to the NU Companies' account.

1.2 **Service Year:** The calendar year in which the Transmission Customer receives service under this Service Schedule.

1.3 **NU Companies**: The Northeast Utilities Companies (or "NU Companies") which consist of The Connecticut Light and Power Company, Western Massachusetts Electric Company, and Public Service Company of New Hampshire, each an operating company of Northeast Utilities ("NU").

1.4 **NUSCO:** Northeast Utilities Service Company, the Designated Agent for the NU Companies.

1.5 **Transmission Service**: Point-To-Point Transmission Service provided under this Service Schedule on a firm and non-firm basis.

### 2. Billing and Payment

2.1 **Customer Default**: In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to the NU Companies on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after the NU Companies notify the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist.

Upon the occurrence of a default, the NU Companies may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission so approves any such request. In the event of a billing dispute between the NU Companies and the Transmission Customer, the NU Companies will continue to provide service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then the NU Companies may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy. Neither Party shall have the right to challenge any monthly bill or to bring any court or administrative action of any kind questioning the propriety of any bill after a period of twenty-four (24) months from the date the bill was due; provided, however, that in the case of

a bill based on estimates, such twenty-four month period shall run from the due date of the final adjusted bill.

3. Creditworthiness: See Attachment L to this Schedule 20A-NU.

4. **Regulatory Filings:** Nothing contained in the Tariff or any Service Agreement shall be construed as affecting in any way the right of the NU Companies to unilaterally make application to the Commission for a change in rates, terms and conditions, charges, classification of service, Service Agreement, rule or regulation under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder. Nothing contained in the Tariff or any Service Agreement shall be construed as affecting in any way the ability of any Party receiving service under the Tariff to exercise its rights under the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder.

5. **Rights Under The Federal Power Act:** Nothing in this section shall restrict the rights of any party to file a Complaint with the Commission under relevant provisions of the Federal Power Act.

## II. Phase I/II HVDC-TF POINT-TO-POINT SERVICE

### Preamble

Except as otherwise provided Schedules, Firm and Non-Firm Phase I/II HVDC-TF Point-To-Point Service will be provided pursuant to the rates, terms and conditions set forth below. Phase I/II HVDC-TF Point-To-Point Service is for the receipt of capacity and/or energy at designated Point(s) of Receipt and the transmission of such capacity and energy to designated Point(s) of Delivery.

# 6. Nature of Firm Phase I/II HVDC-TF Point-To-Point Service

### a) Classification of Firm Phase I/II HVDC-TF Point-To-Point Service:

For Firm Point-To-Point Transmission Service over the Phase I/II HVDC-TF, the Transmission Customer will be billed for its Reserved Capacity under the terms of Schedule Phase I/II HVDC-TF-STF or Schedule Phase I/II HVDC-TF-LTF, to this Schedule 20A-NU.

# 7. Procedures for Arranging Firm Phase I/II HVDC-TF Point-To-Point Service

### a) Deposit:

A Completed Application for Firm Phase I/II HVDC-TF Point-To-Point Service also shall include a deposit of either three month's charge for Reserved Capacity or the full charge for Reserved Capacity for service requests of less than one month. If the Application is rejected because it does not meet the conditions for service as set forth herein, said deposit shall be returned with interest less any reasonable costs incurred by NU in connection with the review of the losing bidder's Application. If an Application is withdrawn or the Eligible Customer decides not to enter into a Phase I/II HVDC-TF Service Agreement for Firm Phase I/II HVDC-TF Point-To-Point Service, the deposit shall be refunded in full, with interest, less reasonable costs incurred by NU to the extent such costs have not already been recovered by NU from the Eligible Customer. NU will provide to the Eligible Customer a complete accounting of all costs deducted from the refunded deposit, which the Eligible Customer may contest if there is a dispute concerning the deducted costs. Applicable interest shall be computed in accordance with the Commission's regulations at 18 C.F.R. § 35.19a(a)(2)(iii), and shall be calculated from the day the deposit check is credited to the PTO's account.

### 8. Rates and Charges

The Transmission Customers taking Phase I/II HVDC-TF Point-To-Point Transmission Service shall pay the NU Companies for any Ancillary Services, consistent with Commission policy, along with the following:

a) Rates for Firm and Non-Firm Point-To-Point Transmission Services: Rates for Firm and Non-Firm Point-To-Point Transmission Service over the Phase I/II HVDC-TF are provided in Schedule Phase I/II HVDC-TF-LTF and Schedule Phase I/II HVDC-TF-STF.

# SUPPLEMENT NO. 1 TO Schedule 20A-NU Service Over Phase I/II HVDC-TF

# I. **Definitions:**

Unless otherwise provided, capitalized terms used herein shall have the definitions provided in the ISO-New England Transmission, Markets and Services Tariff ("Tariff") including Schedule 20A-NU to the OATT.

# II. Transmission Service Over Phase I/II HVDC-TF:

Transmission service over the Phase I/II HVDC-TF is provided pursuant to the terms and conditions of this Phase I/II HVDC-TF Service Schedule.

# III. Rates For Transmission Service Over Phase I/II HVDC-TF:

Rates for Point-To-Point Transmission Service over the Phase I/II HVDC-TF are set forth in the following rate schedules attached to this Supplement No. 1: Rate Schedule Phase I/II HVDC-TF-LTF for Long-Term Firm Point-To-Point Transmission Service; Rate Schedule Phase I/II HVDC-TF-STF for Short-Term Firm Point-To-Point Transmission Service; and Rate Schedule Phase I/II HVDC-TF-NF for Non-Firm Point-To-Point Transmission Service.

## SCHEDULE PHASE I/II HVDC-TF-LTF

I. For each month of service, NUSCO or its agent will bill the Transmission Customer the difference between: (1) the higher of the cumulative annual Embedded Cost Charges or the cumulative annual Opportunity Costs Charges, calculated on a monthly basis for each calendar year and (2) the cumulative annual amount of charges for Embedded Costs and Opportunity Costs preceding the service month for which the bill is being rendered. In January of each calendar year the cumulative billed amount for (2) above will be reset to zero (0).

## A. <u>EMBEDDED COST CHARGE</u>

### 1) Determination of Embedded Cost Charge

The Embedded Cost Charge will provide for recovery of the embedded costs of the Phase I/II HVDC-TF of the NU Companies. The Embedded Cost Charge for each month will be the product of: (a) the "NU Companies' Formula Rate" (expressed in dollars per kilowatt-year), divided by twelve (12) months, and (b) the Reserved Capacity (expressed in kilowatts).

#### 2) <u>NU Companies Formula Rate</u>

The NU Companies' formula rate shall be determined in accordance with the rate formulas specified in Appendix A of this Schedule Phase I/II HVDC-TF-LTF ("Formula Rate"), being applied to the costs recorded on each of the NU Companies' books of account (i.e., FERC Form 1). The Formula Rate shall be determined on the basis of estimated costs for each year until the actual NU Companies' costs for such year are determined. Thereafter, payments made on such estimate shall be recalculated based on actual data for that year, and an appropriate billing adjustment shall be made pursuant to Schedule 20A.

#### 3) <u>Tax Rates and Taxes</u>

The Formula Rate in effect during a Service Year shall be based on the local, state, and federal tax rates and taxes in effect during the prior year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the Formula Rate will be

appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

### 4) <u>Provision re: Exchanges</u>

With respect to Entitlement Transactions or Energy Transactions or other transactions that involve an exchange, each party to such transaction shall be treated as an individual Transmission Customer under the Tariff. Accordingly, a separate Schedule Phase I/II HVDC-TF-LTF or other applicable charge(s) will be calculated for, and a separate bill will be rendered to, each such individual Transmission Customer.

# B) OPPORTUNITY COSTS CHARGE

The Opportunity Costs Charge shall be determined each month in accordance with the provisions set forth in Appendix B of this Schedule Phase I/II HVDC-TF-LTF and the Service Agreement.

- II. In addition to the applicable charges set forth in Parts I and II of the Tariff, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay to NUSCO each month the following additional charges for Phase I/II HVDC-TF Long-Term Firm Transmission Service provided during such month.
- A. Taxes and Fees Charge
- B. Regulatory Expenses Charge
- C. Other

# A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service provided under the Tariff, not specifically provided for in any of the charge or rate provisions under the Tariff, including any applicable Interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for any such fee, assessment, or tax shall be borne by the

Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

# B. <u>REGULATORY EXPENSES CHARGE</u>

The NU Companies shall have the right to make a Section 205 filing for recovery of regulatory expenses associated with the Tariff and the Service Agreements.

# C. <u>OTHER</u>

The NU Companies shall have the right; at any time, unilaterally to file for a change in any of the provisions of this Schedule Phase I/II HVDC-TF-LTF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE PHASE I/II HVDC-TF-LTF Appendix A RATES

The NU Companies' Formula Rate for Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula.

$$Formula Rate_i = \frac{A_{i-1}-B_{i-1}}{C_{i-1}}$$

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

• A<sub>i-1</sub> is the Annual Cost (expressed in dollars) of the Phase I/II HVDC-TF of the NU Companies for the calendar year prior to the Service Year. The Annual Revenue Requirements are determined pursuant to the formula specified in Exhibit 1 to this Appendix A.

•  $B_{i-1}$  is the actual transmission revenues (expressed in dollars) provided from the provision of transmission services over the Phase I/II HVDC-TF to others. The actual transmission revenues shall be those recorded on the books of the NU Companies in FERC Account

Nos. 447 and 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

 $C_{i-1} \mbox{ is the average of the NU Companies twelve monthly maximum transfer limits (expressed in kilowatts) on its share of the Phase I/II HVDC-TF for the calendar year prior to the Service Year. } \label{eq:circle}$ 

# SCHEDULE PHASE I/II HVDC-TF-LTF Appendix A Exhibit 1

# ANNUAL TRANSMISSION REVENUE REQUIREMENTS

The Annual Transmission Cost for the NU Companies' Phase I/II HVDC-TF are the costs assessed by each of them in owning, operating, maintaining, and supporting those facilities, plus any applicable leasing costs and an allocable share of General Plant and other such plant and equipment. These costs shall be computed on a calendar-year basis using costs, from the calendar year prior to the Service Year.

In making such determinations, the provisions of the Uniform System of Accounts prescribed by FERC for Class A and Class B Public Utilities and Licensees shall be controlling.

The formula rate for determination of the annual revenue requirements for the Phase I/II HVDC-TF of the NU Companies are determined pursuant to this Appendix A of Schedule Phase I/II HVDC-TF-LTF, as follows:

A. ANNUAL COST = Sum of [each NU Company's Phase I/II HVDC-TF transmission costs - Chester Static VAR Compensator].

# SCHEDULE PHASE I/II HVDC-TF LTF Appendix B OPPORTUNITY COSTS

The types of Opportunity Costs that may be incurred by the NU Companies and charged to Transmission Customers in connection with the provision of Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service pursuant to a Service Agreement are described below.

### 1. OUT OF RATE COSTS

1.1 Out of Rate Costs are incurred when: (i) the NU Companies are required under a ISO dispatch order to limit the operation of any of their generation Entitlements below the output level under economic dispatch or to "must run" any of their generation Entitlements above the levels associated with economic dispatch; and (ii) the ISO dispatch order adversely impacts the NU Companies' settlement billing or the settlement billing of another Transmission Customer that has a contractual right (through the purchase of an Entitlement from the NU Companies) to pass the cost back to the NU Companies; and (iii) the ISO does not grant a waiver of the Out of Rate Costs incurred pursuant to (i) and (ii) above.

1.2 The information required from the ISO to establish the existence and level of Out of Rate Costs and the Transmission Customer's responsibility for such costs will normally not be available to the NU Companies by the end of the billing month in which the Out of Rate Costs are incurred. Accordingly, the bills rendered for Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service pursuant to Schedule 20A shall be subject to subsequent adjustment, as provided in this Appendix B of Schedule Phase I/II HVDC-TF-LTF.

1.3 In circumstances where multiple transactions across a constrained transmission path are causing the incurrence of Out of Rate Costs, the Out of Rate Costs will be allocated first to the Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff to the extent that their service is not curtailed or interrupted pursuant to the provisions of the Tariff. If, after curtailment or interruption of such Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, Out of Rate Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, Out of Rate Costs remain, such remaining costs will be allocated to Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service customers with the latest date (latest means, the latest dated Service Agreement for Phase I/II HVDC-TF

Firm Point-To-Point Transmission Service or latest dated Reservation for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service). Where the reduction in the number of megawatts of Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and of Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short Term Firm Point-To-Point Transmission Service that would have been required to eliminate the need for the ISO limitation or "must run" in any hour exceeds the megawatts of actual Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and Phase I/II HVDC-TF Long-Term and Short-Term Firm Point-To-Point Transmission Service of the latest applicable transaction in such hour, the excess Out of Rate Costs will be allocated to the next latest transaction and so on until the total additional megawatts of Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service that is required to be reduced to eliminate the need for such ISO limitation or "must run" order has been achieved. Whenever the transactions across a constrained transmission path that are causing the incurrence of Out of Rate Costs include off-system sales by the NU Companies, such NU Companies' off-system sales shall be included on the same basis as Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service transactions in determining responsibility for Out of Rate Costs and the date of the off-system sales contract or wholesale transaction shall be used to determine its "service agreement" or "reservation" date.

### 2. <u>OPPORTUNITY COSTS ON PHASE I/II HVDC-TF</u>

### 2.1 Short-Term Power Transfers into New England

The NU Companies' lost opportunities to purchase economic short-term power will occur when the amount of power that would be economical for the NU Companies to purchase in the market (at a validated, quoted delivered price below their decremental energy cost) exceeds the amount of the NU Companies' allocated share of Phase I/II HVDC-TF transfer capacity not then committed to others for Non-Firm Point-To-Point Transmission Service and Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service into New England and for purchases on behalf of Native Load Customers ("Short-Term Available Import Capacity"). Operating conditions in New England or elsewhere and/or the location of the seller may affect the amount of Short-Term Available Import Capacity.

The following steps comprise the procedures to be used in assigning such Opportunity Costs on Phase I/II HVDC-TF to Firm Transmission Service customers under the Tariff after assignment of any Opportunity

Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, pursuant to the provisions of the Tariff.

2.1.1 The megawatt (MW) difference, if any, between the aggregate of economic power purchase opportunities available and Short-Term Available Import Capacity will be determined hourly ("Import Shortfall").

2.1.2 To assign such Opportunity Costs on Phase I/II HVDC-TF to Transmission Customers, Service Agreements for Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service will be ordered (stacked) by date of execution of the Service Agreement under the Tariff, with the Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff having the latest date being assigned the highest order number.

2.1.3 Firm Transmission Customers under the Tariff contributing to the MW amount of lost opportunities will be determined by aggregating MWs of the Reserved Capacity counting backward from the highest order number Firm Point-To-Point Service Agreement under the Tariff until the aggregate MWs equals the Import Shortfall.

2.1.4 Such Opportunity Costs on Phase I/II HVDC-TF for each hour associated with the lowest cost purchase opportunity foregone will be assigned to the highest order numbered Phase I/II HVDC-TF Firm Point-To-Point Service Agreement(s) under the Tariff up to the MWs of such foregone purchase.

2.1.5 The MWs of the next lowest cost purchase foregone will be assigned to the MWs of the next following Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff or (next highest order number not fully included in the calculation in d. above) and so on until the MWs used to calculate the lost opportunities equals the Import Shortfall.

2.1.6 Such Opportunity Costs on Phase I/II HVDC-TF will be calculated for each hour by computing the difference between the cost of the economic power offered to, but not able to be taken by, the NU Companies and the decremental energy cost for the NU Companies for an equivalent amount of megawatt-hours (after reflecting applicable losses) of such foregone purchases. If however, the NU Companies elect to purchase power from an alternative supplier

involving an unconstrained interface, such Opportunity Costs on Phase I/II HVDC-TF for each hour will be calculated as the difference between the cost of the economic power for the foregone transaction and the cost of economic power for the alternative transaction. The Service Agreement will set forth the method for calculating charges for Opportunity Costs on Phase I/II HVDC-TF associated with such foregone purchases.

2.1.7 Short Term Power Transfers Out of New England - The NU Companies' lost opportunities to sell short-term power will occur when the amount of power that would be economical for the NU Companies to sell in the market (at validated, quoted prices that exceed their incremental energy cost) exceeds the amount of the NU Companies' allocated share of the Phase I/II HVDC-TF transfer capacity out of New England not then committed for Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service out of New England ("Short-Term Available Export Capacity"). It is recognized that operating conditions in New England or elsewhere and/or the location of the buyer may affect the amount of Phase I/II HVDC-TF Short-Term Available Export Capacity.

2.2 The following steps comprise the procedures to be used in assigning such Opportunity Costs on Phase I/II HVDC-TF to Firm Point-To-Point Transmission Service Customers under the Tariff after assignment of Opportunity Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, pursuant to the provision of the Tariff.

2.2.1 The megawatt (MW) difference, if any, between the aggregate of economic power sales opportunities and the Phase I/II HVDC-TF Short-Term Available Export Capacity will be determined hourly ("Export Shortfall").

2.2.2 To assign such Opportunity Costs on Phase I/II HVDC-TF to Firm Point-To-Point Transmission Customers, the date of Service Agreements under the Tariff for transmission service out of New England will be ordered (stacked) by date of the Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (for NU Companies off-system sales, transmitted under the Tariff, the date used shall be the date of the sales contract or wholesale transaction), with the Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff (or the NU Companies) having the latest execution date being assigned the highest order number. 2.2.3 Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff (and/or the NU Companies) contributing to the MW amount of lost opportunities will be determined by aggregating MWs of Reserved Capacity (including contract or transaction amount of such NU Companies' sales) counting backward from the highest order number Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (or contract or transaction of such NU Companies' sales) until the aggregate MWs equals the Export Shortfall.

2.2.4 Such Opportunity Costs on Phase I/II HVDC-TF for each hour associated with the highest priced sale opportunity foregone will be assigned to the highest order numbered Phase I/II HVDC-TF Firm Point-To-Point Service Agreement(s) under the Tariff (or contract or transaction for such NU Companies' sales) up to the MWs of such foregone sale.

2.2.5 The MWs of the next highest price sale foregone will be assigned to the MWs of the next following Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff or NU Companies' off-system sale (next highest order number not fully included in the calculation in d. above) and so on until the MWs used to calculate the lost opportunities equals the Export Shortfall.

2.2.6 Such Opportunity Costs on Phase I/II HVDC-TF for each hour will be calculated by computing the difference between the price of the power for which willing buyers exist, but to whom sales cannot be made because of limited Phase I/II HVDC-TF Short Term Available Export Capacity, and the incremental energy cost for the NU Companies for an equivalent amount of megawatt-hours (after reflecting applicable losses) of such foregone sales. If, however, the NU Companies elect to sell power to an alternative supplier involving an unconstrained interface, such Opportunity Costs on Phase I/II HVDC-TF will be calculated as the difference between the delivered price of power of the foregone transaction and the delivered price of power for the alternative transaction. The Service Agreement will set forth the methodology for calculating charges for Opportunity Costs on Phase I/II HVDC-TF associated with such foregone sales.

### 3. <u>TIE LINE ADJUSTMENT COSTS</u>

Service across the Phase I/II HVDC-TF into New England that results in a decrease in the amount of tie line benefits (expressed in kilowatts) reflected in the NU Companies' Capability Responsibility will be subject to claims for Opportunity Costs to account for reduction in such tie line benefits. The Service

Agreement will set forth the methodology to determine the reduced tie line benefit to the NU Companies and to calculate the charge for recovery of such Opportunity Costs.

# 4. <u>OTHER OPPORTUNITY COSTS</u>

Nothing in this Appendix B of Schedule Phase I/II HVDC-TF-LTF shall be construed to limit the right of the NU Companies to file unilaterally under Section 205 of the Federal Power Act for recovery of other Opportunity Costs incurred by the NU Companies in connection with Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service to a Transmission Customer.

## 5. <u>LIMIT OF OPPORTUNITY COSTS</u>

5.1 The aggregate annual Opportunity Costs billed across a given constrained interface shall be limited by the estimated annual levelized revenue requirement associated with new facilities that are technically and economically feasible to build and, if built, would increase the transfer capacity of the applicable interface to a level that would eliminate such costs. Such facilities and their costs will be designated in the Service Agreement. Opportunity Costs for all transactions will be accumulated and compared on an annual basis to the annual levelized revenue requirements associated with expanding the system as described above. The annual levelized revenue requirement so determined is the maximum cumulative Opportunity Costs that will be billed for that year for that interface for service in the applicable direction ("Cost Cap").

5.2 The Cost Cap shall not apply during the construction period set forth in the Service Agreement. The Companies shall not be restricted from filing a request for a waiver of the Cost Cap with the Commission on a case-by-case basis.

### 6. <u>OTHER PROVISIONS</u>

6.1 Whenever the NU Companies determine in advance that they expect to charge the Transmission Customer for Opportunity Costs hereunder, the NU Companies will, if practicable, notify the Transmission Customer, based on the information then available, and give such Customer the option of interrupting its scheduled deliveries for an identified day in order to avoid charges for Opportunity Costs. It is explicitly recognized that the NU Companies may not unilaterally interrupt service to avoid the incurrence of Opportunity Costs, and the option to permit interruption rests solely with the Transmission Customer. It is also explicitly recognized that the NU Companies may not have the ability to make this

determination on a timely basis and to provide notice in advance of scheduling deadlines and they shall not be liable in any manner for failure to provide advance notice under this paragraph or for changes in operating conditions that impact on anticipated availability of transfer capability.

6.2 For any hour that the NU Companies incur an Opportunity Cost pursuant to this Appendix B of Schedule Phase I/II HVDC-TF-LTF and NUSCO determines that the Opportunity Cost would not have been incurred if the NU Companies were not providing Phase I/II HVDC-TF Long-Term Firm Point-To-Point Transmission Service to the Transmission Customer, NUSCO shall be obligated to notify the Transmission Customer within one month of the date on which it had knowledge of the incurrence of the Opportunity Costs. In the event that the then calculated annual cumulative Opportunity Costs exceed the annual cumulative charges previously billed to the Transmission Customer for Embedded Costs or Opportunity Costs pursuant to Section I. of Schedule LTF, NUSCO may render an immediate billing adjustment.

6.3 All claims for Opportunity Costs shall be accompanied by a written statement or other documentation: (i) showing that the Opportunity Costs were incurred; showing the calculation for the Opportunity Costs incurred and claimed; and showing that the Opportunity Costs would not have been incurred in the absence of the transaction being charged. If the Transmission Customer, in good faith, disputes NUSCO's claim for Opportunity Costs, such dispute must be made within a ninety (90) day period following the end of the Service Year for which the Opportunity Costs were claimed by NUSCO.

6.4 The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Appendix B of Schedule Phase I/II HVDC-TF-LTF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

### SCHEDULE Phase I/II HVDC-TF STF

I. For each daily, weekly or monthly Transaction, NUSCO will bill the Transmission Customer the higher of: (1) the Embedded Cost Charge or (2) the Opportunity Cost Charges, calculated for the term of each such Transaction. For Transaction having a term greater than one month, NUSCO will bill the Transmission Customer the difference between: (1) the higher of the cumulative Embedded Cost Charges or the cumulative Opportunity Costs Charges, calculated from the effective date of Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service through the end of the service month and (2) the cumulative billed amount of charges for Embedded Costs and Opportunity Costs preceding the service month for which the bill is being rendered.

# A. <u>EMBEDDED COST CHARGE</u>

### 1. Determination of Embedded Cost Charge

The Embedded Cost Charge will provide for recovery of the embedded costs of the Phase I/II HVDC-TF of the NU Companies. The Embedded Cost Charge for each month will equal the sum of the Embedded Cost Charges for each monthly (or longer term), weekly, or daily Transaction during such month.

The Embedded Cost Charge for each monthly Transaction shall be determined as the product of: (a) the NU Companies' Annual Rate for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service divided by twelve (I2) months (expressed in dollars per kilowatt-month) and (b) the Reserved Capacity set forth for such monthly Transaction (expressed in kilowatts). The Embedded Cost Charge for each weekly Transaction shall be determined as the product of: (a) the NU Companies' Weekly Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Rate (expressed in dollars per kilowatt-week), and (b) the Reserved Capacity set forth for such weekly Transaction (expressed in kilowatts). The NU Companies' Weekly Rate is the NU Companies' Annual Rate for Phase I/II HVDC-TF Short Term Firm Point-To-Point Transmission Service divided by fifty-two (52) weeks.

The Embedded Cost Charge for each daily Transaction shall be determined as the product of: (a) the NU Companies' Daily Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Rate (expressed in dollars per kilowatt-day), and (b) the Reserved Capacity set forth for such daily Transaction (expressed in kilowatts). The NU Companies' Daily Rate is the NU

Companies' Weekly Rate for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service divided by five (5) days. The total of the charges for daily Transactions, under an individual reservation, in a seven (7) day period shall not exceed the charges based on the Weekly Rate and the maximum Reserved Capacity in the period.

#### 2. <u>NU Companies' Annual Formula Rate for Phase I/II HVDC-TF Short-Term</u>

<u>Transmission Service</u> The NU Companies' Annual Formula Rate for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service shall be expressed in dollars per kilowatt-year and shall be determined in accordance with the rate formula specified in Appendix A of this Schedule Phase I/II HVDC-TF-STF ("Formula Rate") being applied to the costs recorded on the NU Companies' books of account (i.e., FERC Form 1). The Formula Rate shall be determined on the basis of estimated costs for each year until the actual NU Companies' costs for such year are determined. Thereafter, payments made on such estimate shall be recalculated based on actual data for that year, and an appropriate billing adjustment shall be made.

## 3. <u>Tax Rates and Taxes</u>

The Formula Rate set forth in this Schedule Phase I/II HVDC-TF-STF in effect during a Service Year shall be based on the local, state, and federal tax rates and taxes in effect during the prior year. If, at any time, additional or new taxes are imposed on the Companies or existing taxes are removed, the Formula Rate will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

## 4. <u>Provision re: Exchanges</u>

With respect to Entitlement Transactions or Energy Transactions or other transactions that involve an exchange, each party to such transaction shall be treated as an individual Transmission Customer under the Tariff. Accordingly, a separate Schedule Phase I/II HVDC-TF-STF or other applicable charge(s) will be calculated for, and a separate bill will be rendered to, each such individual Transmission Customer.

### B. <u>OPPORTUNITY COSTS CHARGE</u>

The Opportunity Costs Charge shall be determined each month in accordance with the provisions set forth in Appendix B of this Schedule Phase I/II HVDC-TF-STF and the Service Agreement.

II. In addition to the applicable charges set forth in Section I of this Schedule Phase I/II
 HVDC-TF-STF, and as otherwise specified in the Service Agreement, the Transmission
 Customer shall pay to NUSCO each month the following additional charges for Phase I/II
 HVDC-TF Short-Term Firm Point-To-Point Transmission Service provided during such month.

- A. Taxes and Fees Charge
- B. Regulatory Expenses Charge
- C. Other

## A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service provided under the Tariff, not specifically provided for in any of the charge or rate provisions under the Tariff, including any applicable interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for any such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

### B. <u>REGULATORY EXPENSES CHARGE</u>

The NU Companies shall have the right to make a Section 205 filing for recovery of regulatory expenses associated with the Tariff and the Service Agreements.

### C. <u>OTHER</u>

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule Phase I/II HVDC-TF-STF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE PHASE I/II HVDC-TF STF Appendix A RATES

The NU Companies' Formula Rate for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula.

 $Formula Rate_i = \frac{A_{i-1}-B_{i-1}}{C_{i-1}}$ 

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

• A<sub>i-1</sub> is the Annual Cost (expressed in dollars) of the Phase I/II HVDC-TF of the NU Companies for the calendar year prior to the Service Year. The Annual Revenue Requirements are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule Phase I/II HVDC-TF-STF.

•  $B_{i-1}$  is the actual transmission revenues (expressed in dollars) provided from the provision of transmission services over the Phase I/II HVDC-TF to others. The actual transmission revenues shall be those recorded on the books of the NU Companies in FERC Account Nos. 447 and 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

•  $C_{i-1}$  is the average of NU Companies' twelve monthly maximum transfer limits (expressed in kilowatts) on its share of the Phase I and Phase II DC facilities for the calendar year prior to the Service Year.

# SCHEDULE Phase I/II HVDC-TF-STF Appendix A Exhibit 1 ANNUAL TRANSMISSION REVENUE REQUIREMENTS

The Annual Transmission Cost for the NU Companies' Phase I/II HVDC-TF are the costs assessed by each of them in owning, operating, maintaining, and supporting those facilities, plus any applicable leasing costs and an allocable share of General Plant and other such plant and equipment. These costs shall be computed on a calendar-year basis using costs, from the calendar year prior to the Service Year.

In making such determinations, the provisions of the Uniform System of Accounts prescribed by FERC for Class A and Class B Public Utilities and Licensees shall be controlling.

The rate formulae for determination of the annual revenue requirements for the Phase I/II HVDC-TF of the NU Companies are determined pursuant to this Appendix A of Schedule Phase I/II HVDC-TF-STF, as follows:

A. <u>ANNUAL REVENUE REQUIREMENTS</u> = Sum of [each NU Companies' Phase I/II HVDC-TF transmission costs - Chester Static VAR Compensator].

# SCHEDULE PHASE I/II HVDC-TF-STF Appendix B OPPORTUNITY COSTS

The types of Opportunity Costs that may be incurred by the NU Companies and charged to Transmission Customers in connection with the provision of Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service pursuant to a Service Agreement are described below.

## 1. <u>OUT OF RATE COSTS</u>

1.1 Out of Rate Costs are incurred when: (i) the NU Companies are required under an ISO dispatch order to limit the operation of any of their generation Entitlements below the output level under economic dispatch or to "must run" any of their generation Entitlements above the levels associated with economic dispatch; and (ii) the ISO dispatch order adversely impacts the NU Companies' settlement billing or the settlement billing of another Transmission Customer that has a contractual right (through the purchase of an Entitlement from the NU Companies) to pass the cost back to the NU Companies; and (iii) the ISO does not grant a waiver of the Out of Rate Costs incurred pursuant to (i) and (ii) above.

1.2 The information required from the ISO to establish the existence and level of Out of Rate Costs and the Transmission Customer's responsibility for such costs will normally not be available to the NU Companies by the end of the billing month in which the Out of Rate Costs are incurred. Accordingly, the bills rendered for Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service pursuant to Schedule 20A shall be subject to subsequent adjustment, as provided in this Appendix B of Schedule Phase I/II HVDC-TF-STF.

1.3 In circumstances where multiple transactions across a constrained transmission path are causing the incurrence of Out of Rate Costs, the Out of Rate Costs will be allocated first to the Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff to the extent that their service is not curtailed or interrupted pursuant to the provisions of the Tariff. If, after curtailment or interruption of such Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service and/or the allocation of Out of Rate Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, Out of Rate Costs remain, such remaining costs will be allocated to Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service customers with the latest date (latest means, the latest dated Service Agreement for Firm Point-To-Point

Transmission Service). Where the reduction in the number of megawatts of Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short Term Firm Point-To-Point Transmission Service that would have been required to eliminate the need for the ISO limitation or "must run" in any hour exceeds the megawatts of actual Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service of the latest applicable transaction in such hour, the excess Out of Rate Costs will be allocated to the next latest transaction and so on until the total additional megawatts of Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service that is required to be reduced to eliminate the need for such ISO limitation or "must run" order has been achieved. Whenever the transactions across a constrained transmission path that are causing the incurrence of Out of Rate Costs include off-system sales by the NU Companies, such NU Companies' off-system sales shall be included on the same basis as Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service transactions in determining responsibility for Out of Rate Costs and the date of the off-system sales contract or wholesale transaction shall be used to determine its "service agreement" or "transaction" date.

# 2. <u>OPPORTUNITY COSTS ON PHASE I/II HVDC-TF</u>

### 2.1 Short-Term Power Transfers into New England

The NU Companies' lost opportunities to purchase economic short-term power will occur when the amount of power that would be economical for the NU Companies to purchase in the market (at a validated, quoted delivered price below their decremental energy cost) exceeds the amount of the NU Companies' allocated share of Phase I/II HVDC-TF transfer capacity not then committed to others for Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service into New England and for purchases on behalf of Native Load Customers ("Short-Term Available Import Capacity"). Operating conditions in New England or elsewhere and/or the location of the seller may affect the amount of Phase I/II HVDC-TF Short-Term Available Import Capacity.

The following steps comprise the procedures to be used in assigning such Opportunity Costs on Phase I/II HVDC-TF to Firm customers under the Tariff after assignment of any Opportunity Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, pursuant to the provisions of the Tariff. 2.1.1 The megawatt (MW) difference, if any, between the aggregate of economic power purchase opportunities available and Phase I/II HVDC-TF Short-Term Available Import Capacity will be determined hourly ("Import Shortfall").

2.1.2 To assign such Opportunity Costs on Phase I/II HVDC-TF to Transmission Customers, Firm Point-To-Point Service Agreements under the Tariff will be ordered (stacked) by date of execution of the Phase I/II HVDC-TF Firm Point To-Point Service Agreement under the Tariff, with the Firm Point-To-Point Transmission Customers under the Tariff having the latest date being assigned the highest order number.

2.1.3 Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff contributing to the MW amount of lost opportunities will be determined by aggregating MWs of Reserved Capacity counting backward from the highest order number Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff until the aggregate MWs equals the Import Shortfall.

2.1.4 Such Opportunity Costs on Phase I/II HVDC-TF for each hour associated with the lowest cost purchase opportunity foregone will be assigned to the highest order numbered Phase I/II HVDC-TF Firm Point-To-Point Service Agreement(s) under the Tariff up to the MWs of such foregone purchase.

2.1.5 The MWs of the next lowest cost purchase foregone will be assigned to the MWs of the next following Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (next highest order number not fully included in the calculation in d. above) and so on until the MWs used to calculate the lost opportunities equals the Import Shortfall.

2.1.6 Such Opportunity Costs on Phase I/II HVDC-TF will be calculated for each hour by computing the difference between the cost of the economic power offered to, but not able to be taken by, the NU Companies and the decremental energy cost for the NU Companies for an equivalent amount of megawatt-hours (after reflecting applicable losses) of such foregone purchases. If, however, the NU Companies elect to purchase power from an alternative supplier involving an unconstrained interface, such Opportunity Costs on Phase I/II HVDC-TF for each hour will be calculated as the difference between the cost of the economic power for the foregone transaction and the cost of economic power for the alternative transaction. The Service

Agreement will set forth the method for calculating charges for Opportunity Costs on Phase I/II HVDC-TF associated with such foregone purchases.

#### 2.2 Short-Term Power Transfers Out of New England

The NU Companies' lost opportunities to sell Phase I/II HVDC-TF short-term power will occur when the amount of power that would be economical for the NU Companies to sell in the market (at validated, quoted prices that exceed their incremental energy cost) exceeds the amount of the NU Companies' allocated share of the Phase I/II HVDC-TF transfer capacity out of New England not then committed for Phase I/II HVDC-TF Long-Term and Phase I/II HVDC-TF Short Term Firm Point-To-Point Transmission Service out of New England ("Short-Term Available Export Capacity"). It is recognized that operating conditions in New England or elsewhere and/or the location of the buyer may affect the amount of Short-Term Available Export Capacity.

The following steps comprise the procedures to be used in assigning such Opportunity Costs on Phase I/II HVDC-TF to Firm Point-To-Point Customers under the Tariff after assignment of Opportunity Costs to Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service customers under the Tariff, pursuant to the provision of the Tariff.

2.2.1 The megawatt (MW) difference, if any, between the aggregate of economic power sales opportunities and the Short-Term Available Export Capacity will be determined hourly ("Export Shortfall").

2.2.2 To assign such Opportunity Costs on Phase I/II HVDC-TF to Transmission Customers, the date of Phase I/II HVDC-TF Firm Point-To-Point Service Agreements under the Tariff for transmission service out of New England will be ordered (stacked) by date of the Firm Point-To-Point Service Agreement under the Tariff (for NU Companies off-system sales, transmitted under Phase I/II HVDC-TF Firm Point-To-Point Transmission Service under the Tariff, the date used shall be the date of the sales contract or wholesale transaction), with the Phase I/II HVDC-TF Firm Point-To-Point Transmission Customers under the Tariff (or the NU Companies) having the latest execution date being assigned the highest order number.

2.2.3 Firm Point-To-Point Transmission Customers under the Tariff (and/or the NU Companies) contributing to the MW amount of lost opportunities will be determined by aggregating MWs of Reserved Capacity (including contract or transaction amount of such

Companies' sales) counting backward from the highest order number Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (or contract or transaction of such NU Companies' sales) until the aggregate MWs equals the Export Shortfall.

2.2.4 Such Opportunity Costs on Phase I/II HVDC-TF for each hour associated with the highest priced sale opportunity foregone will be assigned to the highest order numbered Phase I/II HVDC-TF Firm Point-To-Point Service Agreement under the Tariff (or contract or transaction for such Companies' sales) up to the MWs of such foregone sale.

2.2.5 The MWs of the next highest price sale foregone will be assigned to the MWs of the next following Finn Point-To-Point Service Agreement under the Tariff or NU Companies' off-system sale (next highest order number not fully included in the calculation in d. above) and so on until the MWs used to calculate the lost opportunities equals the Export Shortfall.

2.2.6 Such Opportunity Costs on Phase I/II HVDC-TF for each hour will be calculated by computing the difference between the price of the power for which willing buyers exist, but to whom sales cannot be made because of limited Phase I/II HVDC-TF Short-Term Available Export Capacity, and the incremental energy cost for the NU Companies for an equivalent amount of megawatt-hours (after reflecting applicable losses) of such foregone sales. If, however, the NU Companies elect to sell power to an alternative supplier involving an unconstrained interface, such Opportunity Costs on Phase I/II HVDC-TF will be calculated as the difference between the delivered price of power of the foregone transaction and the delivered price of power for the alternative transaction. The Service Agreement will set forth the methodology for calculating charges for Opportunity Costs on Phase I/II HVDC-TF associated with such foregone sales.

### 3. <u>TIE LINE ADJUSTMENT COSTS</u>

Service across the Phase I/II HVDC-TF into New England that results in a decrease in the amount of tie line benefits (expressed in kilowatts) reflected in the NU Companies' Capability Responsibility will be subject to claims for Opportunity Costs to account for reduction in such tie line benefits. The Service Agreement will set forth the methodology to determine the reduced tie line benefit to the NU Companies and to calculate the charge for recovery of such Opportunity Costs.

# 4. <u>OTHER OPPORTUNITY COSTS</u>

Nothing in this Appendix B of Schedule Phase I/II HVDC-TF-STF shall be construed to limit the right of the NU Companies to file unilaterally under Section 205 of the Federal Power Act for recovery of other Opportunity Costs incurred by the Companies in connection with Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service to a Transmission Customer.

### 5. <u>OTHER PROVISIONS</u>

5.1 Whenever the NU Companies determine in advance that they expect to charge the Transmission Customer for Opportunity Costs hereunder, the NU Companies will, if practicable, notify the Transmission Customer, based on the information then available, and give such Customer the option of interrupting its scheduled deliveries for an identified day in order to avoid charges for Opportunity Costs. It is explicitly recognized that the NU Companies may not unilaterally interrupt service to avoid the incurrence of Opportunity Costs, and the option to permit interruption rests solely with the Transmission Customer. It is also explicitly recognized that the NU Companies may not have the ability to make this determination on a timely basis and to provide notice in advance of scheduling deadlines and they shall not be liable in any manner for failure to provide advance notice under this paragraph or for changes in operating conditions that impact on anticipated availability of transfer capability.

5.2 For any hour that the NU Companies incur an Opportunity Cost pursuant to this Appendix B of Schedule Phase I/II HVDC-TF-STF and NUSCO determines that the Opportunity Cost would not have been incurred if the NU Companies were not providing Phase I/II HVDC-TF Short-Term Firm Point-To-Point Transmission Service to the Transmission Customer, NUSCO shall be obligated to notify the Transmission Customer within one month of the date on which it had knowledge of the incurrence of the Opportunity Costs. In the event that the then calculated cumulative Opportunity Costs exceed the cumulative charges previously billed to the Transmission Customer for Embedded Costs or Opportunity Costs pursuant to Section I of Schedule Phase I/II HVDC-TF-STF, NUSCO may render an immediate billing adjustment.

5.3 All claims for Opportunity Costs shall be accompanied by a written statement or other documentation: (i) showing that the Opportunity Costs were incurred; (ii) showing the calculation for the Opportunity Costs incurred and claimed; and (iii) showing that the Opportunity Costs would not have been incurred in the absence of the transaction being charged. If the Transmission Customer, in good faith, disputes NUSCO's claim for Opportunity Costs, such dispute must be made within a ninety (90)

day period following the end of the Service Year for which the Opportunity Costs were claimed by NUSCO.

5.4 The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Appendix B of Schedule Phase I/II HVDC-TF-STF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE PHASE I/II HVDC-TF-NF

I. NUSCO shall bill the Transmission Customer for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service, and the Transmission Customer shall be obligated to pay to NUSCO the charges as set forth in this Schedule Phase I/II HVDC-TF-NF as applicable.

### A. TRANSMISSION CHARGE

### 1. <u>General</u>

The Transmission Customer shall pay to NUSCO each month the sum of the Transmission Charges calculated for all of its monthly Transactions, weekly Transactions, daily Transactions and hourly Transactions, each as set forth below.

With respect to any wholesale transactions that involve an exchange, each party to such Transaction shall be an individual Transmission Customer under the Tariff. Accordingly, a Transmission Charge, as applicable, will be calculated for, and a separate bill will be rendered to, each such Transmission Customer.

# 2. <u>Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service For Monthly</u> <u>Transactions</u>

The Transmission Charge for each month applicable to a monthly Transaction shall be determined as the product of: (a) the rate posted on NU's Open Access Same-Time Information System ("OASIS") at the time the service is reserved, not to exceed the NU Companies' Annual Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service divided by twelve (12) months and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such month, expressed in kilowatts.

# 3. <u>Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service For Weekly</u> Transactions

The Transmission Charge for each month applicable to weekly Transactions shall be the sum of the transmission charges determined for each weekly Transaction during such month. The transmission charge for each weekly Transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Weekly Phase I/II HVDC-TF Firm Point-To-Point Transmission Charge Rate (expressed in dollars per kilowatt week), and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such week (expressed in kilowatts). The NU Companies' Weekly Rate is the NU Companies' Annual Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service divided by fifty two (52) weeks.

# 4. Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service For Daily

### Transactions

The Transmission Charge for each month applicable to daily Transactions will be the sum of the transmission charges determined for each daily Transaction.

The transmission charge for each daily Transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Daily Phase I/II HVDC-TF Firm Point-To-Point Transmission Charge Rate (expressed in dollars per kilowatt-day); and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such day (expressed in kilowatts). The NU Companies' On-Peak Daily Rate is the Companies' Weekly Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service divided by five (5) days. The NU Companies' Off-Peak Daily Rate is the NU Companies' Weekly Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service plus seven (7) days. The total of the charges for daily Transactions, under an individual Reservation, in a seven (7) day period shall not exceed the charges based on the Weekly Rate and the maximum Reserved Capacity in the period.

# 5. <u>Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service For Hourly</u> <u>Transactions</u>

The Transmission Charge for each month applicable to hourly Transactions will be the sum of the transmission charges determined for each hourly Transaction. The transmission charge for each hour of an hourly Transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU System

Companies' Daily Phase I/II HVDC-TF Firm Point-To-Point Transmission Service Rates divided by sixteen (16) hours (expressed in dollars per kilowatt-hour), and (b) the Reserved Capacity as set forth in the Transmission Customer's applicable Reservation for such hour- (expressed in kilowatts). The NU Companies' Hourly On-Peak Rate is equal to the NU Companies' Daily Rate for Phase I/II HVDC-TF Non-Firm Transmission Service divided by sixteen (16) hours. The NU Companies' Hourly Off-Peak Rate is equal to the NU Companies' Daily Rate for Phase I/II HVDC-TF Non-Firm Transmission Service divided by twenty-four (24) hours. The total of the charges for hourly Transactions, under an individual Reservation, in a twenty-four (24) hour period shall not exceed the charges based on the Daily Rate and the maximum Reserved Capacity in the period.

## 6. <u>Credit to the Transmission Charge</u>

Whenever service provided hereunder is interrupted or curtailed by the NU Companies, the Phase I/II HVDC-TF Control Center or the ISO, the Transmission Charges to the Transmission Customer calculated pursuant to Sections A.1 through 5, of this Schedule Phase I/II HVDC-TF-NF shall be credited by an amount equal to the sum of the credits calculated for each hour of interruption or curtailment in service. The credit to the Transmission Customer for each such hour of interruption or curtailment shall be calculated as the product of (i) the applicable equivalent hourly charge for hourly, daily, weekly, or monthly Transactions, and (ii) the kilowatts of service interruption or curtailment during such hour.

# 7. <u>NU Companies' Annual Formula Rate for Phase I/II HVDC-TF Non-Firm Point-To-</u>

## Point Transmission Service

The NU Companies' Annual Formula Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service shall be expressed in dollars per kilowatt-year and shall be determined in accordance with the rate formula specified in Appendix A of this Schedule Phase I/II HVDC-TF-NF ("Formula Rate"), being applied to the costs recorded on each of the NU Companies' books of account (i.e., FERC Form 1). The Formula Rate shall be determined on the basis of estimated costs for each year until the actual NU Companies' costs for such year are determined. Thereafter, payments made on such estimate shall be recalculated based on actual data for that year, and an appropriate billing adjustment shall be made pursuant to Schedule 20A.

8. <u>Tax Rates and Taxes</u>

The Formula Rate set forth in this Schedule Phase I/II HVDC-TF-NF in effect during a Service Year shall be based on local, state, and federal tax rates and taxes in effect during the prior year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the Formula Rate will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

II. In addition to the applicable charges set forth in Parts I and II of the Tariff, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay NUSCO each month the following additional charges for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service provided during such month.

- A. Taxes and Fees Charge
- B. Regulatory Expenses Charge
- C. Other

## A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service provided under the Tariff, not specifically provided for in any of the charge or rate provisions under the Tariff, including any applicable interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

## B. REGULATORY EXPENSES

The NU Companies reserve their rights to make a Section 205 filing for recovery of their costs to administer the Tariff and the Service Agreements.

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule Phase I/II HVDC-TF-NF in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

## SCHEDULE Phase I/II HVDC-TF-NF Appendix A RATES

The NU Companies' Formula Rate for Phase I/II HVDC-TF Non-Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula.

$$Formula Rate_i = \frac{A_{i-1}-B_{i-1}}{C_{i-1}}$$

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

• A <sub>i-1</sub> is the Annual Cost (expressed in dollars) of the Phase I/II HVDC-TF of the NU Companies for the calendar year prior to the Service Year. The Annual Revenue Requirements are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule Phase I/II HVDC-TF-NF.

• Bi-1 is the actual transmission revenues (expressed in dollars) provided from the provision of transmission services over the Phase I/II HVDC-TF to others. The actual transmission revenues shall be those recorded on the books of the NU Companies in FERC Account Nos. 447 and 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

• Ci-1 is the average of the NU Companies' monthly peak load (expressed in kilowatts of its share of the Phase I/II HVDC-TF of the NU Companies, for the calendar year prior to the Service Year, as reported in FERC Form No. 1.

## SCHEDULE Phase I/II HVDC-TF-NF Appendix A Exhibit I ANNUAL TRANSMISSION REVENUE REQUIREMENTS

The Annual Transmission Cost for the NU Companies' Phase I/II HVDC-TF are the costs assessed by each of them in owning, operating, maintaining, and supporting those facilities, plus any applicable leasing costs and an allocable share of General Plant and other such plant and equipment. These costs shall be computed on a calendar-year basis using costs, from the calendar year prior to the Service Year.

In making such determinations, the provisions of the Uniform System of Accounts prescribed by FERC for Class A and Class B Public Utilities and Licensees shall be controlling.

The rate formula for determination of the annual revenue requirements for the Phase I/II HVDC-TF of the NU Companies are determined pursuant this Appendix A of Schedule Phase I/II HVDC-TF-NF, as follows:

A. <u>ANNUAL REVENUE REQUIREMENTS</u> = Sum of each NU Companies' Phase I/II HVDC TF transmission costs-Chester Static VAR Compensator.

## SCHEDULE 20A-NU

## ATTACHMENT L Creditworthiness Procedures

1. General Information – All customers taking any service over the Phase I/II HVDC-TF facilities provided by The Connecticut Light and Power Company, Western Massachusetts Electric Company, and Public Service Company of New Hampshire (the "NU Companies") under Schedule 20A-NU must meet the terms of this Attachment L.

## 2. Establishing Creditworthiness

a) Each customer's creditworthiness must be established before receiving transmission services from the NU Companies. A customer will be evaluated at the time that its application for transmission service is provided to the NU Companies based on the creditworthiness information required under this Attachment L. The NU Companies shall conduct a credit review of each transmission customer not less than annually or upon reasonable request by the transmission customer.

**b**) The NU Companies will review the customer's creditworthiness information for completeness and will notify the customer if additional information is required.

c) Upon completion of a creditworthiness evaluation of a customer, the NU Companies will forward a written evaluation to the customer if they determine that Financial Assurance must be provided.

**3. Financial Information** – Customers requesting transmission service must submit if available the following:

a) All current rating agency reports of the customer from Standard and Poor's ("S&P"), Moody's Investors Service ("Moody's"), and/or Fitch Ratings ("Fitch").

**b**) A Management Discussion and Analysis ("MD&A") along with audited financial statements provided by an independent registered public accounting firm or a registered independent auditor for the three (3) most recent fiscal years, or the period of the customer's existence, if shorter than three (3) years.

## 4. Creditworthiness – Qualification for Unsecured Credit

a) A customer may receive unsecured credit from the NU Companies equivalent to three (3) months of the transmission charges. The customer must meet at least one of the following criteria:

- (i) If rated, the customer's lowest rating from the three rating agencies on its senior unsecured long-term debt; or if the customer does not have such a rating, then one rating level below the rating then assigned to the customer's corporate credit rating, as follows:
  1. a Standard and Poor's or Fitch rating of at least BBB, or
  2. a Moody's rating of least Baa2.
- (ii) If un-rated or if rated below BBB/Baa2, as described in 4(a)(i) above, the customer must meet all of the following creditworthiness criteria for the three (3) most recent fiscal years:

1. A Capitalization Ratio (Debt divided by the sum of shareholders' equity and Debt) of no more than 60 percent Debt, where "Debt" is defined as the sum of all long-term and short-term debt, preferred securities and capital leases, each of which is recorded in accordance with generally accepted accounting principles;

2. Earnings before interest, taxes, depreciation and amortization ("EBITDA") in the most recent fiscal quarter divided by interest expense (ratio of EBITDA-to-interest expense of at least three (3) times); and

3. Audited Financial Statements with an unqualified audit opinion from an independent registered public accounting firm or a registered independent auditor.

**b**) If the customer relies on the creditworthiness of a parent company, the parent company must satisfy the ratings criteria in Section 4(a) above, and must provide to the NU Companies a written guarantee that it will be unconditionally responsible for all financial obligations associated with the customer's receipt of transmission service from the NU Companies.

c) If the customer or the customer's parent company do not qualify for unsecured credit under Sections 4(a), or (b) above, the customer can still qualify for unsecured credit equivalent to three (3)

months of transmission service charges, if the customer has, on a rolling basis, 12 consecutive months of payments to the NU Companies with no missed, late or defaults in payment.

**5. Financial Assurance** – If the customer does not meet the applicable requirements for unsecured credit set out in Section 4, then the customer must either:

a) pay in advance an amount equal to the lesser of the total charge for transmission service not less than five (5) days in advance of the commencement of service, in which case the NU Companies will pay to the customer interest on the amounts not yet due to the NU Companies, computed in accordance with 18 C.F.R. §35.19(a)(2)(iii) of the Commission's Regulations; or

**b**) obtain Financial Assurance in the form of a letter of credit or a parent guarantee equal to the equivalent of three (3) months of transmission service charges prior to receiving service.

- (i) The letter of credit must be one or more irrevocable, transferable standby letters of credit issued by a United States commercial bank or a United States branch of a foreign bank provided that such customer is not an affiliate of such bank. The issuing bank must have a credit rating of at least A2 from Moody's or an A rating from S&P or Fitch, or an equivalent credit rating by another nationally recognized rating service reasonably acceptable to the NU Companies, provided that such bank shall have assets totaling not less than ten billion dollars (\$10,000,000). All costs of the letter of credit shall be borne by the applicant for such letter of credit. In the event of an inconsistency in the ratings by Moody's, S&P, or Fitch, a "split rating", the lowest credit rating shall apply.
- (ii) If the credit rating of a bank or other financial institution issuing a letter of credit to a customer falls below the levels specified in Section 5(b)(i) above, the customer shall have three (3) business days to obtain a suitable letter of credit from another bank or other financial institution that meets the specified levels unless the NU Companies agree in writing to extend such period.

6. **Notifications** - Each customer must inform the NU Companies in writing within three (3) business days of any material change in its or its letter of credit issuer's financial condition, and if the customer qualifies under Section 4(b), that of its parent company. A material change in financial condition may include, without limitation, the following:

- a) change in ownership by way of a merger, acquisition, or substantial sale of assets;
- **b**) downgrade by a recognized major financial rating agency;
- c) placement on credit watch with negative implications by a major financial rating agency;
- d) a bankruptcy filing by the customer or parent;
- e) any action requiring the filing of a SEC Form 8-K;
- f) declaration of or acknowledgement of insolvency;
- g) report of a significant quarterly loss or decline in earnings;
- **h**) resignation of key officer(s); or
- i) issuance of a regulatory order and/or the filing of a lawsuit that could materially adversely impact current or future financial results.

7. **Ongoing Financial Review** – Each customer is required to submit to the NU Companies annually or when issued, as applicable:

a) current rating agency reports;

**b**) audited financial statements from an independent registered public accounting firm or a registered independent auditor; and

c) SEC Forms 10-K and 8-K, promptly upon their filing.

8. **Change in Creditworthiness Status** - A customer who has been extended unsecured credit pursuant to Section 4, must comply with the terms of Financial Assurance in Section 5, if one or more of the following conditions apply:

- a) the customer no longer meets the applicable criteria for unsecured credit in Section 4;
- b) the customer exceeds the amount of unsecured credit extended by the NU Companies, in which case Financial Assurance equal to the amount of exceeded unsecured credit must be provided within five (5) business days; or
- c) the customer has missed two or more payments for any of the transmission services provided by the NU Companies in the last twelve (12) months.

## 9. Procedures for Changes in Credit Levels and Collateral Requirements

- a) The NU Companies shall issue notice to a customer of any changes to the approved credit levels and/or collateral requirements within five (5) business days after (1) receiving notification of any material changes in financial condition under Section 6 above; (2) receiving the information required for the customer's ongoing financial review listed in Section 7 above; or (3) the occurrence of any of the events leading to a change in creditworthiness requirements listed in Section 8 above.
- b) A customer may submit a written request that the NU Companies provide an explanation of the reasons for the changes in credit levels and/or collateral requirements within five (5) business days after receiving notification of the changes. The NU Companies will provide a written response within five (5) business days after receiving such a request.

10. **Contesting Creditworthiness Determinations** – A customer may contest the NU Companies' determination of its creditworthiness by submitting a written request for re-evaluation within 20 calendar days of being notified of the creditworthiness determination. The request should provide information supporting the basis for a re-evaluation of the customer's creditworthiness. The NU Companies will review the request and respond within 20 calendar days of receipt.

## 11. Process for Changing Credit Requirements

a) In the event the NU Companies plan to revise the Schedule 20A-NU requirements for credit levels or collateral requirements described in this Attachment L, they will make a filing under Section 205 of the Federal Power Act.

**b**) Following Commission acceptance of such filing and upon the effective date, the NU Companies shall revise their Attachment L and an updated version of Schedule 20A-NU shall be posted to the ISO-NE web site.

c) When the NU Companies change their credit requirements for service under Schedule 20A-NU, the customer is responsible for forwarding updated financial information to the NU Companies. The customer must indicate whether the change affects its ability to meet the requirements of Attachment L. In cases where the customer's credit status has changed, the customer must take the necessary steps to comply with the revised credit requirements of Attachment L by the effective date of the change.

12. **Suspension of Service** - The NU Companies may immediately suspend service (with notification to the Commission) to a customer, and may initiate proceedings with the Commission to terminate service, if the customer does not meet the terms described in Sections 4 through 8 at any time during the term of service or if the customer's payment obligations to the NU Companies exceed the amount of unsecured or secured credit to which it is entitled under this Attachment L. A customer is not obligated to pay for transmission service that is not provided as a result of a suspension of service.

SCHEDULE 21 - LOCAL SERVICE

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This Schedule 21 contains the main substantive provisions applicable to Local Service. It includes common PTO rates, terms and conditions for Local Point-to-Point Service and Local Network Service and PTO-specific Local Service Schedules. Retail service is not subject to this Schedule 21 unless specifically provided for in the PTO's Local Service Schedule. The rates, terms and conditions for interconnection service to generators with total generating capacity of greater than 20 MW are set forth in Schedule 22. The rates, terms and conditions for interconnection service to generators with total generating capacity of 20 MW and less are set forth in Schedule 23. To the extent applicable, the rates, terms and conditions for load interconnections are set forth under the PTO-specific Local Service Schedules.

All Transmission Customers taking Local Service shall be subject to and comply with the rates, terms and conditions of this Schedule 21 as well as any applicable Local Service Schedule. In the event of a conflict between any rate, term or condition in the Tariff and any rate, term or condition in this Schedule 21 and/or an applicable Local Service Schedule, the rate, term or condition in this Schedule 21 and/or the applicable Local Service Schedule shall govern.

With the exception of waivers specified in certain PTO specific Local Service Schedules, tThe following NAESB WEQ Standards are hereby incorporated by reference in this Schedule 21 to the extent that the requirements therein apply to the PTOs:

- WEQ-000, Abbreviations, Acronyms, and Definition of Terms, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Oct. 4, 2012, Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-001, Open Access Same-Time Information System (OASIS), OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013) excluding Standards 001-9.5, 001-10.5, 001-14.1.3, 001-15.1.2 and 001-106.2.5;
- WEQ-002, Open Access Same-Time Information System (OASIS) Business Practice Standards and Communication Protocols (S&CP), OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Nov. 28, 2012 and Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-003, Open Access Same-Time Information System (OASIS) Data Dictionary Business Practice Standards, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);

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- WEQ-004, Coordinate Interchange, WEQ Version 003, July 31, 2012 (as modified by NAESB final actions ratified on December 28, 2012);
- WEQ-005, Area Control Error (ACE) Equation Special Cases, WEQ Version 003, July 31, 2012);
- WEQ-006, Manual Time Error Correction, WEQ Version 003, July 31, 2012;
- WEQ-007, Inadvertent Interchange Payback, WEQ Version 003, July 31, 2012;
- WEQ-008, Transmission Loading Relief (TLR) Eastern Interconnection, WEQ Version 003, July 31, 2012 (with minor corrections applied November 28, 2012);
- WEQ-011, Gas / Electric Coordination, WEQ Version 003, July 31, 2012;
- WEQ-012, Public Key Infrastructure (PKI) WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on October 4, 2012); and
- WEQ-013, Open Access Same-Time Information System (OASIS) Implementation Guide, OASIS Version 2.0, WEQ Version 003, July 31, 2012, as modified by NAESB final actions ratified on Dec. 28, 2012 (with minor corrections applied Nov. 26, 2013);
- WEQ-015, Measurement and Verification of Wholesale Electricity Demand Response, WEQ
   Version 003, July 31, 2012;
- WEQ-021, Measurement and Verification of Energy Efficiency Products, WEQ Version 003, July 31, 2012.

The Participating Transmission Owners have requested a waiver of the following NAESB WEQ Version-003 Standards pursuant to a compliance filing submitted to the Commission on December 1, 2014 and a-Supplemental Waiver Request on April 14, 2015 to comply with FERC Order No. 676 H, *Standards for-Business Practices and Communication Protocols for Public Utilities*, 148 FERC ¶ 61,205 (2014), asmodified by the Commission's October 3, 2014 *Errata Notice*, 149 FERC ¶ 61,014 (2014).

WEQ-004, Coordinate Interchange, WEQ Version 003, July 31, 2012 (as modified by NAESB finalactions ratified on December 28, 2012);

WEQ 005, Area Control Error (ACE) Equation Special Cases, WEQ Version 003, July 31, 2012);

WEQ 006, Manual Time Error Correction, WEQ Version 003, July 31, 2012;

WEQ-007, Inadvertent Interchange Payback, WEQ Version 003, July 31, 2012;

WEQ-008, Transmission Loading Relief (TLR) - Eastern Interconnection, WEQ Version 003, July-

31, 2012 (with minor corrections applied November 28, 2012);

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WEQ 011, Gas / Electric Coordination, WEQ Version 003, July 31, 2012; (To the extent that thisstandard does apply to an individual PTO, the incorporation of this standard shall be addressed withinthe respective PTO-specific Local Service Schedule.)-

WEQ-015, Measurement and Verification of Wholesale Electricity Demand Response, WEQ Version-003, July 31, 2012;

WEQ 021, Measurement and Verification of Energy Efficiency Products, WEQ Version 003, July 31, 2012;

WEQ-000, WEQ-001, WEQ-002 and WEQ-003, related to Network Integration Transmission Service ("NITS"), WEQ Version 003, July 31, 2012; and

WEQ 000, WEQ 001, WEQ 002, WEQ 003 and WEQ 013, related to Service Across Multiple-Transmission Systems ("SAMTS"), WEQ Version 003, July 31, 2012.

The PTOs will perform their functions under this Schedule 21 and the Local Service Schedules in a manner that is not inconsistent with the ISO's provision of regional service, administration of the regional markets, dispatch of resources, and operation of the New England Transmission System for purposes of reliability.

**Pre-Confirmed Request**: Is an OASIS transmission service request that commits the Transmission Customer to take and pay for the requested Local Point-to-Point Service upon acceptance on OASIS by the PTO that can provide the requested Local Point-to-Point Service.

**Pre-RTO Local Service Agreements**<sup>1</sup>: A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Firm or Non-Firm Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of their existing Local Service Agreement that was in effect prior to February 1, 2005 ("Pre-RTO Local Service Agreement" as defined to Section II.1 of the OATT) shall not be required to complete an Application or execute a Local Service Agreement under this Schedule 21. Instead, the Transmission Customer shall contact the associated PTO to discuss and, if appropriate, modify its existing Pre-RTO Local Service Agreement.

A Transmission Customer who wishes to request an alternate Firm Point of Receipt or Point of Delivery or make upgrades (i.e., increase MWs served) beyond the terms of its existing Pre-RTO Local Service Agreement, shall contact the PTO to make arrangements to terminate the Transmission Customer's

<sup>&</sup>lt;sup>1</sup> LSAs as defined in Section II.1 of the OATT do not include Excepted Transaction Agreements under Attachments G-1, G-2 and G-3 of the OATT.

existing pre-RTO Local Service Agreement and shall complete (and submit to the ISO) an Application for Local Service and then execute a Local Service Agreement under this Schedule 21.

RTO Local Service Agreements: For Local Service Agreements with an effective date on or after February 1, 2005 (an "RTO Local Service Agreement" as defined to Section II.1 of the OATT) a Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Non-Firm Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of its existing Local Service Agreement under this Schedule 21, shall not be required to execute a new Local Service Agreement under this Schedule 21, however, modifications to the Transmission Customer's existing Local Service Agreement may be required. Such modifications to an existing Local Service Agreement typically do not require an additional local or regional System Impact Study to be completed. The Transmission Customer shall complete (and submit to the ISO) an application for Local Transmission Service that reflects the requested modifications to the Local Service Agreement to facilitate revision of its existing Schedule 21 Local Service Agreement. A Transmission Customer who wishes to request an alternate Firm Point of Receipt or Point of Delivery or make upgrades (i.e., increase MWs served) beyond the terms of its existing RTO Local Service Agreement, shall contact the ISO to discuss and, if appropriate, terminate the Transmission Customer's existing RTO Local Service Agreement under this Schedule 21 and shall complete (and submit to the ISO) a new Application for Local Service and then execute a new Local Service Agreement under this Schedule 21.

**Reservation Priority For Existing Firm Service Customers**: Existing firm service customers (wholesale requirements and transmission only, with a contract term of five years or more), have the right to continue to take Local Service from the PTO when the contract expires, rolls over or is renewed. This transmission reservation priority is independent of whether the existing customer continues to purchase capacity and energy from the PTO or elects to purchase capacity and energy from another supplier. If at the end of the contract term, the PTO's Local Network cannot accommodate all of the requests for Local Service, the existing firm service customer must agree to accept a contract term at least equal to a competing request by any new Eligible Customer and to pay the current just and reasonable rate, as approved by the Commission, for such service; provided that, the firm service customer shall have a right of first refusal at the end of such service to the PTO whether it will exercise its right of first refusal no less than one year prior to the expiration date of its Local Service Agreement. This transmission reservation priority for existing firm service customers is an ongoing right that may be exercised at the

end of all firm contract terms of five years or longer. Local Service Agreements subject to a right of first refusal entered into prior to the date of the PTOs' filing adopting the reformed rollover language herein in compliance with Order No. 890 or associated with a transmission service request received prior to July 13, 2007, unless terminated, will become subject to the five year/one year requirement on the first rollover date after the date of the PTOs' filing adopting the reformed rollover language herein in compliance with Order No. 890; provided that, the one year notice requirement shall apply to such service agreements with five years or more left in their terms as of the date of the PTOs' filing adopting the reformed rollover language herein in compliance with Order No. 890.

FERC: The Federal Energy Regulatory Commission.

**Force Majeure**: Neither the ISO, a Transmission Owner nor a Customer will be considered in default as to any obligation under the Tariff if prevented from fulfilling the obligation due to an event of Force Majeure; provided that no event of Force Majeure affecting any entity shall excuse that entity from making any payment that it is obligated to make hereunder or under a Service Agreement. However, an entity whose performance under the Tariff is hindered by an event of Force Majeure shall make all reasonable efforts to perform its obligations under the Tariff, and shall promptly notify the ISO, the Transmission Owner or the Customer, whichever is appropriate, of the commencement and end of each event of Force Majeure.

Liability: The ISO shall not be liable for money damages or other compensation to the Customer for actions or omissions by the ISO in performing its obligations under the Tariff or any Service Agreement thereunder, except to the extent such act or omission by the ISO is found to result from its gross negligence or willful misconduct. A Transmission Owner shall not be liable for money damages or other compensation to the Customer for action or omissions by such Transmission Owner in performing its obligations under the Tariff or any Service Agreement thereunder, except to the extent such act or omission by such Transmission Owner is found to result from it gross negligence or willful misconduct. To the extent the Customer has claims against the ISO or a Transmission Owner, the Customer may only look to the assets of the ISO or a Transmission Owner (as the case may be) for the enforcement of such claims and may not seek to enforce any claims against the directors, members, shareholders, officers, employees or agents of the ISO or a Transmission Owner or Affiliate of either who, the Customer acknowledges and agrees, have no personal or other liability for obligations of the ISO or a Transmission Owner or Affiliate of either who, the Customer acknowledges and agrees, have no personal or other liability for obligations of the ISO or a Transmission Owner or Affiliate of either who, the Customer acknowledges or agents of the is status as directors, members, shareholders, officers, employees or agents of the is status as directors, members, shareholders, officers, employees or agents of the is status as directors, members, shareholders, officers, employees or agents of the is status as directors, members, shareholders, officers, employees or agents of the ison or a Transmission Owner or Affiliate of either who, the Customer acknowledges and agrees, have no personal or other liability for obligations of the ISO or a Transmission Owner or Affiliate of either who is the ison or agents of the ISO or a Transmission Owner or

any Customer be liable for any incidental, consequential, multiple or punitive damages, loss of revenues or profits, attorneys fees or costs arising out of, or connected in any way with the performance or non-performance under the Tariff or any Service Agreement thereunder. Notwithstanding the foregoing, nothing in this section shall diminish a Customer's obligations under Section I.5.3 of the Tariff or under Schedule 21 of the OATT.

**Indemnification**: Each Customer shall at all times indemnify, defend, and save harmless the ISO and the Transmission Owners and their respective directors, officers, members, employees and agents from any and all damages, losses, claims and liabilities by or to third parties arising out of or resulting from the performance by the ISO or Transmission Owners under the Tariff or any Service Agreement thereunder, any bankruptcy filings made by a Customer, or the actions or omissions of the Customer in connection with the Tariff or any Service Agreement thereunder, except in case of the ISO, gross negligence or willful misconduct by the ISO or its directors, officers, members, employees or agents, and, in the case of a Transmission Owner, the gross negligence or willful misconduct by such Transmission Owner or its directors, officers, members, employees or agents. The amount of any indemnity payment hereunder shall be reduced (including, without limitation, retroactively) by any insurance proceeds or other amounts actually recovered by the indemnified party in respect of the indemnified action, claim, demand, cost, damage or liability. The obligations of each Customer to indemnify the ISO and Transmission Owners shall be several, and not joint or joint and several.

**Interruption**: A reduction in non-firm transmission service due to economic reasons pursuant to Section I. 2 g).

**Local Network Upgrade**: Modifications or additions to the Local Network of a PTO, made in accordance with this Schedule 21, that are not Direct Assignment Facilities.

## I. LOCAL POINT-TO-POINT SERVICE

#### Preamble

Eligible Customers seeking Local Point-To-Point Service on a specific Local Network shall refer to the applicable Local Service Schedule to determine any PTO-specific rates, terms, and conditions applicable to such service. Except as otherwise provided in the Local Service Schedules, Firm and Non-Firm Local Point-To-Point Service will be provided pursuant to the rates, terms and conditions set forth below. Local

Point-To-Point Service is for the receipt of capacity and/or energy at designated Point(s) of Receipt and the transfer of such capacity and energy to designated Point(s) of Delivery.

A Local Point-To-Point Service Customer is not excused from any requirements of state law, or any order or regulation issued pursuant to state law, to arrange for Local Delivery Service with the PTO and distribution company providing such service and to pay all applicable charges associated with such service, including charges for stranded costs.

## 1) Nature of Firm Local Point-To-Point Service

a) **Term**: The minimum term of Firm Local Point-To-Point Service shall be one day and the maximum term shall be specified in the Local Service Agreement.

b) Reservation Priority: Local Long-Term Firm Point-To-Point Service shall be available on a first-come, first-served basis, i.e., in the chronological sequence in which each Transmission Customer has reserved service. Reservations for Local Short-Term Firm Point-To-Point Service will be conditional based upon the length of the requested transaction. However, Pre-Confirmed Requests for Local Short-Term Point-to-Point Service will receive priority over earlier-submitted requests that are not preconfirmed and that have equal or shorter duration. Among requests with the same duration and, as relevant, pre-confirmation status (pre-confirmed or not pre-confirmed), priority will be given to a Transmission Customer's request that offers the highest price, followed by the date and time of the request. If the Local Network becomes oversubscribed, requests for service may preempt competing reservations up to the following conditional reservation deadlines: one day before the commencement of daily service, one week before the commencement of weekly service, and one month before the commencement of monthly service. Before the conditional reservation deadline, if available transfer capability is insufficient to satisfy all requests and reservations, a Transmission Customer with a reservation for shorter term service or equal duration service and lower price has the right of first refusal to match any longer term request or equal duration service with a higher price before losing its reservation priority. A longer term competing request for Local Short-Term Firm Point-To-Point Service will be granted if the Transmission Customer with the right of first refusal does not agree to match the competing request within 24 hours (or earlier if necessary to comply with the scheduling deadlines provided in Section I.1.h of this Schedule 21) from being notified by the PTO of a longer-term competing request for Local Short-Term Firm Point-To-Point Service. When a longer duration request preempts multiple shorter duration reservations, the shorter duration requests shall have simultaneous opportunities to

exercise the right of first refusal. Duration, price and time of response will be used to determine the order by which the multiple shorter duration reservations will be able to exercise the right of first refusal. After the conditional reservation deadline, service will commence pursuant to the terms of this Schedule 21. Firm Local Point-To-Point Service will always have a reservation priority over Non-Firm Local Point-To-Point Service under the Tariff. All Local Long-Term Firm Point-To-Point Service will have equal reservation priority with Native Load Customers and Network Customers. Reservation priorities for existing firm service customers are provided in the Local Service Schedules of this Schedule 21.

c) Use of Firm Local Point-to-Point Service by the PTO: The PTO will be subject to the rates, terms and conditions of this Schedule 21 when making Third-Party Sales under agreements executed on or after the effective date of the Tariff. The PTO will maintain separate accounting for any use of the Local Point-To-Point Service to make Third-Party Sales.

d) Service Agreements: After consultation with the PTO, the ISO shall forward a standard form of Local Service Agreement (Attachment A to this Schedule 21) to an Eligible Customer after an Eligible Customer submits a Completed Application for Local Point-To-Point Service to the ISO. Local Service Agreements executed by the Eligible Customer that contain the information required under this Schedule 21 shall also be executed by the PTO and returned to the ISO for execution and filing and/or reporting by the ISO with the Commission in compliance with applicable Commission regulations. An Eligible Customer that uses Local Point-to-Point Service at a Point of Receipt or Point of Delivery that it has not reserved and that has not executed a Local Service Agreement will be deemed, for purposes of assessing any appropriate charges and penalties, to have executed the appropriate Local Service Agreement.

e) Transmission Customer Obligations for Facility Additions Costs: In cases where the PTO, in consultation with the ISO, determines that the Local Network is not capable of providing Firm Local Point-To-Point Service without (1) degrading or impairing the reliability of service to Native Load Customers, Network Customers and other Transmission Customers taking Firm Local Point-To-Point Service, or (2) interfering with the PTO's ability to meet prior firm contractual commitments to others, the PTO will be obligated to expand or upgrade its Local Network pursuant to the terms of Section I.3.d of this Schedule 21. The Transmission Customer must agree to compensate the PTO for any necessary transmission facility additions pursuant to the terms of Section I.14 of this Schedule 21. Any Local Network Upgrade or Direct Assignment Facilities costs to be charged to the Transmission Customer on an incremental basis under the Tariff will be specified in the Local Service Agreement prior to initiating service.

f) Curtailment of Firm Local Point-To-Point Service: In the event that a Curtailment on the PTO's Local Network, or a portion thereof, is required to maintain reliable operation of such system, Curtailments will be made on a non-discriminatory basis to the transaction(s) that effectively relieve the constraint. If multiple transactions require Curtailment, to the extent practicable and consistent with Good Utility Practice, the PTO will curtail service to Network Customers and Transmission Customers taking Firm Local Point-To-Point Service on a basis comparable to the curtailment of service to the PTO's Native Load Customers. All Curtailments will be made on a non-discriminatory basis, however, Non-Firm Local Point-To-Point Service shall be subordinate to Firm Local Point-To-Point Service and Local Network Service. When the PTO determines that an electrical emergency exists on the Non-PTF and the PTO implements emergency procedures to Curtail Firm Local Service, the Transmission Customer shall make the required reductions upon request of the PTO. The PTO reserves the right to Curtail, in whole or in part, any Local Service when, in the PTO's sole discretion, an emergency or other unforeseen condition impairs or degrades the reliability of its Local Network. The PTO will notify all affected Transmission Customers in a timely manner of any scheduled Curtailments. Penalties for failure to Curtail shall be assessed pursuant to the applicable Local Service Schedule.

## g) Classification of Firm Local Point-To-Point Service:

(i) The Transmission Customer taking Firm Local Point-To-Point Service may (1) change its Receipt and Delivery Points to obtain service on a non-firm basis consistent with the terms of Section I.10.a of this Schedule 21 or (2) request a modification of the Points of Receipt or Delivery on a firm basis pursuant to the terms of Section I.10.b of this Schedule 21.

(ii) The Transmission Customer may purchase transmission service to make sales of capacity and energy from multiple generating units that are on the PTO's Local Network. For such a purchase of transmission service, the resources will be designated as multiple Points of Receipt, unless the multiple generating units are at the same generating plant in which case the units would be treated as a single Point of Receipt.

(iii) The PTO shall provide firm deliveries of capacity and energy from the Point(s) of Receipt to the Point(s) of Delivery. For Long-Term Firm Point-To-Point Service, each Point of Receipt at which firm transfer capability is reserved by the Transmission Customer shall be set forth in the Local Service Agreement along with a corresponding capacity reservation associated

with each Point of Receipt. For Short-Term Firm Point-To-Point Service, Points of Receipt and corresponding capacity reservations shall be as mutually agreed upon by the Parties. For Long-Term Firm Point-To-Point Service, each Point of Delivery at which firm transfer capability is reserved by the Transmission Customer shall be set forth in the Service Agreement along with a corresponding capacity reservation associated with each Point of Delivery. For Short-Term Firm Point-To-Point Service, Points of Delivery and corresponding capacity reservations shall be as mutually agreed upon by the Parties. The greater of either (1) the sum of the capacity reservations at the Point(s) of Receipt, or (2) the sum of the capacity reservations at the Point(s) of Delivery shall be the Transmission Customer's Reserved Capacity. The Transmission Customer will be billed for its Reserved Capacity under the terms of the applicable Local Service Schedule. The Transmission Customer may not exceed its firm capacity reserved at each Point of Receipt and each Point of Delivery except as otherwise specified in the applicable Local Service Schedule. The Local Service Schedule shall specify the rate treatment and all related terms and conditions applicable in the event that a Transmission Customer (including Third-Party Sales by the PTO) exceeds its firm reserved capacity at any Point of Receipt or Point of Delivery or uses Local Point-to-Point Service at a Point of Receipt or Point of Delivery that it has not reserved.

h) Scheduling of Firm Local Point-To-Point Service: Schedules for the Transmission Customer's Firm Local Point-To-Point Service must be submitted to the PTO no later than 10:00 a.m. of the day prior to commencement of such service. Schedules submitted after 10:00 a.m. will be accommodated, if practicable. Hour-to-hour schedules of any capacity and energy that is to be delivered must be stated in increments of 10 kW per hour. Transmission Customers within the PTO's service area with multiple requests for Transmission Service at a Point of Receipt, each of which is under 10 kW per hour, may consolidate their service requests at a common point of receipt into units of 10 kW per hour for scheduling and billing purposes. Scheduling changes will be permitted up to twenty (20) minutes before the start of the next clock hour provided that the Delivering Party and Receiving Party also agree to the schedule modification. The PTO will furnish hour-to-hour schedules equal to those furnished by the Receiving Party (unless reduced for losses) and shall deliver the capacity and energy provided by such schedules. Should the Transmission Customer, Delivering Party or Receiving Party revise or terminate any schedule, such party shall immediately notify the PTO, and the PTO shall have the right to adjust accordingly the schedule for capacity and energy to be received and to be delivered.

2) Nature of Non-Firm Local Point-To-Point Service

a) Term: Non-Firm Local Point-To-Point Service will be available for periods ranging from one (1) hour to one (1) month. However, a purchaser of Non-Firm Local Point-To-Point Service will be entitled to reserve a sequential term of service (such as a sequential monthly term without having to wait for the initial term to expire before requesting another monthly term) so that the total time period for which the reservation applies is greater than one month, subject to the requirements of Section I.6.c of this Schedule 21.

b) Reservation Priority: Non-Firm Local Point-To-Point Service shall be available from transfer capability in excess of that needed for reliable service to Native Load Customers, Network Customers, Excepted Transactions and other Transmission Customers taking Local Long-Term and Local Short-Term Firm Point-To-Point Service. Individual Local Service Schedules may contain other applicable services. A higher priority will be assigned first to requests or reservations with a longer duration of service and second to Pre-Confirmed Requests. In the event the Local Network is constrained, competing requests of the same pre-confirmation status and equal duration will be prioritized based on the highest price offered by the Transmission Customer for the Transmission Service, or in the event the price for all Transmission Customers is the same, will be prioritized on a first-come, first-served basis, i.e., in the chronological sequence in which each customer has requested service. Transmission Customers that have already reserved shorter term service have the right of first refusal to match any longer term request before being preempted. A longer term competing request for Non-Firm Local Point-To-Point Service will be granted if the Transmission Customer with the right of first refusal does not agree to match the competing request: (a) immediately for hourly Non-Firm Local Point-To-Point Service after notification by the PTO; and, (b) within 24 hours (or earlier if necessary to comply with the scheduling deadlines provided in Section I.2.f of this Schedule 21) for Non-Firm Local Point-To-Point Service other than hourly transactions after notification by the PTO. Non-Firm Local Point-To-Point Service over secondary Point(s) of Receipt and Point(s) of Delivery will have the lowest reservation priority under the OATT.

c) Use of Non-Firm Local Point-To-Point Service by the PTO: The PTO will be subject to the rates, terms and conditions of this Schedule 21 when making Third-Party Sales under (i) agreements executed on or after the effective date of the Tariff. The PTO will maintain separate accounting for any use of Non-Firm Local Point-To-Point Service to make Third-Party Sales.

d) Service Agreements: After consultation with the PTO, the ISO shall forward a standard form of Local Service Agreement (Attachment A to this Schedule 21) to an Eligible Customer after an Eligible Customer submits a Completed Application for Local Point-To-Point Service to the ISO. Local Service

Agreements executed by the Eligible Customer that contain the information required under this Schedule 21 shall also be executed by the PTO and returned to the ISO for execution and filing and/or reporting by the ISO with the Commission in compliance with applicable Commission regulations. An Eligible Customer that uses Local Point-to-Point Service at a Point of Receipt or Point of Delivery that it has not reserved and that has not executed a Local Service Agreement will be deemed, for purposes of assessing any appropriate charges and penalties, to have executed the appropriate Local Service Agreement.

e) Classification of Non-Firm Local Point-To-Point Service: The PTO and the ISO undertake no obligation under the Tariff to plan the Local Network in order to have sufficient capacity for Non-Firm Local Point-To-Point Service. Parties requesting Non-Firm Local Point-To-Point Service for the transmission of firm power do so with the full realization that such service is subject to availability and to Curtailment or Interruption under the terms of the Tariff. The Local Service Schedules shall specify the rate treatment and all related terms and conditions applicable in the event that a Transmission Customer (including Third-Party Sales by the PTO) exceeds its non-firm capacity reservation. Non-Firm Local Point-To-Point Service shall include transmission of energy on an hourly basis and transmission of scheduled short-term capacity and energy on a daily, weekly or monthly basis, but not to exceed one month's reservation for any one Application.

f) Scheduling of Non-Firm Local Point-To-Point Service: Schedules for Non-Firm Local Point-To-Point Service must be submitted to the PTO no later than 2:00 p.m. of the day prior to commencement of such service. Schedules submitted after these times will be accommodated, if practicable. Hour-to-hour schedules of energy that is to be delivered must be stated in increments of 10 kW per hour. Transmission Customers within the PTO's service area with multiple requests for Transmission Service at a Point of Receipt, each of which is under 10 kW per hour, may consolidate their schedules at a common Point of Receipt into units of 10 kW per hour. Scheduling changes will be permitted up to twenty (20) minutes before the start of the next clock hour provided that the Delivering Party and Receiving Party also agree to the schedule modification. The PTO will furnish hour-to-hour schedules equal to those furnished by the Receiving Party (unless reduced for losses) and shall deliver the capacity and energy provided by such schedules. Should the Transmission Customer, Delivering Party or Receiving Party revise or terminate any schedule, such party shall immediately notify the PTO and the PTO shall have the right to adjust accordingly the schedule for capacity and energy to be received and to be delivered.

**g**) **Curtailment or Interruption of Service**: The PTO reserves the right to Curtail, in whole or in part, Non-Firm Local Point-To-Point Service provided under the Tariff for reliability reasons when, an

emergency or other unforeseen condition threatens to impair or degrade the reliability of the Local Network. The PTO reserves the right to Interrupt, in whole or in part, Non-Firm Local Point-To-Point Service provided under the Tariff for economic reasons in order to accommodate (1) a request for Firm Local Transmission Service, (2) a request for Non-Firm Local Point-To-Point Service of greater duration, (3) a request for Non-Firm Local Point-To-Point Service of equal duration with a higher price, or (4) transmission service for Network Customers from non-designated resources. The PTO also will discontinue or reduce service to the Transmission Customer to the extent that deliveries for transmission are discontinued or reduced at the Point(s) of Receipt. Where required, Curtailments or Interruptions will be made on a non-discriminatory basis to the transaction(s) that effectively relieve the constraint, however, Non-Firm Local Point-To-Point Service shall be subordinate to Firm Local Transmission Service. If multiple transactions require Curtailment or Interruption, to the extent practicable and consistent with Good Utility Practice, Curtailments or Interruptions will be made to transactions of the shortest term (e.g., hourly non-firm transactions will be Curtailed or Interrupted before daily non-firm transactions and daily non-firm transactions will be Curtailed or Interrupted before weekly non-firm transactions). Transmission service for Network Customers from resources other than designated Network Resources will have a higher priority than any Non-Firm Local Point-To-Point Service under the Tariff. Non-Firm Local Point-To-Point Service over secondary Point(s) of Receipt and Point(s) of Delivery will have a lower priority than any Non-Firm Local Point-To-Point Service under the Tariff. The PTO will provide advance notice of Curtailment or Interruption where such notice can be provided consistent with Good Utility Practice and in accordance with the applicable Local Service Schedule. Penalties for failure to Curtail or Interrupt shall be assessed pursuant to the applicable Local Service Schedule.

## 3) Service Availability

a) General Conditions: The PTO will provide Firm Local and Non-Firm Local Point-To-Point Service to any Transmission Customer that has met the requirements of Section I.4 of this Schedule 21.

**b) Determination of Available Transfer Capability**: The PTO shall determine available transfer capability in accordance with its respective Attachment setting forth its Methodology to Assess Available Transfer Capability.

c) Initiating Service in the Absence of an Executed Service Agreement: If the PTO and the Transmission Customer requesting Firm Local or Non-Firm Local Point-To-Point Service cannot agree

on all of the terms and conditions of the Local Service Agreement, the ISO shall file with the Commission, within thirty (30) days after the date the Transmission Customer provides written notification to both the PTO and the ISO directing the ISO to file, an unexecuted Local Service Agreement containing terms and conditions deemed by the PTO (in consultation with the ISO) to be appropriate for such requested service. The PTO shall commence providing Transmission Service subject to the Transmission Customer agreeing to (i) compensate the PTO at whatever rate the Commission ultimately determines to be just and reasonable, and (ii) comply with the terms and conditions of the Tariff including posting appropriate security deposits in accordance with the terms of Section I.5.c of this Schedule 21.

d) Obligation to Provide Transmission Service that Requires Expansion or Modification of the Local Network: If the PTO, in consultation with the ISO, determines that a Completed Application for Firm Local Point-To-Point Service cannot be accommodated because of insufficient capability on the Local Network, the PTO will use due diligence to expand or modify its Local Network to provide the requested Firm Local Point-To-Point Service, consistent with its planning obligations in Attachment K, provided the Transmission Customer agrees to compensate the PTO for such costs. The PTO, in consultation with the ISO, will conform to Good Utility Practice and its planning obligations in Attachment K, in determining the need for new facilities and in the design and construction of such facilities. The obligation of the PTO to expand or modify its Local Network obligation to provide the requested Firm Local Point-To-Point Service applies only to those facilities that the PTO has the right to expand or modify.

e) **Deferral of Service**: The PTO may defer providing service until it completes construction of new transmission facilities or upgrades needed to provide Firm Local Point-To-Point Service whenever the PTO determines that providing the requested service would, without such new facilities or upgrades, impair or degrade reliability to any existing firm services.

**f**) **Other Transmission Service Schedules**: Eligible Customers receiving transmission service under other agreements on file with the Commission may continue to receive transmission service under those agreements until such time as those agreements may be modified by the Commission.

g) **Real Power Losses**: "Real Power Losses" those losses associated with transmission service as determined in accordance with Section 15.3, Section 31.6 and Schedule 21 of the OATT. Neither the ISO

nor the PTOs are obligated to provide Real Power Losses. Non-PTF Real Power Losses shall be calculated and charged for in accordance with the applicable Schedule 21 Local Service Schedule.

h) **Load Shedding**: Load Shedding shall occur in accordance with the applicable Local Service Schedule to the extent provided for in such Local Service Schedule.

#### 4) Transmission Customer Responsibilities

a) **Conditions Required of Transmission Customers**: Firm Local and Non-Firm Local Point-To-Point Service shall be provided only if the following conditions are satisfied by the Transmission Customer:

(i) The Transmission Customer has pending a Completed Application for service;

(ii) The Transmission Customer meets the creditworthiness procedures in Attachment L to the applicable PTO's Local Service Schedule;

(iii) The Transmission Customer will have arrangements in place for any other transmission service necessary to effect the delivery from the generating source to the PTO prior to the time service commences;

 (iv) The Transmission Customer agrees to pay for any facilities constructed and chargeable to such Transmission Customer, whether or not the Transmission Customer takes service for the full term of its reservation;

(v) The Transmission Customer provides the information required by the PTO's planning process established in Attachment K; and

(vi) The Transmission Customer has executed a Local Service Agreement or has requested the filing of an unexecuted Local Service Agreement pursuant to Section I.3.c of this Schedule 21.

b) Transmission Customer Responsibility for Third-Party Arrangements: Any scheduling arrangements that may be required by other electric systems shall be the responsibility of the Eligible Customer requesting service. The Transmission Customer shall provide, unless waived by the ISO and

the PTO, notification to the ISO and the PTO identifying such systems and authorizing them to schedule the capacity and energy to be transmitted pursuant to this Schedule 21 on behalf of the Receiving Party at the Point of Delivery or the Delivering Party at the Point of Receipt. However, the ISO and the PTO will undertake reasonable efforts to assist the Transmission Customer in making such arrangements, including without limitation, providing any information or data required by such other electric system pursuant to Good Utility Practice.

## 5) Procedures for Arranging Firm Local Point-To-Point Service

#### a) Pre-RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, or make upgrades (i.e., increase MWs served) within the terms of its existing Firm Local Point-to-Point Service Agreement that is in effect prior to February 1, 2005 ("Pre-RTO Local Service Agreement"), shall not be required to complete an Application or execute a Local Service Agreement under this Schedule 21, however, modifications to the existing Firm Local Point-to-Point Service Agreement may be required. Instead, the Transmission Customer shall contact the associated PTO to discuss and, if appropriate, modify its existing Firm Local Point-to-Point Service Agreement.

(ii) A Transmission Customer who wishes to request an alternate Firm Point of Receipt or Point of Delivery or make upgrades (i.e., increase MWs served) beyond the terms of its existing Firm Local Point-to-Point Service Agreement, shall contact the PTO to make arrangements to terminate the Transmission Customer's existing Local Service Agreement and shall complete (and submit to the ISO) an Application for Local Service and then execute a Local Service Agreement under this Schedule 21.

#### b) RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, or make upgrades (i.e., increase MWs served) within the terms of the existing Firm Local Point-to-Point Service Agreement under this Schedule 21, shall not be required to execute a Local Service Agreement under this Schedule 21, however, modifications to the existing Firm Local Point-to-Point Service Agreement under this Schedule 21 may be required. Such modifications to an existing Local Service Agreement typically do not require an additional local or regional System Impact Study to be completed. The Transmission Customer shall complete (and submit to the ISO) an application for Local Transmission Service that reflects the requested modifications to the Local Service Agreement to facilitate revision of its existing Schedule 21 Local Service Agreement.

(ii) Transmission Customers who wish to request an alternate Firm Point of Receipt or Point of Delivery or make upgrades (i.e., increase MWs served) beyond the terms of the existing Firm Local Point-to-Point Service Agreement under this Schedule 21, shall contact the ISO to discuss and, if appropriate, terminate the Transmission Customer's existing Local Service Agreement under this Schedule 21 and shall complete (and submit to the ISO) an Application for Local Service and then execute a new Local Service Agreement under this Schedule 21.

c) Application: A request for Firm Local Point-To-Point Service for periods of one year or longer must be made in a completed Application submitted to the ISO at least sixty (60) days in advance of the calendar month in which service is to commence. The PTO will consider requests for such firm service on shorter notice when feasible. Requests for firm service for periods of less than one year shall be subject to expedited procedures that shall be negotiated between the PTO and the Eligible Customer within the time constraints provided in the applicable Local Service Schedule. A Completed Application may be submitted by transmitting the required information to the ISO by telefax. This method will provide a time-stamped record for establishing the priority of the Application.

d) **Completed Application**: A Completed Application shall provide all of the information included in 18 C.F.R. § 2.20 including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

(ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under the Tariff;

(iii) The location of the Point(s) of Receipt and Point(s) of Delivery and the identities of the Delivering Parties and the Receiving Parties;

(iv) The location of the generating facility(ies) supplying the capacity and energy and the location of the load ultimately served by the capacity and energy transmitted. The ISO and the PTO will treat this information as confidential except to the extent that disclosure of this information is required by the Tariff, by regulatory or judicial order, for reliability purposes pursuant to Good Utility Practice or pursuant to the Information Policy;

(v) A description of the supply characteristics of the capacity and energy to be delivered;

(vi) An estimate of the capacity and energy expected to be delivered to the Receiving Party;

(vii) The Service Commencement Date and the term of the requested Transmission Service;

(viii) The transmission capacity requested for each Point of Receipt and each Point of Delivery on the PTO's Local Network; customers may combine their requests for service in order to satisfy the minimum transmission capacity requirement;

(ix) A statement indicating that if the Transmission Customer submits a Pre-Confirmed Request, then the Transmission Customer will take and pay for the requested Local Service upon acceptance on OASIS by the PTO that can provide the requested Local Service; and

(x) Any additional information required by the PTO's planning process established in Attachment K.

The ISO and the PTO shall treat this information consistent with the standards of conduct contained in Part 37 of the Commission's regulations.

e) **Deposit**: Except as is otherwise provided in the Local Service Schedule, a Completed Application for Firm Local Point-To-Point Service also shall include a deposit of either one month's charge for Reserved Capacity or the full charge for Reserved Capacity for service requests of less than one month. If the Application is rejected because it does not meet the conditions for service as set forth herein, in the Local Service Schedule or, in the case of requests for service arising in connection with losing bidders, in a Request For Proposals (RFP), said deposit shall be returned with interest less any reasonable costs incurred by the PTO in connection with the review of the losing bidder's Application. The deposit also will be returned with interest less any reasonable costs incurred by the PTO is unable to complete new facilities needed to provide the service. If an Application is withdrawn or the Eligible Customer decides not to enter into a Local Service Agreement for Firm Local Point-To-Point Service, the deposit shall be refunded in full, with interest, less reasonable costs incurred by the PTO to the extent such costs have not already been recovered by the PTO from the Eligible Customer. The PTO will provide to the Eligible Customer a complete accounting of all costs deducted from the refunded deposit, which the Eligible Customer may contest if there is a dispute concerning the deducted costs. Deposits associated with construction of new facilities are subject to the provisions of Section I.5.c of this Schedule 21. If a Local Service Agreement for Firm Local Point-To-Point Service is executed, the deposit, with interest, will be returned to the Transmission Customer upon expiration or termination of the Local Service Agreement. Applicable interest shall be computed in accordance with the Commission's regulations at 18 C.F.R. § 35.19a(a)(2)(iii), and shall be calculated from the day the deposit check is credited to the PTO's account.

f) Notice of Deficient Application: If an Application fails to meet the requirements of the Tariff, the PTO shall notify the ISO within ten (10) days of the Application's receipt of the reasons for such failure, and the ISO shall, in turn, so notify the entity requesting service within five (5) days of the receipt of notice from the PTO of the reasons for such failure. The PTO will attempt to remedy minor deficiencies in the Application through informal communications with the Eligible Customer. If such efforts are unsuccessful, the ISO shall return the Application. The PTO shall return any deposit, with interest, to the Eligible Customer. Upon receipt of a new or revised Application that fully complies with the requirements of this Schedule 21, the Eligible Customer shall be assigned a new priority consistent with the date of the new or revised Application.

**g) Response to a Completed Application**: Following receipt of a Completed Application for Firm Local Point-To-Point Service, the PTO shall make a determination of available transfer capability as required in Section I.3.b of this Schedule 21. Within twenty-five (25) days after the date of receipt of a Completed Application, the PTO shall notify the ISO either (i) if it will be able to provide service without performing a System Impact Study or (ii) if such a study is needed to evaluate the impact of the Application. The ISO shall so notify the Eligible Customer within five (5) days of the ISO's receipt of such notice from the PTO. Responses by the PTO and the ISO must be made as soon as practicable to all Completed Applications and the timing of such responses must be made on a non-discriminatory basis.

**h) Execution of Service Agreement**: Whenever the PTO, in consultation with the ISO, determines that a System Impact Study is not required and that the service can be provided, it shall notify the Eligible

Customer as soon as practicable but no later than thirty (30) days after receipt of the Completed Application. Where a System Impact Study is required, the provisions of Section I.7 of this Schedule 21 will govern the execution of a Local Service Agreement. Failure of an Eligible Customer to execute and return the Local Service Agreement or request the filing of an unexecuted service agreement pursuant to Section I.3.c of this Schedule 21 within fifteen (15) days after the Local Service Agreement is tendered will be deemed a withdrawal and termination of the Application and any deposit submitted shall be refunded with interest. Nothing herein limits the right of an Eligible Customer to file another Application after such withdrawal and termination.

i) Extensions for Commencement of Service: The Transmission Customer can obtain, subject to availability, up to five (5) one-year extensions for the commencement of service. The Transmission Customer may postpone service by paying to the PTO a non-refundable annual reservation fee equal to one-month's charge for Firm Local Point-To-Point Service for each year or fraction thereof within 15 days of notifying the PTO it intends to extend the commencement of service. If during any extension for the commencement of service an Eligible Customer submits a Completed Application for Firm Local Point-To-Point Service, and such request can be satisfied only by releasing all or part of the Transmission Customer's Reserved Capacity, the original Reserved Capacity will be released unless the following condition is satisfied. Within thirty (30) days, the original Transmission Customer agrees to pay the rate for its Reserved Capacity concurrent with the new Service Commencement Date. In the event the Transmission Customer elects to release the Reserved Capacity, the reservation fees or portions thereof previously paid will be forfeited.

## 6) Procedures for Arranging Non-Firm Local Point-To-Point Service

#### a) Pre-RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Non-Firm Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of their existing Non-Firm Local Point-to-Point Service Agreement that is in effect prior to February 1, 2005 ("Pre-RTO Local Service Agreement"), shall not be required to complete an Application or execute a Local Service Agreement under this Schedule 21, however, modifications to the existing Non-Firm Local Point-to-Point Service Agreement may be required. The Transmission Customer shall contact the associated PTO to discuss and, if appropriate, modify the existing Non-Firm Local Point-to-Point Service Agreement.

(ii) A Transmission Customer who wishes to make upgrades (i.e., increase MWs served) beyond the terms of its existing Non-Firm Local Point-to-Point Service Agreement that is in effect prior February 1, 2005 ("Pre-RTO Local Service Agreement"), shall contact the PTO to make arrangements to terminate the Transmission Customer's existing Local Service Agreement and shall complete (and submit to the ISO) an Application for Local Service and then execute a Local Service Agreement under this Schedule 21.

#### b) RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Non-Firm Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of the existing Non-Firm Local Point-to-Point Service Agreement under this Schedule 21, shall not be required to execute a new Local Service Agreement under this Schedule 21, however, modifications to the existing Non-Firm Local Point-to-Point Service Agreement under this Schedule 21 may be required.

Such modifications to an existing Local Service Agreement typically do not require an additional local or regional System Impact Study to be completed. The Transmission Customer shall complete (and submit to the ISO) an application for Local Transmission Service that reflects the requested modifications to the Local Service Agreement to facilitate revision of its existing Non-Firm Local Point-to-Point Service Agreement under this Schedule 21.

(ii) A Transmission Customer who wishes to request an upgrade (i.e., increase MWs served) beyond the terms of the existing Non-Firm Local Point-to-Point Service Agreement under this Schedule 21, shall contact the ISO to discuss and, if appropriate, terminate the Transmission Customer's existing Local Service Agreement under this Schedule 21 and shall complete (and submit to the ISO) a new Application for Local Service and then execute a new Local Service Agreement under this Schedule 21.

c) Application: Eligible Customers seeking Non-Firm Local Point-To-Point Service must submit a Completed Application to the ISO. A Completed Application may be submitted by transmitting the required information to the ISO by telefax. This method will provide a time-stamped record for establishing the service priority of the Application.

d) **Completed Application**: A Completed Application shall provide all of the information included in 18 C.F.R. § 2.20 including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the entity requesting service;

(ii) A statement that the entity requesting service is, or will be upon commencement of service, an Eligible Customer under the Tariff;

(iii) The Point(s) of Receipt and the Point(s) of Delivery;

(iv) The maximum amount of capacity requested at each Point of Receipt and Point of Delivery; and

(v) The proposed dates and hours for initiating and terminating transmission service hereunder.

In addition to the information specified above, when required to properly evaluate system conditions, the ISO and the PTO also may ask the Transmission Customer to provide the following:

(vi) The electrical location of the initial source of the power to be transmitted pursuant to the Transmission Customer's request for service;

(vii) The electrical location of the ultimate load; and

(viii) A statement indicating that if the Transmission Customer submits a Pre-Confirmed Request, then the Transmission Customer will take and pay for the requested Local Point-to-Point Service upon acceptance on OASIS by the PTO that can provide the requested Local Service. The ISO and the PTO will treat this information in (vi) and (vii) as confidential at the request of the Transmission Customer except to the extent that disclosure of this information is required by the Tariff, by regulatory or judicial order, for reliability purposes pursuant to Good Utility Practice, or pursuant to the ISO New England Information Policy. The ISO and the PTO shall treat this information consistent with the standards of conduct contained in Part 37 of the Commission's regulations.

e) Reservation of Non-Firm Local Point-To-Point Service: Requests for monthly service shall be submitted no earlier than sixty (60) days before service is to commence; requests for weekly service shall be submitted no earlier than fourteen (14) days before service is to commence, requests for daily service shall be submitted no earlier than two (2) days before service is to commence, and requests for hourly service shall be submitted no earlier than noon the day before service is to commence. Requests for service received later than 2:00 p.m. prior to the day service is scheduled to commence will be accommodated if practicable.

**f**) **Determination of Available Transfer Capability**: The PTO shall determine available transfer capability in accordance with its respective Attachment setting forth its Methodology to Assess Available Transfer Capability.

7) Additional Study Procedures For Firm Local Point-To-Point Service Requests

a) Notice of Need for System Impact Study: After receiving a request for Firm Local Point-To-Point Service, a determination shall be made on a non-discriminatory basis as to whether a System Impact Study is needed. The ISO shall review the request to determine whether the provision of the requested service would have an impact on facilities other than Non-PTF, and if so, whether a System Impact Study is necessary to accommodate the requested service. If so, the ISO shall so inform the Eligible Customer as soon as practicable and will (in consultation with the PTO) perform a System Impact Study, as necessary, with respect to the request. A description of the ISO's methodology for completing a System Impact Study is provided in OATT Attachment D. If the ISO determines that the service would not have an impact on facilities other than Non-PTF, the PTO shall determine whether a System Impact Study is necessary to accommodate the requested service and shall so inform the Eligible Customer as soon as practicable and will (in consultation with the ISO) perform a System Impact Study is necessary to accommodate the requested service and shall so inform the Eligible Customer as soon as practicable and will (in consultation with the ISO) perform a System Impact Study, as necessary, with respect to the application. In such cases, the ISO or the PTO, as applicable, shall within thirty (30) days of receipt of a Completed Application, tender a System Impact Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the ISO or the PTO, as applicable, for performing the required System Impact Study. For a service request to remain a Completed Application, the Eligible Customer shall execute the System Impact Study Agreement and return it to the ISO or the PTO, as applicable, within fifteen (15) days. If the Eligible Customer elects not to execute the System Impact Study Agreement, its Application shall be deemed withdrawn and its deposit, pursuant to Section I.5.c of this Schedule 21, shall be returned with interest. A description of the PTO's methodology for completing a System Impact Study is provided in its Local Service Schedules.

#### b) System Impact Study Agreement and Cost Reimbursement:

(i) The System Impact Study Agreement will clearly specify an estimate of the cost and time for completion of the System Impact Study. The charge shall not exceed the actual cost of the study. The System Impact Study shall rely on existing transmission planning studies to the extent reasonably practicable. The Eligible Customer will not be assessed a charge for such existing studies; however, the Eligible Customer will be responsible for charges associated with any modifications to existing planning studies that are reasonably necessary to evaluate the impact of the Eligible Customer's request for service on the Local Network.

(ii) If in response to multiple Eligible Customers requesting service in relation to the same competitive solicitation, a single System Impact Study is sufficient to accommodate the requests for service, the costs of that study shall be pro-rated among the Eligible Customers.

(iii) For System Impact Studies that the PTO conducts on its own behalf, the PTO shall record the cost of the System Impact Studies pursuant to Section II.8.5 of the Tariff.

(iv) In response to multiple Eligible Customers within the same geographical or electrically interconnected area requesting that a System Impact Study for Local Service be clustered, the PTO will cluster such multiple requests if it can reasonably do so. The costs of that study shall be divided equally among the Eligible Customers, unless otherwise agreed to by the PTO and the Eligible Customers.

(v) Once a clustered study is initiated by the PTO, as evidenced by an executed System Impact Study Agreement, Eligible Customers opting out of a clustered study regarding Non-PTF facilities shall be liable for their share of the study costs as set forth in Section 7(b)(iv) above, unless otherwise agreed to by the parties to such System Impact Study Agreement. c) System Impact Study Procedures: Upon receipt of an executed System Impact Study Agreement, the ISO or the PTO, as applicable, will use due diligence to complete the required System Impact Study within a sixty (60) day period. The System Impact Study shall identify any system constraints identified with specificity by a transmission element or flowgate, and additional Direct Assignment Facilities or Local Network Upgrades required to provide the requested service. In the event that the ISO or the PTO, as applicable, is unable to complete the required System Impact Study within such time period, it shall so notify the Eligible Customer and provide an estimated completion date along with an explanation of the reasons why additional time is required to complete the required studies. A copy of the completed System Impact Study and related work papers shall be made available to the Eligible Customer as soon as the System Impact Study is complete. The PTO will use the same due diligence in completing the System Impact Study for an Eligible Customer as it uses when completing studies for itself. The ISO or the PTO, as applicable, shall notify the Eligible Customer immediately upon completion of the System Impact Study if the Local Network will be adequate to accommodate all or part of a request for service or that no costs are likely to be incurred for new transmission facilities or upgrades. In order for a request to remain a Completed Application, within fifteen (15) days of completion of the System Impact Study, the Eligible Customer must execute a Local Service Agreement or request the filing of an unexecuted Local Service Agreement pursuant to Section I.3.c of this Schedule 21 or the Application shall be deemed terminated and withdrawn.

d) Facilities Study Procedures: If a System Impact Study indicates that additions or upgrades to facilities other than Non-PTF are needed to supply the Eligible Customer's service request or to mitigate indirect impacts on the MTF facilities, the ISO, within thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the ISO for performing the required Facilities Study. If a System Impact Study indicates that additions or upgrades to Non-PTF facilities are needed to supply the Eligible Customer's service request or to mitigate indirect impacts on facilities other than Non-PTF, the PTO, within thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the PTO for performing the required Facilities Study. For clustered studies, the cost of such studies shall be divided equally among the Eligible Customers, unless otherwise agreed to by the PTO and the Eligible Customers. Once a clustered study is initiated by the PTO, as evidenced by an executed Facilities Study Agreement, Eligible Customers opting out of a clustered study regarding Non-PTF facilities shall be liable for their share of the study costs as set forth in this Section 7(d) above, unless otherwise agreed to

by the parties to such Facilities Study Agreement. For a service request to remain a Completed Application, the Eligible Customer shall execute the Facilities Study Agreement and return it within fifteen (15) days. If the Eligible Customer elects not to execute the Facilities Study Agreement, its Application shall be deemed withdrawn and its deposit, pursuant to Section I.5.c of this Schedule 21, shall be returned with interest. Upon receipt of an executed Facilities Study Agreement, the ISO or the PTO, as applicable, will use due diligence to complete the required Facilities Study within a sixty (60) day period. If the Facilities Study cannot be completed in the allotted time period, the Transmission Customer shall be notified and provided an estimate of the time needed to reach a final determination along with an explanation of the reasons that additional time is required to complete the study. When completed, the Facilities Study will include a good faith estimate of (i) the cost of Direct Assignment Facilities to be charged to the Transmission Customer, (ii) the Transmission Customer's appropriate share of the cost of any required Local Network Upgrades, and (iii) the time required to complete such construction and initiate the requested service. The Transmission Customer shall provide a letter of credit or other reasonable form of security acceptable to the PTO equivalent to the costs of new facilities or upgrades consistent with commercial practices as established by the Uniform Commercial Code. The Transmission Customer shall have thirty (30) days to execute a Local Service Agreement or request the filing of an unexecuted Local Service Agreement and provide the required letter of credit or other form of security or the request will no longer be a Completed Application and shall be deemed terminated and withdrawn.

e) Facilities Study Modifications: Any change in design arising from the inability to site or construct facilities as proposed will require development of a revised good faith estimate. New good faith estimates also will be required in the event of new statutory or regulatory requirements that are effective before the completion of construction or other circumstances beyond the control of the ISO and/or the PTO that significantly affect the final cost of new facilities or upgrades to be charged to the Transmission Customer.

f) Due Diligence in Completing New Facilities: The PTO shall use due diligence to add necessary facilities or upgrade its Local Network within a reasonable time. The PTO will not upgrade its existing or planned Local Network in order to provide the requested Firm Local Point-To-Point Service if doing so would impair system reliability or otherwise impair or degrade existing firm service.

**g) Partial Interim Service**: If the PTO determines that it will not have adequate transfer capability to satisfy the full amount of a Completed Application for Firm Local Point-To-Point Service, the PTO

nonetheless shall be obligated to offer and provide the portion of the requested Firm Local Point-To-Point Service that can be accommodated without addition of any facilities. However, the PTO shall not be obligated to provide the incremental amount of requested Firm Local Point-To-Point Service that requires the addition of facilities or upgrades to the Local Network until such facilities or upgrades have been placed in service.

h) Expedited Procedures for New Facilities: In lieu of the procedures set forth above, the Eligible Customer shall have the option to expedite the process by requesting the ISO (in consultation with the PTO) to tender at one time, together with the results of required studies, an "Expedited Local Service Agreement" pursuant to which the Eligible Customer would agree to compensate the PTO for all costs incurred. In order to exercise this option, the Eligible Customer shall request in writing an expedited Local Service Agreement covering all of the above-specified items within thirty (30) days of receiving the results of the System Impact Study identifying needed facility additions or upgrades or costs incurred in providing the requested service. While the PTO agrees to provide the Eligible Customer with its best estimate of the new facility costs and other charges that may be incurred, such estimate shall not be binding and the Eligible Customer must agree in writing to compensate the PTO for all costs incurred. The Eligible Customer shall execute and return such an Expedited Local Service Agreement within fifteen (15) days of its receipt or the Eligible Customer's request for service will cease to be a Completed Application and will be deemed terminated and withdrawn.

i) **Penalties for Failure to Meet Study Deadlines**: Sections I.7.c and I.7.d of this Schedule 21 require a Transmission Provider to use due diligence to meet 60-day study completion deadlines for System Impact Studies and Facilities Studies.

(i) The PTO is required to file a notice with the Commission in the event that more than twenty (20) percent of non-Affiliates' System Impact Studies and Facilities Studies completed by the PTO in any two consecutive calendar quarters are not completed within the 60-day study completion deadlines. Such notice must be filed within thirty (30) days of the end of the calendar quarter triggering the notice requirement.

(ii) For the purposes of calculating the percent of non-Affiliates' System Impact Studies and Facilities Studies processed outside of the 60-day study completion deadlines, the PTO shall consider all System Impact Studies and Facilities Studies that it completes for non-Affiliates during the calendar quarter. The percentage should be calculated by dividing the number of those studies which are completed on time by the total number of completed studies. The PTO may provide an explanation in its notification filing to the Commission if it believes there are extenuating circumstances that prevented it from meeting the 60-day study completion deadlines.

(iii) The PTO is subject to an operational penalty if it completes ten (10) percent or more of non-Affiliates' System Impact Studies and Facilities Studies outside of the 60-day study completion deadlines for each of the two calendar quarters immediately following the quarter that triggered its notification filing to the Commission. The operational penalty will be assessed for each calendar quarter for which an operational penalty applies, starting with the calendar quarter immediately following the quarter that triggered the PTO's notification filing to the Commission. The operational penalty will continue to be assessed each quarter until the PTO completes at least ninety (90) percent of all non-Affiliates' System Impact Studies and Facilities Studies within the 60-day deadline.

(iv) For penalties assessed in accordance with subsection (iii) above, the penalty amount for each System Impact Study or Facilities Study shall be equal to \$500 for each day the PTO takes to complete that study beyond the 60-day deadline.

**j**) **Claims or Disputes**: Any claim or dispute between the PTO and the Transmission Customer with respect to a System Impact Study or Facilities Study shall be governed by the provisions of Section I.6 of the Tariff.

# 8) Procedures if The PTO is Unable to Complete New Transmission Facilities for Firm Local Point-To-Point Service

a) **Delays in Construction of New Facilities**: If any event occurs that will materially affect the time for completion of new facilities, or the ability to complete them, the PTO shall promptly notify the Transmission Customer. In such circumstances, the PTO shall within, thirty (30) days of notifying the Transmission Customer of such delays, convene a technical meeting with the Transmission Customer to evaluate the alternatives available to the Transmission Customer. The PTO also shall make available to the Transmission Customer studies and work papers related to the delay, including all information that is in the possession of the PTO that is reasonably needed by the Transmission Customer to evaluate any alternatives.

b) Alternatives to the Original Facility Additions: When the review process of Section I.8.a of this Schedule 21 determines that one or more alternatives exist to the originally planned construction project, the PTO shall present such alternatives for consideration by the Transmission Customer. If, upon review of any alternatives, the Transmission Customer desires to maintain its Completed Application subject to construction of the alternative facilities, it may request that the ISO file a revised Local Service Agreement for Firm Local Point-To-Point Service. If the alternative approach solely involves Non-Firm Local Point-To-Point Service, the PTO shall so inform the ISO, and the ISO (in consultation with the PTO) shall thereafter promptly tender to the Transmission Customer a Local Service Agreement for Non-Firm Local Point-To-Point Service providing for the service. In the event the PTO concludes that no reasonable alternative exists and the Transmission Customer disagrees, the Transmission Customer may seek relief under the dispute resolution procedures of Section I.6 of the Tariff.

c) **Refund Obligation for Unfinished Facility Additions**: If the PTO and the Transmission Customer mutually agree that no other reasonable alternatives exist and the requested Firm Local Point-To-Point Service cannot be provided out of existing capability, the obligation to provide the requested service shall terminate and any deposit made by the Transmission Customer shall be returned with interest pursuant to Commission regulations 35.19a(a)(2)(iii). However, the Transmission Customer shall be responsible for all prudently incurred costs by the ISO and the PTO through the time construction was suspended, including costs for removal of unfinished facilities and any ongoing operating expenses of the unfinished facilities until they are removed.

# 9) Provisions Relating to Transmission Construction and Services on the Systems of Other Utilities

a) **Responsibility for Third-Party System Additions**: The PTO shall not be responsible for making arrangements for any necessary engineering, permitting, and construction of transmission or distribution facilities on the system(s) of any other entity or for obtaining any regulatory approval for such facilities. The PTO will undertake reasonable efforts to assist the Transmission Customer in obtaining such arrangements, including without limitation, providing any information or data required by such other electric system pursuant to Good Utility Practice.

**b) Coordination of Third-Party System Additions**: In circumstances where the need for transmission facilities or upgrades is identified, and if such upgrades further require the addition of transmission facilities on other systems, the PTO shall have the right to coordinate construction on its

own system with the construction required by others. The PTO, after consultation with the Transmission Customer and representatives of such other systems, may defer construction of its new transmission facilities, if the new transmission facilities on another system cannot be completed in a timely manner. The PTO shall notify the Transmission Customer in writing of the basis for any decision to defer construction and the specific problems which must be resolved before it will initiate or resume construction of new facilities. Within sixty (60) days of receiving written notification by the PTO of its intent to defer construction, the Transmission Customer may challenge the decision in accordance with Section I.6 of the Tariff.

#### 10) Changes in Service Specifications

a) Modifications On a Non-Firm Basis: The Transmission Customer taking Firm Local Point-To-Point Service from a PTO may request transmission service on a non-firm basis over Receipt and Delivery Points of the same PTO other than those specified in the Local Service Agreement ("Secondary Receipt and Delivery Points") in amounts not to exceed its firm capacity reservation, without incurring an additional Non-Firm Local Point-To-Point Service charge or executing a new Local Service Agreement, subject to the following conditions. A Transmission Customer may request a modification to its Non-Firm Local Point-to-Point Service by making such a request to the PTO and the ISO, which must be made pursuant to Sections I.6. (a) and (b), as appropriate.

(a) Service provided over Secondary Receipt and Delivery Points will be non-firm only, on an as-available basis and will not displace any firm or non-firm service reserved or scheduled by third-parties under the Tariff or by the PTO on behalf of its Native Load Customers.

(b) The sum of all Firm Local and Non-Firm Local Point-To-Point Service provided to the Transmission Customer at any time pursuant to this section shall not exceed the Reserved Capacity in the relevant Local Service Agreement under which such services are provided.

(c) The Transmission Customer shall retain its right to schedule Firm Local Point-To-Point Service at the Receipt and Delivery Points specified in the relevant Local Service Agreement in the amount of its original capacity reservation.

(d) Service over Secondary Receipt and Delivery Points on a non-firm basis shall not require the filing of an Application for Non-Firm Local Point-To-Point Service under the Tariff.

However, all other requirements of this Schedule 21 (except as to transmission rates) shall apply to transmission service on a non-firm basis over Secondary Receipt and Delivery Points.

b) Modification On a Firm Basis: Any request by a Transmission Customer to modify the Firm Local Point-to-Point Service it receives from a PTO to obtain service between different Receipt and Delivery Points on the Local Network of the same PTO on a firm basis shall be treated as a new request for service, except that such Transmission Customer shall not be obligated to pay any additional deposit if the capacity reservation does not exceed the amount reserved in the existing Local Service Agreement. While such new request is pending, the Transmission Customer shall retain its priority for service at the existing firm Receipt and Delivery Points specified in its Local Service Agreement. A Transmission Customer may request a modification to its Firm Local Point-to-Point Service by making such a request to the PTO and the ISO, which must be made pursuant to Sections I.5. (a) and (b), as appropriate.

#### 11) Sale or Assignment of Transmission Service

Procedures for Assignment or Transfer of Service: A Transmission Customer may sell, a) assign, or transfer all or a portion of its rights under its Local Service Agreement, but only to another Eligible Customer (the Assignee). The Transmission Customer that sells, assigns or transfers its rights under its Local Service Agreement is hereafter referred to as the "Reseller" as the term used throughout this Schedule 21. Compensation to Resellers shall be at rates established by agreement between the Reseller and the Assignee. The Assignee must execute a service agreement with the PTO governing reassignments of transmission service prior to the date on which the reassigned service commences. The PTO shall charge the Reseller, as appropriate, at the rate stated in the Reseller's Local Service Agreement with the PTO or the associated OASIS schedule and credit the Reseller with the price reflected in the Assignee's Service Agreement with the PTO or the associated OASIS schedule; provided that, such credit shall be reversed in the event of non-payment by the Assignee. If the Assignee does not request any change in the Point(s) of Receipt or the Point(s) of Delivery, or a change in any other term or condition set forth in the original Local Service Agreement, the Assignee will receive the same services as did the Reseller and the priority of service for the Assignee will be the same as that of the Reseller. The Assignee will be subject to all terms and conditions of the Tariff. If the Assignee requests a change in service, the reservation priority of service will be determined by the PTO pursuant to Section I.1.b of this Schedule 21. A Transmission Customer may request a modification to its Firm Local Point-to-Point Service by making such a request to the PTO and the ISO must be made pursuant to sections I.5. (a) and (b) and I.6. (a) and (b), as appropriate.

b) Limitations on Assignment or Transfer of Service: If the Assignee requests a change in the Point(s) of Receipt or Point(s) of Delivery, or a change in any other specifications set forth in the original Local Service Agreement, the PTO will consent to such change subject to the provisions of the Tariff, provided that the change will not impair the operation and reliability of the New England Transmission System or the PTO's distribution system, as applicable. The Assignee shall compensate the ISO and/or the PTO, as applicable, for performing any System Impact Study needed to accommodate the proposed change and any additional costs resulting from such change. The Reseller shall remain liable for the performance of all obligations under the Local Service Agreement, except as specifically agreed to by the PTO and Reseller through an amendment to the Local Service Agreement

c) Information on Assignment or Transfer of Service: In accordance with Section I.11 of this Schedule 21 and applicable provisions of the Local Service Schedules, all sales or assignments of capacity must be conducted through or otherwise posted on the PTO's OASIS on or before the date the reassigned Local Point-to-Point Service commences and are subject to Section I.11.a of this Schedule 21. Resellers may also use the OASIS to post transmission capacity available for resale.

#### 12) Metering and Power Factor Correction at Receipt and Delivery Points(s)

a) **Transmission Customer Obligations**: Unless otherwise provided in the applicable Local Service Schedule, the Transmission Customer shall be responsible for installing and maintaining compatible metering and communications equipment to accurately account for the capacity and energy being transmitted through Local Point-To-Point Service and to communicate the information to the PTO, Local Control Centers and the ISO. Such equipment shall remain the property of the Transmission Customer.

b) **PTO Access to Metering Data**: The PTO shall have access to metering data, which may reasonably be required to facilitate measurements and billing under the Local Service Agreement.

c) **Power Factor**: In accordance with Good Utility Practice and any applicable Local Service Schedule, the Transmission Customer is required to maintain a power factor within the same range as the PTO. The power factor requirements are specified in the Local Service Agreement where applicable.

13) Compensation for Local Point-To-Point Service:

Rates for Firm Local and Non-Firm Local Point-To-Point Service are set forth in the Local Service Schedules.

## 14) Compensation for New Facilities Costs:

Whenever a System Impact Study performed in connection with the provision of Firm Local Point-To-Point Service identifies the need for new facilities, the Transmission Customer shall be responsible for the costs of the new facilities to the extent consistent with Commission policy.

### II. LOCAL NETWORK SERVICE

#### Preamble

Eligible Customers seeking Local Network Service on a specific Local Network shall refer to the applicable Local Service Schedule to determine any PTO-specific rates, terms, and conditions applicable to such service. Except as otherwise provided in the Local Service Schedules, Local Network Service will be provided pursuant to the applicable rates, terms and conditions set forth below.

#### 1) Nature of Local Network Service

Local Network Service is provided to Network Customers to serve their loads. It includes transmission service for the delivery to a Network Customer of its energy and capacity from Network Resources and delivery to or by Network Customers of energy and capacity from New England Markets transactions.

## 2) Availability of Local Network Service

a) Eligibility to Receive Local Network Service: Transmission Customers taking Regional Network Service must also take Local Service.

b) **Compliance With State Law**: A Network Customer is not excused from any requirements of state law, or any order or regulation issued pursuant to state law, to arrange for Local Delivery Service with the PTO and distribution company providing such service and to pay all applicable charges associated with such service, including charges for stranded costs.

c) Scope of Service: Local Network Service allows Network Customers to efficiently and economically utilize their resources and Interchange Transactions to serve their Local and Regional

Network Load and any additional load that may be designated pursuant to the Tariff. The Network Customer taking Local Network Service must obtain or provide Ancillary Services.

d) **PTO Responsibilities**: The PTO in accordance with the TOA will plan, construct, operate and maintain its Local Network in accordance with Good Utility Practice and its planning obligations in Attachment K in order to provide the Network Customer with Local Network Service. Each PTO, on behalf of its Native Load Customers, shall be required to designate resources and loads in the same manner as any Network Customer. This information must be consistent with the information used by the PTO to calculate available transfer capability. The PTO in accordance with the TOA shall include the Network Customer's Local Network Load in Local Network planning and shall, consistent with Good Utility Practice and Attachment K, endeavor to construct and place into service sufficient transfer capability to deliver Network Resources to serve the Network Customer's Local and Regional Network Load on a basis comparable to the PTO's delivery of its own generating and purchased resources to its Native Load Customers.

e) Comparability of Service: Local Network Service will be provided to the Network Customer for the delivery of energy and/or capacity from its resources to serve its Local and Regional Network Loads on a basis that is comparable to the PTO's use of its Local Network to reliably serve Native Load Customers.

**f) Real Power Losses**: "Real Power Losses" those losses associated with transmission service as determined in accordance with Section 15.3, Section 31.6 and Schedule 21 of the OATT. The PTOs are not obligated to provide Real Power Losses. Non-PTF Real Power Losses shall be calculated and charged for in accordance with the applicable Schedule 21 Local Service Schedule.

g) Secondary Service: The Network Customer may use the Local Network to deliver energy to its Local Network Loads from resources that have not been designated as Network Resources. Such energy shall be transmitted, on an as available basis, at no additional charge. Secondary service shall not require the filing of an Application for Local Network Service under Section II of this Schedule 21. However, all other requirements of Section II of this Schedule 21 (except for transmission rates) shall apply to secondary service. Deliveries from resources other than Network Resources will have a higher priority than any Non Firm Local Point To Point Service.

h) Restrictions on Use of Service: The Network Customer shall not use Local Network Service for (i) sales of capacity and energy to non designated loads, or (ii) direct or indirect provision of transmission service by the Network Customer to third parties. All Network Customers taking Local Network Service shall use Local Point To Point Service for any Third Party Sale, which requires use of the Local Network. The PTO shall specify any appropriate charges and penalties and all related terms and conditions applicable in the event that a Network Customer uses Local Network Service or secondary service pursuant to Section II.2.g of this Schedule 21 to facilitate a wholesale sale that does not serve Local Network Load.

#### 3) Initiating Service

a) Condition Precedent for Receiving Service: Local Network Service shall be provided only if the following conditions are satisfied by the Eligible Customer: (i) the Eligible Customer completes an Application to the ISO for service, (ii) the Eligible Customer and the PTO complete the technical arrangements, and (iii) the Eligible Customer executes a Local Service Agreement with the PTO and the ISO or requests in writing that the ISO file an unexecuted Local Service Agreement containing terms and conditions deemed by the PTO (in consultation with the ISO) to be appropriate for such requested service with the Commission.

#### 4) Procedures for Arranging Local Network Service

#### a) Pre-RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternate Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of their existing Local Service Agreement that is in effect prior to February 1, 2005 ("Pre-RTO Local Service Agreement"), shall not be required to complete an Application or execute a Local Service Agreement under this Schedule 21, however, modifications to the existing Local Service Agreement may be required. The Transmission Customer shall contact the PTO to discuss and, if appropriate, modify the existing Local Service Agreement.

(ii) A Transmission Customer who wishes to make upgrades (i.e., increase MWs served) beyond the terms of its existing Local Service Agreement that is in effect prior to February 1,

2005 ("Pre-RTO Local Service Agreement"), shall contact the PTO to make arrangements to terminate the Transmission Customer's existing Local Service Agreement and shall complete (and submit to the ISO) an Application for Local Service and then execute a Local Service Agreement under this Schedule 21.

#### b) RTO Local Service Agreements

(i) A Transmission Customer who wishes to revise the Local Service Agreement termination date, transfer Local Service Agreement ownership, request an alternative Point of Receipt or Point of Delivery, or make upgrades (i.e., increase MWs served) within the terms of the existing Local Service Agreement under this Schedule 21, shall not be required execute a new Local Service Agreement under this Schedule 21, however, modifications to the existing Local Service Agreement under this Schedule 21 may be required. Such modifications to an existing Local Service Agreement typically do not require an additional Local or Regional System Impact Study to be completed. The Transmission Customer shall complete (and submit to the ISO) an application for Local Transmission Service that reflects the requested modifications to the Local Service Agreement to facilitate revision of its existing Schedule 21 Local Service Agreement. (ii) A Transmission Customer who wishes to make upgrades (i.e., increase MWs served) beyond the terms of the existing Local Service Agreement under this Schedule 21, shall contact the ISO to discuss and, if appropriate, terminate the Transmission Customer's existing Local Service Agreement under this Schedule 21 and shall complete (and submit to the ISO) a new Application for Local Service and then execute a new Local Service Agreement under this Schedule 21.

c) Application Procedures: An Eligible Customer requesting Local Network Service must submit an Application, with a deposit equal to the charge for one month of service, unless another charge is specified in the applicable Local Service Schedule, to the ISO as far as possible in advance of the month in which service is to commence. Completed Applications for Local Network Service will be assigned a reservation priority according to the date and time the Application is received, with the earliest Application receiving the highest priority. A Completed Application shall provide all of the information included in 18 C.F.R. §2.20 including but not limited to the following:

(i) The identity, address, telephone number and facsimile number of the party requesting service;

(ii) A statement that the party requesting service is, or will be upon commencement of service, an Eligible Customer;

(iii) A description of the Local Network Load at each delivery point. This description should separately identify and provide the Eligible Customer's best estimate of the total loads to be served at each transmission voltage level, and the loads to be served from each substation at the same transmission voltage level. The description should include a ten-year forecast of summer and winter load resource requirements beginning with the first year after the service is scheduled to commence;

(iv) The amount and location of any interruptible loads included in the Local Network Load. This shall include the summer and winter capacity requirements for each interruptible load (had such load not been interruptible), that portion of the load subject to interruption, the conditions under which an interruption can be implemented and any limitations on the amount and frequency of interruptions. An Eligible Customer should identify the amount of interruptible customer load (if any) included in the ten-year load forecast provided in response to (iii) above;

 (v) A description of Network Resources (current and ten-year projection), which shall include, for each Network Resource, if the description is not otherwise available to the ISO and the PTOs:

- Unit size and amount of capacity from that unit to be designated as Network Resource
- VAR capability (both leading and lagging) of all generators
- Operating restrictions
- Any periods of restricted operations throughout the year
- Maintenance schedules
- Minimum loading level of unit
- Normal operating level of unit
- Any must-run unit designations required for system reliability or contract reasons
- Approximate variable dispatch price (\$/MWH), consistent with Market Rule 1, for redispatch computations

- Arrangements governing sale and delivery of power to third parties from generating facilities located in the New England Control Area, where only a portion of unit output is designated as a Network Resource
- Description of external purchased power designated as a Network Resource including source of supply, control area location, transmission arrangements and delivery point(s);
- (vi) Description of Eligible Customer's transmission system:
- Load flow and stability data, such as real and reactive parts of the load, lines, transformers, reactive devices and load type, including normal and emergency ratings of all transmission equipment in a load flow format compatible with that used by the ISO and the PTOs
- Operating restrictions needed for reliability
- Operating guides employed by system operators
- Contractual restrictions or committed uses of the Eligible Customer's transmission system, other than the Eligible Customer's Local Network Loads and Resources
- Location of Network Resources described in subsection (v) above
- ten-year projection of system expansions or upgrades
- transmission system maps that include any proposed expansions or upgrades
- Thermal ratings of Eligible Customer's Control Area ties with other Control Areas;

(vii) Service Commencement Date and the term of the requested service. The minimum term for service is one year; and

(viii) Any additional information required of the Transmission Customer as specified in the PTO's planning process established in Attachment K.

Unless the Eligible Customer and the ISO agree to a different time frame, the ISO must acknowledge the request within ten (10) days of receipt. The acknowledgment must include a date by which a response, including a Local Service Agreement, will be sent to the Eligible Customer. If an Application fails to meet the requirements of this Section, the PTO shall notify the ISO within ten (10) days of the Application's receipt of the reasons for such failure, and the ISO shall, in turn, so notify the entity requesting service within five (5) days of the receipt of notice from the PTO of the reasons for such failure. Wherever possible, the ISO and the PTO will attempt to remedy deficiencies in the Application

through informal communications with the Eligible Customer. If such efforts are unsuccessful, the ISO shall return the Application without prejudice to the Eligible Customer, who may thereafter file a new or revised Application that fully complies with the requirements of this Section. The Eligible Customer will be assigned a new reservation priority consistent with the date of the new or revised Application. The ISO and the PTO shall treat this information consistent with the standards of conduct contained in Part 37 of the Commission's regulations.

d) Technical Arrangements to be Completed Prior to Commencement of Service: Local Network Service shall not commence until the PTO and the Network Customer, or a third party, have completed installation of all equipment specified under the Local Service Agreement consistent with Good Utility Practice and any additional requirements reasonably and consistently imposed to ensure the reliable operation of the Non-PTF. The PTO shall exercise reasonable efforts, in coordination with the Network Customer, to complete such arrangements as soon as practicable taking into consideration the Service Commencement Date.

e) Network Customer Facilities: The provision of Local Network Service shall be conditioned upon the Network Customer's constructing, maintaining and operating the facilities on its side of each delivery point or interconnection necessary to reliably deliver capacity and energy from the Non-PTF to the Network Customer. The Network Customer shall be solely responsible for constructing or installing and operating and maintaining all facilities on the Network Customer's side of each such delivery point or interconnection.

f) Filing of Service Agreement: The ISO shall file Local Service Agreements with the Commission in compliance with applicable Commission regulations.

#### 5) Network Resources

a) **Designation of Network Resources**: The Network Customer shall designate those Network Resources which are owned, purchased or leased by it. The Network Resources so designated may not include resources, or any portion thereof, that are committed for sale to non-designated third party load or otherwise cannot be called upon to meet the Network Customer's Local Network Load on a noninterruptible basis. Any owned, purchased or leased resources that were serving the Network Customer's loads under firm agreements entered into on or before the Compliance Effective Date shall be deemed to continue to be so owned, purchased or leased by it until the Network Customer informs the ISO and the PTO of a change.

b) Designation of New Network Resources: The Network Customer shall identify any new Network Resources which are owned, purchased or leased by it with as much advance notice as practicable. A designation of any new Network Resource as owned, purchased or leased by the Customer must be made by a notice to the ISO and the PTO.

c) Termination of Network Resources: The Network Customer may terminate the designation of all or part of a Network Resource as owned, purchased or leased by it at any time but shall provide notification to the ISO and the PTO as soon as reasonably practicable.

d) Network Customer Redispatch Obligation: As a condition to receiving Local Network Service, the Network Customer agrees to redispatch its Network Resources as requested by the ISO and the PTO. The ISO will redispatch all Resources subject to its control, pursuant to Market Rule 1, in order to meet load and to accommodate External Transactions. The Network Customers will be charged for the Congestion Costs and any other costs associated with such redispatch in accordance with Market Rule 1.

e) Transmission Arrangements for Network Resources Not Physically Interconnected with the PTO's Non-PTF: The Network Customer shall be responsible for any arrangements necessary to deliver capacity and energy from a Network Resource not physically interconnected with the PTO's Non-PTF. The applicable PTO will undertake reasonable efforts to assist the Network Customer in obtaining such arrangements, including without limitation, providing any information or data required by such other entity pursuant to Good Utility Practice.

f) Limitation on Designation of Network Resources: The Network Customer must demonstrate that it owns or has committed to purchase generation pursuant to an executed contract in order to designate a generating resource as a Network Resource. Alternatively, the Network Customer may establish that execution of a contract is contingent upon the availability of transmission service under this Schedule 21.

g) Network Customer Owned Transmission Facilities: The Network Customer that owns existing transmission facilities that are integrated with the PTO's Local Network may be eligible to receive consideration either through a billing credit or some other mechanism. In order to receive such

consideration, the Network Customer must demonstrate that its transmission facilities are integrated into the planning and operations of the PTO to serve all of its power and transmission customers. For facilities added by the Network Customer subsequent to the effective date of a Final Rule in RM05-25-000, the Network Customer shall receive credit for such transmission facilities added if such facilities are integrated into the operations of the PTO's facilities; provided however, the Local Network Customer's transmission facilities shall be presumed to be integrated if such transmission facilities, if owned by the PTO, would be eligible for inclusion in the PTO's annual transmission revenue requirement as specified in the PTO's respective Local Service Schedule. Calculation of any credit under this subsection shall be addressed in either the Network Customer's Service Agreement or any other agreement between the Parties.

#### 6) Designation of Local Network Load

a) Local Network Load: The Network Customer must designate the individual Local Network Loads which it expects to have served through Local Network Service. The Local Network Loads shall be specified in the Local Service Agreement.

b) New Local Network Loads Within the New England Control Area: The Network Customer shall provide the ISO and the PTO with as much advance notice as reasonably practicable of the designation of new Local Network Load that will be added to the Non-PTF. A designation of new Local Network Load must be made through a modification of service pursuant to a new Application. The PTO will use due diligence to install or cause to be installed any transmission facilities required to interconnect a new Local Network Load designated by the Network Customer. The costs of new facilities required to interconnect a new Local Network Load shall be determined in accordance with the procedures provided in this Schedule 21 and shall be charged to the Network Customer in accordance with Commission policy and this Schedule 21.

c) Local Network Load Not Physically Interconnected with the PTO: This Section applies to both initial designation and the subsequent addition of new Local Network Load not physically interconnected with the PTO's Non-PTF. To the extent that the Network Customer desires to obtain transmission service for a load outside the Local Network, the Network Customer shall have the option of (1) electing to include the entire load as Local Network Load for all purposes under this Schedule 21 and designating Network Resources in connection with such additional Local Network Load, or (2) excluding that entire load from its Local Network Load and purchasing Local Point To Point Service under this

Schedule 21. To the extent that the Network Customer gives notice of its intent to add a new Local Network Load as part of its Local Network Load pursuant to this Section the request must be made through a modification of service pursuant to a new Application.

d) New Interconnection Points: To the extent the Network Customer desires to add a new Delivery Point or interconnection point between the Non-PTF and a Local Network Load, the Network Customer shall provide the ISO and the PTO with as much advance notice as reasonably practicable.

e) Changes in Service Requests: Under no circumstances shall the Network Customer's decision to cancel or delay a requested change in Local Network Service (the addition of a new Network Resource, if any, or designation of a new Local Network Load) in any way relieve the Network Customer of its obligation to pay the costs of transmission facilities constructed by the PTOs and charged to the Network Customer as reflected in the applicable Local Service Agreement or other appropriate agreement. However, the PTO must treat any requested change in Local Network Service in a non-discriminatory manner.

f) Annual Load and Resource Information Updates: The Network Customer shall provide the ISO and the PTO with annual updates of Local Network Load and Network Resource forecasts consistent with those included in its Application including, but not limited to, any information provided under Section II.3.b of this Schedule 21 pursuant to the PTO's planning process in Attachment K. The Network Customer also shall provide the ISO and the PTO with timely written notice of material changes in any other information provided in its Application relating to the Network Customer's Local Network Load, Network Resources, its transmission system or other aspects of its facilities or operations affecting the ability of the PTO to provide reliable service.

## 7) Additional Study Procedures For Local Network Service Requests

a) Notice of Need for System Impact Study: After receiving a request for Local Network Service, a determination shall be made on a non-discriminatory basis as to whether a System Impact Study is needed. The ISO shall review the request to determine whether the provision of the requested service would have an impact on facilities other than Non-PTF, and if so, whether a System Impact Study is necessary to accommodate the requested service. If so, the ISO shall so inform the Eligible Customer as soon as practicable and will (in consultation with the PTO) perform a System Impact Study, as necessary, with respect to the request. A description of the ISO's methodology for completing a System Impact

Study is provided in OATT Attachment D. If the ISO determines that the service would not have an impact on facilities other than Non-PTF, the PTO shall determine whether a System Impact Study is necessary to accommodate the requested service and shall so inform the Eligible Customer as soon as practicable and will (in consultation with the ISO) perform a System Impact Study, as necessary, with respect to the application. In such cases, the ISO or the PTO, as applicable, shall within thirty (30) days of receipt of a Completed Application, tender a System Impact Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the ISO or the PTO, as applicable, for performing the required System Impact Study. For a service request to remain a Completed Application, the Eligible Customer shall execute the System Impact Study Agreement and return it to the ISO or the PTO, as applicable, within fifteen (15) days. If the Eligible Customer elects not to execute the System Impact Study Agreement, its Application shall be deemed withdrawn and its deposit shall be returned with interest. A description of the PTO's methodology for completing a System Impact Study is provided in its Local Service Schedule.

#### b) System Impact Study Agreement and Cost Reimbursement:

(i) The System Impact Study Agreement will clearly specify an estimate of the cost and time for completion of the System Impact Study. The charge shall not exceed the actual cost of the study. The System Impact Study shall rely on existing transmission planning studies to the extent reasonably practicable. The Eligible Customer will not be assessed a charge for such existing studies; however, the Eligible Customer will be responsible for charges associated with any modifications to existing planning studies that are reasonably necessary to evaluate the impact of the Eligible Customer's request for service on the Local Network.

(ii) If in response to multiple Eligible Customers requesting service in relation to the same competitive solicitation, a single System Impact Study is sufficient to accommodate the requests for service, the costs of that study shall be pro-rated among the Eligible Customers.

(iii) For System Impact Studies that the PTO conducts on its own behalf, the PTO shall record the cost of the System Impact Studies pursuant to Section II.8.5 of the Tariff.

(iv) In response to multiple Eligible Customers within the same electrically interconnected area requesting clustering of system Impact Study analysis for Local Service, the PTO will

accommodate such multiple requests if it can reasonable do so. The costs of such studies shall be pro-rated among the Eligible Customers on an agreed upon basis.

c) System Impact Study Procedures: Upon receipt of an executed System Impact Study Agreement, the ISO or the PTO, as applicable, will use due diligence to complete the required System Impact Study within a sixty (60) day period. The System Impact Study shall identify any system constraints, additional Direct Assignment Facilities or Local Network Upgrades required to provide the requested service. In the event that the ISO or the PTO, as applicable, is unable to complete the required System Impact Study within such time period, it shall so notify the Eligible Customer and provide an estimated completion date along with an explanation of the reasons why additional time is required to complete the required studies. A copy of the completed System Impact Study and related work papers shall be made available to the Eligible Customer as soon as the System Impact Study is complete. The PTO will use the same due diligence in completing the System Impact Study for an Eligible Customer as it uses when completing studies for itself. The ISO or the PTO, as applicable, shall notify the Eligible Customer immediately upon completion of the System Impact Study if the Local Network will be adequate to accommodate all or part of a request for service or that no costs are likely to be incurred for new transmission facilities or upgrades. In order for a request to remain a Completed Application, within fifteen (15) days of completion of the System Impact Study, the Eligible Customer must execute a Local Service Agreement or request the filing of an unexecuted Local Service Agreement pursuant to Section II.3.a of this Schedule 21 or the Application shall be deemed terminated and withdrawn.

d) **Facilities Study Procedures**: If a System Impact Study indicates that additions or upgrades to facilities other than Non-PTF are needed to supply the Eligible Customer's service request or to mitigate indirect impacts on the MTF facilities, the ISO, within thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the ISO for performing the required Facilities Study. If a System Impact Study indicates that additions or upgrades to Non-PTF facilities are needed to supply the Eligible Customer's service request or to mitigate indirect impacts on the MTF facilities, the PTO, within thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study, shall tender to the Eligible Customer a Facilities Study. Study agreement pursuant to which the Eligible Customer's service request or to mitigate indirect impacts on the MTF facilities, the PTO, within thirty (30) days of the completion of the System Impact Study, shall tender to the Eligible Customer a Facilities Study Agreement pursuant to which the Eligible Customer shall agree to reimburse the PTO for performing the required Facilities Study. For clustered studies, the cost of such studies shall be pro-rated among the Eligible Customers on an agreed upon basis. For a service request to remain a Completed Application, the Eligible Customer shall execute the Facilities Study Agreement and return it within fifteen (15) days. If the Eligible Customer elects not to execute the Facilities Study Agreement, its

Application shall be deemed withdrawn and its deposit shall be returned with interest. Upon receipt of an executed Facilities Study Agreement, the ISO or the PTO, as applicable, will use due diligence to complete the required Facilities Study within a sixty (60) day period. If the Facilities Study cannot be completed in the allotted time period, the Eligible Customer shall be notified and provided an estimate of the time needed to reach a final determination along with an explanation of the reasons that additional time is required to complete the study. When completed, the Facilities Study will include a good faith estimate of (i) the cost of Direct Assignment Facilities to be charged to the Eligible Customer, (ii) the Eligible Customer's appropriate share of the cost of any required Local Network Upgrades, and (iii) the time required to complete such construction and initiate the requested service. The Eligible Customer shall provide a letter of credit or other reasonable form of security acceptable to the PTO equivalent to the costs of new facilities or upgrades consistent with commercial practices as established by the Uniform Commercial Code. The Eligible Customer shall have thirty (30) days to execute a Local Service Agreement or request the filing of an unexecuted Local Service Agreement and provide the required letter of credit or other request will no longer be a Completed Application and shall be deemed terminated and withdrawn.

In addition to the foregoing, each Facilities Study shall, if requested by the Eligible Customer, contain a non-binding estimate from the ISO of the Incremental ARRs, if any, resulting from the construction of the new facilities. After completion of the transmission upgrade or expansion, the ISO shall determine the Incremental ARRs, if any, resulting from the upgrade or expansion.

e) Facilities Study Modifications: Any change in design arising from the inability to site or construct facilities as proposed will require development of a revised good faith estimate. New good faith estimates also will be required in the event of new statutory or regulatory requirements that are effective before the completion of construction or other circumstances beyond the control of the ISO and/or the PTO that significantly affect the final cost of new facilities or upgrades to be charged to the Transmission Customer.

f) Due Diligence in Completing New Facilities: The PTO shall use due diligence to add necessary facilities or upgrade its Local Network within a reasonable time. The PTO will not upgrade its existing or planned Local Network in order to provide the requested Local Network Service if doing so would impair system reliability or otherwise impair or degrade existing firm service.

**g**) **Claims or Disputes**: Any claim or dispute between the PTO and the Transmission Customer with respect to a System Impact Study or Facilities Study shall be governed by the provisions of Section I.6 of the Tariff.

h) Penalties for Failure to Meet Study Deadlines: Section I.7.i of this Schedule 21 defines penalties that apply for failure to meet the 60-day study completion due diligence deadlines for System Impact Studies and Facilities Studies under Section I of this Schedule 21. These same requirements and penalties apply to service under Section II of this Schedule 21.

#### 8) Load Shedding and Curtailments

a) **Procedures**: The PTO shall establish Load Shedding and Curtailment procedures (consistent with those of the ISO and the Local Control Center) with the objective of responding to contingencies on the Non-PTF. The PTO will notify all affected Local Network Service Customers in a timely manner of any scheduled Curtailment.

b) Transmission Constraints: During any period when a PTO or the Local Control Center determines that a transmission constraint exists on the Non-PTF, and such constraint may impair the reliability of the New England Transmission System, the PTO or the Local Control Center will so inform the ISO. The ISO will take whatever actions, consistent with Good Utility Practice, that are reasonably necessary to maintain the reliability of the system. To the extent the ISO determines that the reliability of the New England Transmission System can be maintained by redispatching resources, The ISO will initiate procedures to redispatch all resources on a least-cost basis without regard to the ownership of such resources.

c) Cost Responsibility for Relieving Transmission Constraints: Whenever the ISO implements least-cost redispatch procedures in response to a transmission constraint, the Transmission Customer will bear the costs of such redispatch in accordance with Market Rule 1.

d) **Curtailments of Scheduled Deliveries**: If a transmission constraint on the Non-PTF cannot be relieved through the implementation of least-cost redispatch procedures and the PTO determines that it is necessary to effect a Curtailment of scheduled deliveries, such schedule shall be curtailed in accordance with the terms of the Tariff.

e) Allocation of Curtailments: The ISO, the Transmission Owner or the Local Control Center shall on a non-discriminatory basis, effect a Curtailment of the transaction(s) that effectively relieves the constraint. However, to the extent practicable and consistent with Good Utility Practice, any Curtailment will be shared by the customers taking MTF Service and OTF Service and/or Through or Out Service and Network Customers on a non-discriminatory basis. Notwithstanding the preceding provisions of this Section, External Transactions shall be scheduled and curtailed in accordance with Section II.44 of the OATT.

f) Load Shedding: Load Shedding also may occur in accordance with the applicable Local Service Schedule to the extent provided for in such Local Service Schedule.

System Reliability: Notwithstanding any other provisions of this Schedule, The ISO, the PTO **g**) and the Local Control Centers reserve the right, consistent with Good Utility Practice and on a not unduly discriminatory basis, to effect a Curtailment of service without liability on the part of the ISO, the PTO or the Local Control Centers for the purpose of making necessary adjustments to, changes in, or repairs on the PTO's lines, substations and facilities, and in cases where the continuance of service would endanger persons or property. In the event of any adverse condition(s) or disturbance(s) on the Non-PTF or on any other system(s) directly or indirectly interconnected with the Non-PTF, the ISO, the PTO and the Local Control Centers, consistent with Good Utility Practice, also may effect a Curtailment of service in order to (i) limit the extent or damage of the adverse condition(s) or disturbance(s), (ii) prevent damage to generating or transmission facilities, or (iii) expedite restoration of service. The ISO, the PTO or the Local Control Centers will give the Network Customer as much advance notice as is practicable in the event of such Curtailment. Any Curtailment of Local Network Service will be not unduly discriminatory relative to the PTO's use of the New England Transmission System on behalf of their Native Load Customers. The Local Service Schedules shall specify the rate treatment and all related terms and conditions applicable in the event that the Network Customer fails to respond to established Load Shedding and Curtailment procedures.

#### 9) Rates and Charges

The Network Customer shall pay all applicable charges for Local Network Service set forth in this Schedule 21, including the Local Service Schedules, and for any Direct Assignment Facilities and its share of the cost of any required Local Network Upgrades and applicable study costs consistent with Commission policy, along with any additional charges imposed under the Tariff. In the event the

Network Customer serves Local Network Load located on more than one Local Network, the amount to be paid by it shall be separately computed for each Local Network.

## 10) Determination of Network Customer's Monthly Network Load

For purposes of Local Network Service, the Network Customer's "Monthly Network Load" shall be determined in accordance with the applicable Local Service Schedule.

## 11) Operating Arrangements

The Network Customer shall plan, construct, operate and maintain its facilities in accordance with Good Utility Practice and in conformance with the terms of the Tariff. The terms and conditions under which the Network Customer taking Local Network Service shall operate its facilities and the technical and operational matters associated with the implementation of Local Network Service shall be specified in Section II.22 of the Tariff and/or the Local Service Schedules.

# SCHEDULE 21 ATTACHMENT A FORM OF LOCAL SERVICE AGREEMENT

This LOCAL SERVICE AGREEMENT, dated as of \_\_\_\_\_\_, is entered into, by and between \_\_\_\_\_\_, a \_\_\_\_\_\_ organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_\_\_, a \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_, a \_\_\_\_, a \_\_\_, a \_\_\_\_, a \_\_\_, a \_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_, a \_\_\_, a \_\_\_, a \_\_\_\_, a \_\_\_, a

("Transmission Customer") and ISO New England, Inc., a non-stock corporation organized and existing under the laws of the State of Delaware ("ISO"). Under this Agreement the Transmission Owner, Transmission Customer, and the ISO each may be referred to as a "Party" or collectively as the "Parties."

#### **PART I – General Terms and Conditions**

- 1. Service Provided (Check applicable):
- \_\_\_\_ Local Network Service
- \_\_\_\_ Local Point-To-Point Service
  - \_\_\_ Firm
  - \_\_\_ Non-Firm

Regional Network Service customers must take either Local Network Service or Local Point-To-Point Service.

- 2. The Transmission Customer is an Eligible Customer under the Tariff and is a party to either a Market Participant Service Agreement or a Transmission Service Agreement.
- 3. The Transmission Customer has submitted a Completed Application and the required deposit, if applicable, for service under this Local Service Agreement and the Tariff.
- 4. The Transmission Customer agrees to supply information to the Transmission Owner that the Transmission Owner deems reasonably necessary in accordance with Schedule 21 and Good Utility Practice in order for it to receive the requested service.
- 5. The Transmission Owner agrees to provide and the Transmission Customer agrees to take and pay for service in accordance with the provisions of the Tariff and this Local Service Agreement.

- Service may be subject to some combination of the charges detailed in Schedule 21 of the OATT. The appropriate charges will be determined in accordance with the terms and conditions of Schedule 21.
- Any notice or request made to or by either party regarding this Local Service Agreement shall be made to the representative of the other party as indicated below. Transmission Customer:

Transmission Owner:

The ISO:

- 8. The ISO New England Inc. Transmission, Markets and Services Tariff (the "Tariff") is incorporated herein and made a part hereof. Capitalized terms used in this Local Service Agreement shall have the meanings ascribed in the Tariff.
- 9. Nothing contained in this Local Service Agreement shall be construed as affecting in any way the right of the Transmission Owner to file with the Commission under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of this Local Service Agreement. Nothing contained in this Local Service Agreement shall be construed as affecting in any way the ability of the Transmission Customer to file with the Commission under Section 206 of the Federal Power Act

and pursuant to the Commission's rules and regulations promulgated thereunder for a change in any rates, terms and conditions of this Local Service Agreement.

10. Nothing contained in this Local Service Agreement shall be construed as affecting or enlarging, in whole or in part, the limited responsibility of the ISO under the Transmission Operating Agreement ("TOA") to coordinate the Transmission Owner's provision of Local Service and to determine whether the provision of Local Service would have an impact on facilities used for the provision of Regional Transmission Service.

#### PART II – Local Network Service

- 1. The Transmission Customer has been determined by the Transmission Owner and the ISO to have a Completed Application for Local Network Service under the Tariff.
- Service shall commence on the later of: (1) \_\_\_\_\_\_, or (2) the date on which construction of all interconnection equipment, any Direct Assignment Facilities and/or facility or Local Network Upgrades are completed, or (3) such other date as it is permitted to become effective by the Commission. Service shall terminate on \_\_\_\_\_\_.
- 3. Specifications for Local Network Service.
  - a. Term of Service:
  - b. List of Network Resources and Point(s) of Receipt:
  - c. Description of capacity and energy to be transmitted:
  - d. Description of Local Network Load:
  - e. List of Point(s) of Delivery and metering point(s) when they differ from Point(s) of Delivery:
  - f. List of non-Network Resource(s), to the extent known:

- g. Ancillary Services requested or proof of satisfactory arrangements for Ancillary Services:
- h. Identity of Designated Agent:

Authority of Designated Agent:

Term of Designated Agent's authority:

Division of responsibilities and obligations between Transmission Customer and Designated Agent:

- i. Interconnection facilities and associated equipment:
- j. Project name:
- k. Interconnecting Transmission Customer:
- l. Location:
- m. Transformer nameplate rating:
- n. Interconnection point:
- o. Additional facilities and/or associated equipment:
- p. Service under this Local Service Agreement shall be subject to the following charges:
- q. Additional terms and conditions:

4. Planned work schedule.

Estimated Time

MilestonePeriod For Completion(Activity)(# of months)

5. Payment schedule and costs.

(Study grade estimate, +\_\_\_% accuracy, year \$s) Milestone Am

Amount (\$)

6. Policy and practices for protection requirements for new or modified load interconnections.

7. Insurance requirements.

## PART III – Local Point-To-Point Service

1. The Transmission Customer has been determined by the Transmission Owner and the ISO to have a Completed Application for Local Point-To-Point Service under the Tariff.

2. Service shall commence on the later of: (1) \_\_\_\_\_\_, or (2) the date on which construction of any Direct Assignment Facilities and/or Local Network Upgrades are completed, or (3) such other date as it is permitted to become effective by the Commission. Service shall terminate on

4. Specifications for Local Point-To-Point Service.

- a. Term of Transaction:
- b. Description of capacity and energy to be transmitted by the Transmission Owner including the electric Control Area in which the transaction originates:
- c. Point(s) of Receipt:
- d. Delivering Party:
- e. Point(s) of Delivery:
- f. Receiving Party:

<sup>3.</sup> Non-firm Local Point-To-Point Service shall be provided by the Transmission Owner upon request by an authorized representative of the Transmission Customer.

- g. Maximum amount of capacity and energy to be transmitted (Reserved Capacity):
- h. Designation of party(ies) subject to reciprocal service obligation:
- i. Name(s) of any intervening Control Areas providing transmission service:
- j. Service under this Local Service Agreement shall be subject to the following charges:
- k Interconnection facilities and associated equipment:
- 1. Project name:
- m. Interconnecting Transmission Customer:
- n. Location:
- o. Transformer nameplate rating:
- p. Interconnection point:
- q. Additional facilities and/or associated equipment:
- r. Additional terms and conditions:
- 5. Planned work schedule.

Estimated Time	
Milestone	Period For Completion
(Activity)	(# of months)

6. Payment schedule and costs.
 (Study grade estimate, +\_\_\_% accuracy, year \$s)
 Milestone Amount (\$)

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7. Policy and practices for protection requirements for new or modified load interconnections.

8. Insurance requirements.

IN WITNESS WHEREOF, the Parties have caused this Local Service Agreement to be executed by their respective authorized officials. Transmission Customer:

By:			
Name	Title	Date	
Print Name			
Transmission Owner:			
By:			
Name	Title	Date	
Print Name			
The ISO:			
By:			
Name	Title	Date	
			Print Name

## **SCHEDULE 21**

#### ATTACHMENT A-1

## Form of Local Service Agreement For The Resale, Reassignment or Transfer of Point-To-Point Transmission Service

 1.0
 This LOCAL SERVICE AGREEMENT, dated as of \_\_\_\_\_\_, is entered into, by and between \_\_\_\_\_\_, a \_\_\_\_\_organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_\_, organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_, a \_\_\_\_\_, organized and existing under the laws of the State/Commonwealth of \_\_\_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_\_, a \_\_\_\_, a \_\_\_\_, a \_\_\_,

("Assignee") and ISO New England, Inc., a non-stock corporation organized and existing under the laws of the State of Delaware ("ISO"). Under this Agreement the Transmission Owner, Assignee, and the ISO each may be referred to as a "Party" or collectively as the "Parties."

2.0 The Assignee has been determined by the Transmission Owner to be an Eligible Customer under the Tariff pursuant to which the transmission service rights to be transferred were originally obtained.

3.0 The terms and conditions for the transaction entered into under this Local Service Agreement shall be subject to the terms and conditions of Part I of Schedule 21 and the Transmission Owner's Local Service Schedule of Tariff, except for those terms and conditions negotiated by the Reseller of the reassigned transmission capacity (pursuant to Section I.11.a of this Tariff) and the Assignee, to include: contract effective and termination dates, the amount of reassigned capacity or energy, point(s) of receipt and delivery. Changes by the Assignee to the Reseller's Points of Receipt and Points of Delivery will be subject to the provisions of Section I.11.b of this Tariff.

4.0 The Transmission Owner shall credit the Reseller for the price reflected in the Assignee's Local Service Agreement or the associated OASIS schedule.

5.0 Any notice or request made to or by either Party regarding this Local Service Agreement shall be made to the representative of the other Party as indicated below.

Transmission Owner:

The ISO:

\_\_\_\_\_

Assignee:

6.0 The Tariff is incorporated herein and made a part hereof.

IN WITNESS WHEREOF, the Parties have caused this Local Service Agreement to be executed by their respective authorized officials.

Transmission Owner:

By:	<u></u>	
Print Name:	Title:	Date:
The ISO:		
By:	<u> </u>	
Print Name:	Title:	Date:
Assignee:		
Ву:		
Print Name:	Title:	Date:

# Specifications For The Resale, Reassignment Or Transfer of Long-Term Firm Point-To-Point Transmission Service

 1.0
 Term of Transaction: \_\_\_\_\_

 Start Date: \_\_\_\_\_
 \_\_\_\_\_\_

Termination Date: \_\_\_\_\_

2.0 Description of capacity and energy to be transmitted by Transmission Owner including the electric Control Area in which the transaction originates.

 3.0
 Point(s) of Receipt:\_\_\_\_\_

 Delivering Party:\_\_\_\_\_

 4.0
 Point(s) of Delivery:\_\_\_\_\_\_

 Receiving Party:\_\_\_\_\_\_

5.0 Maximum amount of reassigned capacity:

6.0 Designation of party(ies) subject to reciprocal service obligation:

7.0 Name(s) of any Intervening Systems providing transmission service:

(Name of Transmission Owner) Open Access Transmission Tariff

8.0 Service under this Agreement may be subject to some combination of the charges detailed below. (The appropriate charges for individual transactions will be determined in accordance with the terms and conditions of the Tariff.)

8.1 Transmission Charge:\_\_\_\_\_

8.2 System Impact and/or Facilities Study Charge(s):

8.3 Direct Assignment Facilities Charge:\_\_\_\_\_

8.4 Ancillary Services Charges: \_\_\_\_\_

9.0 Name of Reseller of the reassigned transmission capacity:

## SCHEDULE 21 - FG&E

# FITCHBURG GAS AND ELECTRIC LIGHT COMPANY LOCAL SERVICE SCHEDULE

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#### SCHEDULE 21-FG&E

#### Fitchburg Gas and Electric Light Company Local Service Schedule

#### I. <u>COMMON SERVICE PROVISIONS</u>

Fitchburg Gas and Electric Light Company ("FG&E") is a participant in the New England Control Area and has agreed to provide transmission and ancillary services over PTF pursuant to the Tariff. The services provided under this Schedule 21-FG&E apply only to Non-PTF, except in the case of service to Network Customers that have all or part of their Network Load directly connected to the PTF in the Local Network. These Network Customers shall pay for Local Network Service pursuant to Attachment H to this Schedule 21-FG&E. Provisions of this Schedule 21-FG&E shall have priority over any conflicting provisions in the Tariff.

On December 1, 2014, in Docket No. OA14 \_\_\_\_, FG&E requested confirmation of waiver of the following:

- 1. Sections 35.28, 37.5(b), 38.2(a)(1)-(7) 38.2(a)(8), 38.2(a)(9) and 38.2(a)(11) of the Commission's Regulations;,
- The FERC Standards for Business Practices and Communications Protocols for Public Utilities adopted in Order No. 676, Standards for Business Practices and Communications Protocols for Public Utilities, Order No. 676, III FERC Stats. & Regs., Regs. Preambles 31,216 (2006), as revised in Orders No. 676 C, Standards for Business Practices and Communication Protocols for Public Utilities, 73 Fed. Reg. 43,848 (July 29, 2008), FERC Stats. & Regs, ¶ 31,274 (July 21, 2008));-
- Waiver of the standards incorporated by reference in Order No. 676 E, Standards for Business Practices and Communication Protocols for Public Utilities, FERC Stats. & Regs ¶ 31,299 (Nov. 24, 2009) and

These standards were developed by the North American Energy Standards Board and incorporated by reference through the addition of Part 38 and Sections 35.28 and 37.5(b) of the Commission's Regulations pursuant to Docket No. RM05-5-000. Upon issuance of a final Commission order on this request for-waiver, FG&E will modify this schedule to reflect the Commission's determination and the appropriate-

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### docket number.

### 1 Definitions

**1.0 Annual Transmission Costs**: The total annual cost of the Local Network for purposes of Local Network Service shall be the amount specified in Attachment H until amended by FG&E or modified by the Commission.

**1.1 Curtailment**: A reduction in firm or non-firm transmission service in response to a transmission capacity shortage as a result of system reliability conditions.

**1.2 Load Ratio Share**: Ratio of a Transmission Customer's Non-PTF Network Load to FG&E's total load computed in accordance with Sections II.10 and II.10(a) of this Schedule under Sections Supplementing Section 21 of the OATT and calculated on a rolling twelve month basis.

**1.3.1** Local Network: The transmission facilities owned, controlled, or operated by FG&E that are used to provide transmission service under Schedule 21 of the OATT.

**1.4 Local Network Service**: The transmission service provided under Schedule 21 of the OATT and this Schedule.

1.5 Network Load: The load directly interconnected to the PTF or Non-PTF facilities of FG&E. A Network Customer may elect to designate less than its total load as Network Load but may not designate only part of the load at a discrete Point of Delivery. Where a Eligible Customer has elected not to designate a particular load at discrete points of delivery as Network Load, the Eligible Customer is responsible for making separate arrangements under Schedule 21 of the OATT for any Local Point-to-Point Service that may be necessary for such non-designated load. For purposes of establishing rates and charges under this Tariff, the Network Load will be subdivided into one of two categories:

**A.** PTF Network Load shall be the load over FG&E's PTF facilities and shall equal the load of Network Customers directly interconnected with FG&E's PTF or indirectly utilizing FG&E's PTF through Non-PTF facilities of FG&E.

**B**. Non-PTF Network Load shall be the load over FG&E's Non-PTF directly interconnected with FG&E's Non-PTF facilities.

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**1.6** Network Upgrades: Modifications or additions to transmission-related facilities that are integrated with and support FG&E's overall Local Network for the general benefit of all users of such Local Network.

**1.7 Parties**: FG&E and the Transmission Customer receiving service under this Schedule and the OATT.

## SECTIONS SUPPLEMENTING THE BODY OF THE TARIFF

### Preamble

The following provisions supplement the provisions of the Tariff. Provisions of this Schedule 21-FG&E shall have priority over any conflicting provisions in the Tariff. The section numbers of this Schedule 21-FG&E correspond to or are consecutive to the section numbers in the body of the Tariff that are affected by the additional provisions herein.

### Sections Supplementing Section 1: General Terms and Conditions

**1.7 Creditworthiness**: For the purpose of determining the ability of the Transmission Customer to meet its obligations related to service hereunder, FG&E may require reasonable credit review procedures in accordance with Attachment L to Schedule 21-FG&E.

### Sections Supplementing Section II of the Tariff: Open Access Transmission Tariff (OATT)

# II.A. COMMON SERVICE PROVISIONS

#### II.4 Ancillary Services

Ancillary Services are needed with transmission service to maintain reliability within and among the Control Areas affected by the transmission service. FG&E is required to provide (or offer to arrange with the ISO as discussed below), and the Transmission Customer is required to purchase Scheduling, System Control and Dispatch Service.

The following Ancillary Services are available pursuant to Section II.4 of the Tariff only to the Transmission Customer serving load within the New England Control Area: (i) Reactive Supply and

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Voltage Control Service, (ii) Regulation and Frequency Response, (iii) Energy Imbalance, (iv) Ten-Minute Spinning Reserve Service, (v) Ten-Minute Non-Spinning Reserve Service and (vi) Thirty-Minute Operating Reserve Service.

### II.8 Billing and Invoicing; Accounting

**8.2 Invoicing**: Within a reasonable time after the first day of each month, FG&E shall submit an invoice to the Transmission Customer for the charges for all services furnished under the OATT during the preceding month. The invoice shall be paid by the Transmission Customer within twenty (20) days of receipt. All payments shall be made in immediately available funds payable to FG&E, or by wire transfer to a bank named by FG&E.

**8.4 Customer Default**: In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to FG&E on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after FG&E notifies the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, FG&E may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission So approves any such request. In the event of a billing dispute between FG&E and the Transmission Customer, FG&E will continue to provide service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then FG&E may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy.

#### **II.10.2 Stranded Cost Recovery**

FG&E may seek to recover stranded costs from the Transmission Customer pursuant to this OATT in accordance with the terms, conditions and procedures set forth in FERC Order No. 888. However, FG&E must separately file any specific proposed stranded cost charge under Section 205 of the Federal Power Act.

# SECTIONS SUPPLEMENTING SCHEDULE 21 OF THE OATT

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#### I. Local Point-to-Point Service Over the Local Network Owned by FG&E

#### Preamble

In addition to the provisions set forth in Schedule 21 of the OATT, the provisions of this Schedule 21-FG&E shall govern Local Point-To-Point transactions using the Local Network owned by FG&E. Provisions of this Schedule 21-FG&E shall have priority over any conflicting provisions in the Tariff. The section numbers of this Schedule 21-FG&E correspond to or are consecutive to the sections of Schedule 21 of the OATT that are affected by the additional provisions herein.

To the extent not otherwise covered in the OATT, the then-current ISO New England Operating Documents, or the TOA, or the rules adopted thereunder, whenever FG&E implements least-cost redispatch procedures in response to a transmission constraint, FG&E and the Transmission Customer(s) taking Local Point-To-Point Service will each bear a proportionate share of the total redispatch cost.

### 3) Service Availability

**b) Determination of Available Transfer Capability (ATC)**: A description of FG&E's specific methodology for assessing ATC is contained in Attachment C of this Schedule. In the event sufficient transfer capability may not exist to accommodate a service request, FG&E will respond by performing a System Impact Study.

**g) Real Power Losses:** Real power losses are associated with all transmission service. FG&E is not obligated to provide real power losses. The Transmission Customer is responsible for replacing losses associated with all transmission service as calculated by FG&E. The applicable real power loss factors tabulated below will be applied to metered loads and Reserved Capacity amounts to account for losses on FG&E's system. The applicable real power loss factors are as follows:

Firm Local Point-to-Point Service = 0.72% at 69 kV subtransmission. Non-firm Local Point-to-Point Service = 0.72% at 69 kV subtransmission.

#### 6) Procedures for Arranging Non-Firm Local Point-To-Point Service

**f**) **Determination of Available Transfer Capability**: Following receipt of a tendered schedule FG&E will make a determination on a non-discriminatory basis of ATC pursuant to

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Attachment C of this Schedule. Such determination shall be made as soon as reasonably practicable after receipt, but not later than the following time periods for the following terms of service (i) thirty (30) minutes for hourly service, (ii) thirty minutes for daily service, (iii) four (4) hours for weekly service, and (iv) two (2) days for monthly service (during FG&E's normal business hours of 8:00 a.m. to 4:30 p.m., Monday to Friday).

### 11) Sale or Assignment of Local Point-to-Point Service

c) Information on Assignment or Transfer of Service: FG&E currently has waiver from the obligations of FERC Order No. 889 to maintain an OASIS. In the future, upon implementation of any FG&E OASIS site, resellers may use FG&E's OASIS site to post transmission capacity available for resale.

### II. Local Network Service using Non-PTF Owned by FG&E

## Preamble

In addition to the provisions set forth in Schedule 21 of the OATT, the provisions of this Schedule 21-FG&E shall govern Local Network Service using Non-PTF owned by FG&E. Provisions of this Schedule 21-FG&E shall have priority over any conflicting provision in the Tariff. The section numbers of this Schedule 21-FG&E correspond to the sections of Schedule 21 of the OATT that are affected by the additional provisions herein.

Local Network Service allows the Network Customer to integrate, economically dispatch, and regulate its current and planned Network Resources to serve its Network Load in a manner comparable to that in which FG&E utilizes its Non-PTF to serve its Native Load Customers. Local Network Service also may be used by the Network Customer to deliver economy energy purchases to its Network Load from non-designated resources on an as-available basis without additional charge. Transmission service for sales to non-designated loads will be provided pursuant to the applicable terms and conditions of Schedule 21 of the OATT.

### 2) Availability of Local Network Service

f) Real Power Losses: The Network Customer is responsible for replacing losses associated with all transmission service as calculated by FG&E. The applicable real power loss

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factors tabulated below will be applied to metered loads and Reserved Capacity amounts to account for losses on FG&E's system. The applicable real power loss factors are as follows:

Local Network Service = 0.72% at 69 kV subtransmission.

### 8) Load Shedding and Curtailments

a) **Procedures**: Prior to the Service Commencement Date, FG&E and the Network Customer shall establish Load Shedding and Curtailment procedures pursuant to Section II.20 of the Tariff, with the objective of responding to contingencies on the Non-PTF. The Parties will implement such programs during any period when the ISO, the Local Control Center or FG&E determines that a system contingency exists and such procedures are necessary to alleviate such contingency. FG&E will notify all affected Network Customers in a timely manner of any scheduled Curtailment.

b) Transmission Constraints: During any period when FG&E determines that a transmission constraint exists on the Local Network, and such constraint may impair the reliability of FG&E's system, FG&E will take whatever actions, consistent with then-current ISO New England Operating Documents or the TOA, and the rules adopted thereunder, and with Good Utility Practice, that are reasonably necessary to maintain the reliability of FG&E's system. To the extent ISO determines that the reliability of the ISO New England transmission system can be maintained by redispatching resources, FG&E will initiate procedures pursuant to the OATT, the then-current ISO New England Operating Documents, or the TOA, and the rules adopted thereunder to redispatch all Network Resources and FG&E's own resources on a least-cost basis without regard to the ownership of such resources. Any redispatch under this section may not unduly discriminate between FG&E's use of the Local Network to serve its designated Network Load.

c) Cost Responsibility for Relieving Transmission Constraints: To the extent not otherwise covered in the OATT, the then-current ISO New England Operating Documents, or the TOA, or the rules adopted thereunder, whenever FG&E implements least-cost redispatch procedures in response to a transmission constraint, FG&E and the Network Customer(s) will each bear a proportionate share of the total redispatch cost based on their respective Load Ratio

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Shares.

d) **Curtailments of Scheduled Deliveries**: If a transmission constraint on FG&E's Local Network cannot be relieved through the implementation of least-cost redispatch procedures and FG&E determines that it is necessary to Curtail scheduled deliveries, the Parties shall Curtail such schedules in accordance with Section II.22 of the Tariff.

e) Allocation of Curtailments: The ISO, the Local Control Center or FG&E shall, on a non-discriminatory basis, Curtail the transaction(s) that effectively relieve the constraint. However, to the extent practicable and consistent with Good Utility Practice, any Curtailment will be shared by FG&E and Network Customers in proportion to their respective Load Ratio Shares. Neither the ISO, the Local Control Center, nor FG&E shall direct the Network Customer to Curtail schedules to an extent greater than either would Curtail FG&E's schedules under similar circumstances.

f) Load Shedding: To the extent that a system contingency exists on FG&E's Local Network and the ISO, the Local Control Center or FG&E determines that it is necessary for FG&E and the Network Customers to shed load, the Parties shall shed load in accordance with previously established procedures in accordance with Section II.22 of the Tariff, the then-current ISO New England Operating Documents, or the TOA, and the rules adopted thereunder.

g) System Reliability: Notwithstanding any other provisions of this Schedule, FG&E reserves the right, consistent with Good Utility Practice and on a not unduly discriminatory basis, to Curtail Local Network Service without liability on the part of FG&E for the purpose of making necessary adjustments to, changes in, or repairs on FG&E's lines, substations, and facilities, and in cases where the continuance of Local Network Service would endanger persons or property. In the event of any adverse conditions or disturbances on FG&E's Local Network or on any other system(s) directly or indirectly interconnected with FG&E's Local Network, FG&E, consistent with Good Utility Practice, also may Curtail Local Network Service in order to (i) limit the extent or damage of the adverse condition(s) or disturbance(s), (ii) prevent damage to generating or transmission facilities, or (iii) expedite restoration of service. FG&E will give the Network Customer as much advance notice as is practicable in the event of such Curtailment. Any Curtailment of Local Network Service will not be unduly discriminatory relative to FG&E's use of its Local Network on behalf of its Native Load Customers. FG&E shall specify the rate

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treatment and all related terms and conditions applicable in the event that the Network Customer fails to respond to established Load Shedding and Curtailment procedures.

### 9) Rates and Charges

In addition to the above sections that correspond to sections in Schedule 21 of the OATT, the following additional provision shall apply to Local Network Service over FG&E's Local Network.

**Monthly Demand Charge**: The Network Customer shall pay a Monthly Demand
 Charge which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of
 FG&E's Annual Transmission Revenue Requirement as specified in Attachment H to this
 Schedule 21-FG&E.

**10) Determination of Network Customer's Local Monthly Network Load**: The Network Customer's local monthly Network Load is its hourly load (including its designated Network Load not physically interconnected with FG&E under Section II.5(c) of Schedule 21 of the OATT) coincident with the FG&E's Monthly Local Network Peak. Monthly revenue requirements not otherwise paid for through charges to Eligible Customers for Local Point-to-Point Service will be allocated among FG&E's Network Customers receiving service under the tariff on the basis of their loads during the hour in the month in which the total connected load to the local network is at its maximum, without any adjustment for credits for generation.

In addition to the above sections that correspond to sections in Schedule 21 of the OATT, the following three provisions shall apply to Local Network Service over FG&E's local network.

**10a) Determination of FG&E's Monthly Local Network Load**: FG&E's monthly Local Network Load is FG&E's Monthly Local Network Peak minus the coincident peak usage of all firm Local Point-To-Point Service customers pursuant to Schedule 21 of the OATT plus the Reserved Capacity of all firm Local Point-To-Point Service customers.

**10b) Recovery of PTF Transmission Revenue Requirements**: The portion of FG&E's annual transmission revenue requirements with respect to PTF which is not recovered through the distribution of revenues from Regional Network Service or Local Point-to-Point Service shall be recovered from Eligible Customers taking Regional Network Service or Local Point-to-Point Service pursuant to Section II.12.2(b) of the Tariff.

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# SCHEDULE 1

#### Local Scheduling, System Control and Dispatch Service

This service is required to schedule the movement of power through, out of, within, or into FG&E's Local Network Control Area. Local Scheduling, System Control and Dispatch Service is to be provided directly by FG&E and the ISO. The Transmission Customer must purchase this service from FG&E. The charges for FG&E's Local Scheduling, System Control and Dispatch Service are to be based on the rates set forth below. To the extent that the ISO performs this service for FG&E, charges to the Transmission Customer are to reflect only a pass-through of the costs charged to FG&E by the ISO.

Each firm Local Point-To-Point Service Customer under this Tariff will be charged for Local Scheduling, System Control and Dispatch Services for the total Reserved Capacity specified in each reservation for firm Local Point-To-Point Service made under the Tariff at the rates set forth in Appendix A of this Schedule 1.

Each Network Customer under this Tariff will be charged a monthly Local Scheduling, System Control and Dispatch Service Demand Charge, which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of the Formula Requirements specified in Appendix B of this Schedule 1.

Each Transmission Customer with generation within the ISO's Control Area shall be required also to provide for Scheduling, System Control and Dispatch Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting with the ISO for these services on an unbundled basis. FG&E will make available Generation Scheduling, System Control and Dispatch Service at the rates set forth in Appendix C of this Schedule 1.

Each Transmission Customer with generation located outside of the ISO Control Area shall be required to provide for Scheduling, System Control and Dispatching Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting for these services from the provider of these services within the Control Area where the generation is located. FG&E shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule 1 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

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# SCHEDULE 1 Appendix A Determination Of FG&E's Local Network Point-To-Point Formula Rate For Local Scheduling, System Control And Dispatch Service

FG&E's Formula Rate for Point-To-Point Local Scheduling, System Control and Dispatch Service ("Formula Rate") is an annual rate determined from the following formula.

FORMULA RATE<sub>i</sub> =  $A_{i-1}$  -  $B_{i-1}$ 

 $C_{i-1}$ 

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

•  $A_{i-1}$  is the Annual Control Center Expenses (expressed in dollars) of FG&E for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule 1.

•  $B_{i-1}$  is the actual local scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual local scheduling and dispatch revenues shall be those recorded on the books of FG&E in FERC Account No. 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

•  $C_{i-1}$  is the single annual coincident peak transmission load (expressed in kilowatts) of FG&E for the calendar year prior to the Service Year, as reported in FERC Form No. 1.

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Schedule 1 Appendix A Exhibit 1

# **Determination of Annual Control Center Expenses**

The rate formula for determination of the annual control center expenses revenue requirements for FG&E is determined as follows:

A. ANNUAL CONTROL CENTER EXPENSES = Sum of FG&E's (Account 556 System Control and Load Dispatching Expense) + (Account 557 Other Expense) X .50\* for the calendar year prior to the Service Year.

\* This factor reflects allocation to the transmission function of a portion (50 percent) of the costs recorded in Accounts 556 and 557 associated with dispatching transmission and generating facilities. This 50 percent allocation of control center costs is based on two functions performed by the control center (i) control of generation and (ii) control of transmission.

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# SCHEDULE 1 Appendix B

# Determination of FG&E's Network Formula Requirements For Local Scheduling, System Control And Dispatch Service

FG&E's formula requirements for Network Local Scheduling, System Control and Dispatch Service is determined from the following formula.

 $Formula Requirements_i = A_{i-1} - B_{i-1}$ 

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

•  $A_{i-1}$  is the Annual Control Center Expenses (expressed in dollars) of FG&E for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to Appendix A of Schedule 1.

•  $B_{i-1}$  is the actual local scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual local scheduling, system control and dispatch revenues shall be those recorded on the books of FG&E in FERC Account No. 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

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# SCHEDULE 1

# Appendix C

# Determination Of FG&E's Formula Rate For Generation Scheduling, System Control And Dispatch Service

FG&E's Formula Rate for Generation Scheduling, System Control and Dispatch Service ("Formula Rate") shall be calculated using the Formula Rate for Point-to-Point Local Scheduling, System Control and Dispatch Service in Appendix A of Schedule 21 - FG&E.

{W4603078.2}

### SCHEDULE 7

#### Long-Term Firm Local and Short-Term Firm Local Point-to-Point Service

The Transmission Customer shall compensate FG&E each month for firm Reserved Capacity at the sum of the applicable charges set forth below:

### 1) Yearly delivery:

The Yearly Delivery Charge per kW shall be FG&E's Annual Transmission Revenue Requirement (determined in accordance with Attachment H of this Tariff) divided by FG&E's Total Peak Load for the corresponding calendar year. Total Peak Load, calculated based on the monthly average for the year, shall be FG&E's peak load, minus the coincident peak of all firm local point-to-point customers, plus the contract demand reservation for firm local point-to-point customers.

## 2) Monthly delivery:

The Monthly Delivery Charge per kW shall be determined by dividing the Yearly Delivery Charge by 12.

### 3) Weekly delivery:

The Weekly Delivery Charge per kW shall be determined by dividing the Yearly Delivery Charge by 52.

# 4) Daily delivery:

The Daily Delivery Charge per kW shall be determined by dividing the Yearly Delivery Charge by 365.

The total delivery charge in any week, pursuant to a reservation for daily delivery, shall not exceed the Weekly Delivery Charge specified in section (3) above times the highest amount in kilowatts of firm Reserved Capacity in any day during such week.

5) **Discounts**: Three principal requirements apply to discounts for transmission service as follows (1) any offer of a discount made by FG&E must be announced to all Eligible Customers solely by posting on Unitil.com, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on Unitil.com, and (3) once a discount is negotiated, details must be immediately posted on Unitil.com. For any discount agreed upon for service on a path from point(s) of receipt to point(s) of delivery, FG&E must offer the same

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discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on FG&E's Local Network.

6) **Resales**: The rates and rules governing charges and discounts stated above shall not apply to resales of transmission service, compensation for which shall be governed by section I.11 (a) of Schedule 21 of the OATT.

{W4603078.2}

# SCHEDULE 8

### Non-Firm Local Point-to-Point Service

The Transmission Customer shall compensate FG&E for non-firm Local Point-To-Point Service for non-firm Reserved Capacity up to the sum of the applicable charges set forth below:

## 1) Monthly delivery:

The Monthly Delivery Charge shall be determined by multiplying the Monthly Delivery Charge as described on Schedule 7 by .75.

# 2) Weekly delivery:

The Weekly Delivery Charge shall be determined by multiplying the Weekly Delivery Charge as described on Schedule 7 by .75.

# 3) Daily delivery:

The Daily Delivery Charge shall be determined by multiplying the Daily Delivery Charge as described on Schedule 7 by .75.

The total delivery charge in any week, pursuant to a reservation for Daily delivery, shall not exceed the Weekly Delivery Charge specified in section (2) above times the highest amount in kilowatts of non-firm Reserved Capacity in any day during such week.

4) **Hourly delivery**: The basic charge shall be that agreed upon by the Parties at the time this service is reserved and in no event shall exceed the Daily Delivery Charge specified in section (3) above divided by 24. The total delivery charge in any day, pursuant to a reservation for Hourly delivery, shall not exceed the Daily Delivery Charge specified in section (3) above times the highest amount in kilowatts of non-firm Reserved Capacity in any hour during such day. In addition, the total delivery charge in any week, pursuant to a reservation for Hourly or Daily delivery, shall not exceed the Weekly Delivery Charge specified in section (2) above times the highest amount in kilowatts of non-firm Reserved Capacity in any hour during such amount in kilowatts of non-firm Reserved Capacity in section (2) above times the highest amount in kilowatts of non-firm Reserved Capacity in any hour during such week.

5) **Discounts**: Three principal requirements apply to discounts for transmission service as follows (1) any offer of a discount made by FG&E must be announced to all Eligible Customers solely by posting on Unitil.com, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on Unitil.com, and (3) once a

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discount is negotiated, details must be immediately posted on Unitil.com. For any discount agreed upon for service on a path from point(s) of receipt to point(s) of delivery, FG&E must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on FG&E's Local Network.

6) **Resales:** The rates and rules governing charges and discounts stated above shall not apply to resales of transmission service, compensation for which shall be governed by section I.11 (a) of Schedule 21 of the OATT.

# **SCHEDULE 9**

# DISTRIBUTION ADDER UNDER TARIFF

In the case where distribution facilities of FG&E are employed in providing service under Schedule 21 of the OATT, the Transmission Customer shall compensate FG&E for the use of such facilities. In addition to the charges contained in this Tariff, the compensation for such distribution facilities will be determined on a case-by-case basis.

All such charges shall be subject to appropriate regulatory approval.

{W4603078.2}

# ATTACHMENT C

#### Methodology To Assess Available Transfer Capability

## 1. Introduction

ISO is the regional transmission organization (RTO) for the New England Control Area. The New England Control Area includes the transmission system located in the states of Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island, and Vermont, but does not include the transmission system in northern Maine (i.e., Aroostook and parts of Penobscot and Washington Counties) that is radially connected to New Brunswick and administered by the Northern Maine Independent System Administrator. The New England Control Area is comprised of PTF, non-PTF, OTF, MTF, and is interconnected to three neighboring Balancing Authority Areas ("BAA") with various interface types.

As part of its RTO responsibilities, the ISO is registered with the North American Electric Reliability Corporation ("NERC") as several functional model entities that have responsibilities related to the calculation of ATC as defined in the following NERC Standards: MOD-001 – Available Transmission System Capability ("MOD-001"). MOD-004 – Capacity Benefit Margin ("MOD-004"), and MOD-008 – Transmission Reliability Margin Calculation Methodology ("MOD-008"). The extent of those responsibilities is based on various Commission approved transmission operating agreements and the provisions of the ISO New England Operating Documents.

While the ISO is the Transmission Service Provider for regional transmission service ("Regional Transmission Service") associated with Pool Transmission Facilities, the Participating Transmission Owners ("PTOS") provide local transmission service over Non-Pool Transmission Facilities within the RTOP footprint and are responsible for calculating TTC and ATC associated with Local Transmission Service provided under Schedule 21 pursuant to the Transmission Operating Agreement ("TOA"). Pursuant to CFR § 37.6(b)<sup>2</sup> of the FERC Regulations, Transmission Provider's are obligated to calculate and post TTC and ATC for each Posted Path. The ISO is not responsible for the calculation of these values.

Posted Path is defined as any control area to control area interconnection; any path for which service is

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<sup>2</sup> Section §37.6(b) Posting transfer capability. The available transfer capability on the Transmission Provider's system (ATC) and the total transfer capability (TTC) of that system shall be calculated and posted for each Posted Path as set out in this section.

denied, curtailed or interrupted for more than 24 hours in the past 12 months; and any path for which a customer requests to have ATC or TTC posted. For this last category, the posting must continue for 180 days and thereafter until 180 days have elapsed from the most recent request for service over the requested path. For purposes of this definition, an hour includes any part of any hour during which service was denied, curtailed or interrupted.<sup>3</sup>

FG&E does not currently have any Posted Paths based on the above definition. However, to the extent that FG&E does in the future have a Posted Path, FG&E will calculate TTC using the NERC Standard MOD-029 – Rated System Path Methodology ("MOD-029") as outlined below.

# 1.1 Scope of Document

The scope of this document is limited to those functions performed by FG&E as the Transmission Service Provider of Schedule 21-FG&E Point-to Point transmission service over Local Facilities pursuant to the PTOs' Transmission Operating Agreement and the ISO OATT:

- Methodology for calculating Total Transfer Capability (TTC)
- Methodology for calculating Available Transfer Capability (ATC)
- Existing Transmission Commitment (ETC)
- Use of Transmission Reliability Margin (TRM)
- Use of Capacity Benefit Margin (CBM)
- Use of Rollover Rights (ROR) in the calculation of ETC

TTC and ATC are required to be calculated only for certain non-PTF internal Posted Paths over which Local Point-to-Point transmission service is provided under Schedule 21-FG&E. TTC and ATC is not calculated by FG&E for Local Network Service because ISO employs a market model for economic, security constrained dispatch of generation, and FG&E does not require advance reservation for such network service.

### 2. Transmission Service in the New England Markets

Since the inception of the OATT for New England, the process by which generation located inside New England supplies energy to the bulk electric system has differed from the Commission pro forma OATT.

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<sup>3</sup> Section § 37.6(b)(1)(i).

The fundamental difference is that internal generation is dispatched in an economic, security constrained manner by the ISO rather than utilizing a system of physical rights, advance reservations and point-to-point transmission service. Through this process, internal generation provides offers that are utilized by the ISO in the Real-Time Energy Market dispatch software. This process provides the least-cost dispatch to satisfy Real-Time load on the system.

In addition to offers from generation within New England, entities may submit External Transactions to move energy into the New England Control Area, out of the New England Control Area or through the New England Control Area. The Real-Time Energy Market clears these External Transactions based on forecast Locational Marginal Pricing (LMPs) and the transfer capability of the associated external interfaces. With those External Transactions in place, the Real-Time Energy Market dispatches internal generation in an economic, security constrained manner to meet Real-Time load within the region.

The process for submitting External Transactions into the Real-Time Energy Market does not require an advance physical reservation for use of the PTF. In the event that the net of the economic External Transactions is greater than the transfer capability of the associated external interface, the External Transactions selected to flow are selected based on the rules specified in the Tariff. For any External Transactions that are confirmed to flow in Real-Time based on the economics of the system, a transmission reservation for RNS or Through or Out Service is created after-the-fact to satisfy the transparency needs of the market.

The process described above is applicable to the PTF within the ISO Area, and non-PTF Local Facilities where utilized for Local Network Service by generation or load. However, FG&E owns Local Facilities over which an advance transmission service reservation for firm or non-firm transmission service may be required. On those Local Facilities, the market participant may obtain a transmission service reservation from FG&E under Schedule 21-FG&E prior to delivery of energy into the Real-Time Energy Market.<sup>4</sup> This document addresses the calculation of ATC and TTC for these non-PTF internal paths.

# 3. Schedule 21-FG&E Total Transfer Capability (TTC)

The TTC on FG&E's non-PTF Local Facilities that require Point-to-Point transmission service reservations are relatively static values and are calculated using the NERC Standard MOD-029 – Rated System Path Methodology. TTC is the amount of electric power that can be moved or transferred reliably from one area to another area of the interconnected transmission systems by way of all transmission lines

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<sup>4</sup> See n - 2, 3 and 6, supra.

(or paths) between those areas under specified system conditions. FG&E calculates TTC according to this definition applying the process as described below.

## 3.1 Guidelines and Principles

When estimating TTC, FG&E will apply the following, as amended and/or adopted from time to time

- · Good Utility Practice
- NERC criteria and guidelines
- ISO New England criteria, rules and reliability standards
- Northeast Power Coordinating Council (NPCC) criteria and guidelines
- Fitchburg Gas and Electric Light Company guides

### 3.2 Transmission System Model Representation

FG&E will estimate TTC using transmission system load flow models developed for FG&E's system. The models may include representations of other neighboring systems. FG&E will use system models that it deems appropriate for study of the request for firm transmission service. Additional system models and operating conditions, including assumptions specific to a particular analysis, may be developed for conditions not available in the library of load flow cases. The system models may be modified, if necessary, to include additional system information on load, transfers and configuration, as it becomes available.

# 3.3 Contingency Analysis

FG&E will perform, if necessary, power flow and transient stability analysis to ensure that the interface's physical limits will not be violated for credible system contingencies per NERC, NPCC and ISO reliability criteria. TTC, based on contingency analysis, is the incremental transfer capability of the transmission system following the loss of the most critical element while maintaining thermal, and stability performance of the system within acceptable regional practices and consistent with guidelines of Item 3.1 of this Attachment.

### 3.4 Posting TTCs

When necessary, FG&E will estimate TTC as outlined above and post on its website.

## 4. Capacity Benefit Margin (CBM)

CBM is defined as the amount of firm transmission transfer capability set aside by a TSP for use by the

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Load Serving Entities. The ISO does not set aside any CBM for use by the Load Serving Entities, because of the New England approach to capacity planning requirements in the ISO New England Operating Documents. Load Serving Entities operating within the New England Control Area are required to arrange for their Capacity Requirements prior to the beginning of any given month in accordance with ISO Tariff, Section III.13.7.3.1 (Calculation of Capacity Requirement and Capacity Load Obligation). Load Serving Entities do not utilize CBM to ensure that their capacity needs are met; therefore, CBM is not applicable within the New England market design. Accordingly, for purposes of ATC calculation, CBM for the New England Control Area is set to zero (0).

### Existing Transmission Commitments, Firm (ETC<sub>F</sub>)

The ETC<sub>F</sub> are those confirmed firm transmission reservations (PTP<sub>F</sub>) plus any rollover rights for firm transmission reservations (ROR<sub>F</sub>) that have been exercised. There are no allowances necessary for Native Load forecast commitments (NL<sub>F</sub>), Network Integration Transmission Service (NITS<sub>F</sub>), grandfathered Transmission Service (GF<sub>F</sub>) and other service(s), contract(s) or agreement(s) (OS<sub>F</sub>) to be considered in the ETC<sub>F</sub> calculation.

#### Existing Transmission Commitments, Non-Firm(ETC<sub>NF</sub>)

The  $(\text{ETC}_{NF})$  are those confirmed non-firm transmission reservations  $(\text{PTP}_{NF})$ . There are no allowances necessary for non-firm Network Integration Transmission Service (NITS<sub>NF</sub>), non-firm grandfathered Transmission Service (GF<sub>NF</sub>) or other service(s), contract(s) or agreement(s) (OS<sub>NF</sub>).

### 5. Transmission Reliability Margin (TRM)

TRM is the amount of transmission transfer capability set aside to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as system conditions change. It is used only for external interfaces under the New England market design. FG&E, under Schedule 21, does not have any external interfaces, and therefore, TRM for FG&E's non-PTF facilities is zero.

#### 6. Calculation of ATC for FG&E's Local Facilities

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# **General Description**

This section defines the ATC calculations performed by FG&E pursuant to MOD-029 for its non-PTF internal interfaces. Consistent with the NERC definition, the equation for Available Transfer Capability is: ATC = (TTC - CBM - TRM - Existing Transmission Commitments + Postbacks + counterflows). As discussed above, the CBM and TRM for the PTF interfaces for which FG&E calculates ATC are zero (0). As consistent with the ISO calculation, the equations for firm and non-firm Available Transfer Capability are:

Firm ATC = (TTC - CBM - TRM - firm ETC)Non-firm ATC =  $(TTC - CBM - TRM - firm and non-firm ETC)^5$ 

As discussed above, the TRM and CBM for FG&E's non-PTF paths are zero. The purpose of the Existing Transmission Commitments ("ETC") component of the ATC equation is for FG&E to reduce the amount of ATC by the amount of existing firm transmission commitments that are not otherwise included in CBM or TRM. There is no requirement to purchase transmission service in advance of flowing energy in Real-Time, and there is no MW amount set aside by FG&E on any interface. One such example is point-to-point service commitments. Point-to-point service commitments sharing common transmission paths would be combined through system modeling to calculate the net existing transmission capacity (ETC) impact. This ETC value is then used in the ATC calculation shown above. Therefore there are no Existing Transmission Commitments to be applied in the ATC equation. For this reason, ETC equals zero (0) for the purposes of ATC calculation. Because Postbacks and counterflows are related to ETC and ETC is zero (0), both Postbacks and counterflows also are equal to zero (0).

As described in Section 2, under Schedule 21-FG&E, FG&E requires the purchase of transmission service in advance of delivery of energy to the New England Wholesale Market over certain non-PTF paths, and those existing transmission commitments would be applied to the ATC equation for the specific posted path. As a practical matter, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

Entities submit their bids and offers to move energy into, out of and through the Energy Market through External Transactions. As Real-Time approaches, the ISO determines which of the submitted External Transactions will be scheduled in the coming hour in accordance with the rules set forth in the ISO New

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<sup>5</sup> Existing Transmission Commitments ("ETC")

England Operating Documents. Basically, the ATC of the non-PTF assets in the New England market is almost always positive. The ATC is equal to the amount of External Transactions that the ISO will schedule on an interface for the designated hour. With this simplified version of ATC, there is no detailed algorithm to be described or posted other than: ATC equals TTC. Thus, for those non-PTF facilities that serve as a path for the FG&E's Schedule 21-FG&E Point-to-Point Transmission Customers, FG&E would post the ATC as 9999, consistent with industry practice. ATC on these paths varies depending on the time of day. However, it would be posted with an ATC of "9999" to reflect the fact that there are no restrictions on these paths for commercial transactions.

# 6.1 Calculation of Schedule 21-FG&E Firm ATC (ATC<sub>F</sub>)

6.1.1 Calculation of ATC<sub>F</sub> in the Planning Horizon (PH)

For purposes of this Attachment C, PH is any period before the Operating Horizon.

Consistent with the NERC definition,  $ATC_F$  is the capability for firm transmission reservations that remain after allowing for TRM, CBM,  $ETC_F$ , Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM are zero. Firm Transmission Service under Schedule 21-FG&E that is available in the Planning Horizon (PH) includes: Yearly, Monthly, Weekly, and Daily. Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-FG&E transmission reservations are not considered in the ATC calculation. Therefore,  $ATC_F$  in the PH is equal to the TTC minus  $ETC_F$ 

6.1.2 Calculation of ATC<sub>F</sub> in the Schedule 21-FG&E Operating Horizon (OH)

For purposes of this Attachment C, OH is noon eastern prevailing time each day. At that time, the OH spans from noon through midnight of the next day for a total of 36 hours. As time progresses the total hours remaining in the OH decreases until noon the following day when the OH is once again reset to 36 hours.

Consistent with the NERC definition,  $ATC_F$  is the capability for firm transmission reservations that remain after allowing for  $ETC_F$ , CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM is zero. Daily firm Transmission Service under Schedule 21-FG&E

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is the only firm service offered in the Operating Horizon (OH). Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-FG&E transmission reservations are not considered in the  $ATC_F$  calculation. Therefore,  $ATC_F$  in the OH is equal to the TTC minus ETC<sub>F</sub>.

**6.1.3** Because firm Schedule 21-FG&E transmission service is not offered in the Scheduling Horizon (SH):  $ATC_F$  in the SH is zero.

6.2 Calculation of Schedule 21-FG&E Non-Firm ATC (ATC<sub>NF</sub>)

 $\textbf{6.2.1} \quad \text{Calculation of ATC}_{\text{NF}} \text{ in the PH}$ 

 $\text{ATC}_{NF}$  is the capability for non-firm transmission reservations that remain after allowing for ETC <sub>F</sub>,  $\text{ETC}_{NF}$ , scheduled CBM (CBM<sub>S</sub>), unreleased TRM (TRM<sub>U</sub>), non-firm Postbacks (Postbacks<sub>NF</sub>) and non-firm counterflows (counterflows<sub>NF</sub>).

As discussed above, the TRM and CBM for Schedule 21-FG&E are zero. Non-firm ATC available in the PH includes: Monthly, Weekly, Daily and Hourly. TRM  $_{\rm U}$ , Postbacks<sub>NF</sub> and counterflows<sub>NF</sub> of Schedule 21-FG&E transmission reservations are not considered in this calculation. Therefore, ATC<sub>NF</sub> in the PH is equal to the TTC minus ETC<sub>F</sub> and ETC<sub>NF</sub>.

 $6.2.2 \quad \text{Calculation of ATC}_{\text{NF}} \text{ in the OH}$ 

ATC<sub>NF</sub> available in the OH includes: Daily and Hourly.

As discussed above TRM and CBM for Schedule 21-FG&E are zero. TRM<sub>U</sub>, counterflows and ETC<sub>NF</sub> are not considered in this calculation. Therefore, ATC<sub>NF</sub> in the OH is equal to the TTC minus ETC<sub>F</sub>, plus postbacks of PTP<sub>F</sub> in OH as PTP<sub>NF</sub> (Postbacks <sub>NF</sub>).

6.3 Negative ATC

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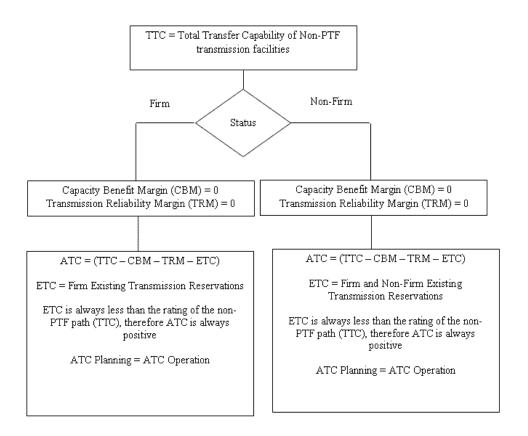
As stated above, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

As stated above, FG&E's non-PTF facilities are primarily radial paths that provide transmission service to directly interconnected generators. It is possible, in the future, that a particular radial path may interconnect more nameplate capacity generation than the path's TTC. However, due to the ISO's security constrained dispatch methodology, the ISO will only dispatch an amount of generation interconnected to such path so as not to incur a reliability or stability violation on the subject path. Therefore, ATC in the PH, OH and SH may become zero, but will not become negative.

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# ATC Process Flow Diagram for Non-PTF Interfaces

The process flow diagram illustrates the steps through which ATC is calculated both on an operating and planning horizon.



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# 7. Posting of Schedule 21-FG&E ATC

# 7.1 Location of ATC Posting.

When necessary, FG&E will estimate ATC values for these internal paths as outlined above and post on its website, http://www.unitil.net/nepool/ma/pdf/atc\_cbm\_ttc\_trm\_fge.pdf.

# 7.2 Updates To ATC

When any of the variables in the ATC equations change, the ATC values are recalculated and immediately posted.

# 7.3 Coordination of ATC Calculations

Schedule 21-FG&E non-PTF has no external interfaces. Therefore it is not necessary to coordinate the values.

# 7.4 Mathematical Algorithms

A link to the actual mathematical algorithm for the calculation of ATC for FG&E's non-PTF internal interfaces is located at http://www.unitil.com/sites/default/files/pdfs/fge\_atc\_algorithms\_3\_11.pdf.

# ATTACHMENT D

#### Methodology for Completing a System Impact Study

FG&E will perform System Impact Studies for the purpose of determining the feasibility of integrating Network Load and Network Resources into FG&E's Local Network under Schedule 21 of the OATT, or for the purpose of determining the feasibility of providing Local Point-To-Point Service under this Tariff. All System Impact Studies will be completed using the same method employed by FG&E to integrate into FG&E's Local Network (i) generation resources owned or acquired to serve its Native Load Customers, and (ii) its Native Load Customers' load. Specifically, System Impact Studies will be performed by applying the applicable criteria, rules, standards and operating procedures. In addition to applying the applicable criteria, rules, standards and operating procedures, to determine the feasibility of providing service to Network Load and/or Local Point-To-Point Service, System Impact Studies will also be performed by applying Unitil Service Corp.'s "Electric System Planning Guide".

# ATTACHMENT E

# Index Of Local Point-To-Point Service Customers

<u>Customer</u> Fitchburg Gas and Electric Light Company Date of <u>Service Agreement</u> September 10, 1996

Pinetree Power Fitchburg Inc.

March 9, 1999

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# ATTACHMENT H

#### Annual Transmission Revenue Requirement For Local Network Service

The Transmission Revenue Requirement for FG&E will reflect FG&E's costs with respect to transmission facilities not related to PTF ("Non PTF"). Except as provided below for the transitional implementation of this formula rate, the Transmission Revenue Requirement will be an annual calculation, effective June 1, based on the previous year's calendar data as reported in FG&E's FERC Form 1 report for that year, or other reasonable documentation, using end-of-year balances for each rate base item, as set forth below. The initial Transmission Revenue Requirement shall be effective October 1, 2003 through May 31, 2004 based on calendar year 2002 data as adjusted, as approved by the Commission. Further, the Transmission Revenue Requirement to be effective June 1, 2004, based on calendar year 2003 data, shall include an adjustment to annualize the impact on 2003 depreciation expense of revised depreciation rates effective October 1, 2003, as approved by the Commission. Depreciation expense shall be calculated according to Appendix A of this attachment, as approved by the Commission.

Beginning July 31, 2004, FG&E shall make an annual informational filing on or before July 31 of each year showing the Transmission Revenue Requirement in effect for the period beginning June 1 of that year through May 31 of the subsequent year. If there are corrections made to the information reflected in the informational filing after it has been submitted, FG&E will file corrections to the informational filing.

# I. FORMULA

A. The Transmission Revenue Requirement for FG&E's Non-PTF shall equal the sum of the following: (A) Non-PTF Return and Associated Income Taxes, plus (B) Non-PTF Depreciation Expense, plus (C) Non-PTF Amortization of Intangible Plant and Other Regulatory Assets/Liabilities, plus (D) Non-PTF Amortization of Rate Case Expense, plus (E) Non-PTF Amortization of Loss on Reacquired Debt, minus (F) Non-PTF Amortization of Investment Tax Credits, plus (G) Non-PTF Property Tax Expense, plus (H) Non-PTF Payroll Tax Expense, plus (I) Non-PTF Transmission Operation and Maintenance Expense, plus (J) Non-PTF Customer Accounting Bad Debts Expense, plus (K) Non-PTF Administrative and General Expense, plus (L) Non-PTF Transmission Related Taxes and Fees Charge, minus (M) Non-PTF Transmission Rents Received from Electric Property, minus (N) Non-PTF Revenue for Through or Out Service.

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B. Each of the components of A. above shall be calculated by subtracting the related PTF costs and revenues from the same calendar year, as included in ISO-NE's OATT, from the total transmission costs and revenues as described in Section III. Support Expense included in PTF shall only be included in this computation to the extent these costs are included in the determination of total transmission costs.

II. DEFINITIONS

# A. ALLOCATION FACTORS

1. <u>Transmission Wages and Salaries Allocation Factor</u> shall equal the ratio of Transmission–related direct wages and salaries to FG&E's total direct wages and salaries, excluding administrative and general wages and salaries.

2. <u>Transmission Plant Allocation Factor</u> shall equal the ratio of the sum of (1) Transmission Plant, (2) Transmission Related Intangible Plant, (3) Transmission Related General Plant, and (4) Transmission Related Common Plant, to Total Plant in Service.

3. <u>Transmission Revenue Allocation Factor</u> shall equal the ratio of Total Internal Transmission Revenue to Total Billed Revenue from Sales to Ultimate Customers.

# B. TERMS

Administrative and General Expense shall equal FG&E's expenses as recorded in FERC Account Nos. 920-935, excluding FERC Account Nos. 924, 928 and 930.1.

<u>Amortization of Intangible Plant and Common Plant</u> shall equal FG&E's expenses related to Intangible Plant and Common Plant as recorded in FERC Account No. 404.

<u>Amortization of Investment Tax Credits</u> shall equal FG&E's credits as recorded in FERC Account No. 411.4.

<u>Amortization of Loss on Reacquired Debt</u> shall equal FG&E's expenses as recorded in FERC Account No. 428.1.

<u>Amortization of Other Regulatory Assets/Liabilities-FAS 109</u> shall equal FG&E's expenses related to Other Regulatory Assets/Liabilities–FAS 109 as recorded in FERC Account No. 407.

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<u>Amortization of Rate Case Expenses</u> shall equal FG&E's expenses related to the deferred costs of regulatory rate proceedings related to transmission service as approved by FERC and as recorded in FERC Account No. 407.

<u>Common Plant</u> shall equal FG&E's gross balance of the plant common to both electric and gas operations as recorded in FERC Account Nos. 303, 310, 389-399, excluding capital leases.

<u>Common Plant Amortization Reserve</u> shall equal FG&E's Common Plant reserve balances as recorded in FERC Account No. 111.

<u>Common Plant Depreciation Expense</u> shall equal FG&E's Common Plant expenses as recorded in FERC Account No. 403.

<u>Common Plant Depreciation Reserv</u>e shall equal FG&E's Common Plant reserve balance as recorded in FERC Account No. 108.

<u>Customer Accounting Bad Debts Expense</u> shall equal FG&E's expenses as recorded in FERC Account No. 904.

General Plant shall equal FG&E's gross plant balance as recorded in FERC Account Nos. 389-399.

<u>General Plant Depreciation Expense</u> shall equal FG&E's General Plant expenses as recorded in FERC Account No. 403.

<u>General Plant Depreciation Reserve</u> shall equal FG&E's General Plant reserve balance as recorded in FERC Account No. 108.

<u>Intangible Plant</u> shall equal FG&E's gross plant balance as recorded in FERC Account No. 303 (consisting of investments in computer systems and software).

Intangible Plant Amortization Reserve shall equal FG&E's Intangible Plant reserve balance as recorded in FERC Account No. 111.

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<u>Other Regulatory Assets/Liabilities–FAS 106</u> shall equal the net of FG&E's FAS 106 balance as recorded in FERC Account No. 182.3 and any FAS 106 balance as recorded in FG&E's FERC Account No. 254.

<u>Other Regulatory Assets/Liabilities–FAS 109</u> shall equal the net of FG&E's FAS 109 balance as recorded in FERC Account No. 182.3 and any FAS 109 balance as recorded in FG&E's FERC Account No. 254.

<u>Payroll Tax Expense</u> shall equal those payroll tax expenses as recorded in FG&E's FERC Account Nos. 408.1 and 409.1.

Plant Held for Future Use shall equal FG&E's balance in FERC Account No. 105.

<u>Prepayments</u> shall equal FG&E's electric prepayment balance as recorded in FERC Account No. 165. The electric portion shall be determined by multiplying the balance in FERC Account No. 165 by the ratio of electric utility plant to total utility plant as reported in FG&E's FERC Form 1.

Property Insurance Expense shall equal FG&E's expenses as recorded in FERC Account No. 924.

<u>Property Tax Expense</u> shall equal FG&E's property tax expenses as recorded in FERC Account Nos. 408.1 and 409.1.

Support Expense shall equal Transmission Support Expense as defined in the OATT Attachment F.

<u>Total Accumulated Deferred Income Taxes</u> shall equal the net of the deferred tax balances as recorded in FERC Account Nos. 281-283 and FERC Account No. 190.

<u>Total Billed Revenue from Sales to Ultimate Customers</u> shall equal FG&E's total electric service revenues as recorded in FERC Account Nos. 440, 442, 444, 445, 446, 448, and 449.

<u>Total Internal Transmission Revenue</u> shall equal FG&E's internal transmission revenues as recorded in FERC Account Nos. 440, 442, 444, 445, 446, 448 and 449.

Total Loss on Reacquired Debt shall equal FG&E's expenses as recorded in FERC Account No. 189.

Total Plant in Service shall equal FG&E's total electric gross plant balance as recorded in FERC Account

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Nos. 301-399 (inclusive of electric Common Plant).

<u>Transmission Operation and Maintenance Expense</u> shall equal FG&E's electric expenses as recorded in FERC Account Nos. 560-564 and 566-576.5 and shall exclude expenses already included in PTF Transmission Support Expense, costs billed to Select Energy, Inc. under a generation related entitlement sales agreement and Account Nos. 561.4 and 575.7.

<u>Transmission Plant</u> shall equal FG&E's gross plant balance as recorded in FERC Account Nos. 350-359 excluding joint owned unit costs.

<u>Transmission Plant Depreciation Expense</u> shall equal FG&E's Transmission Plant expenses as recorded in FERC Account No. 403 less joint owned unit costs.

<u>Transmission Plant Depreciation Reserve</u> shall equal FG&E's Transmission Plant reserve balance as recorded in FERC Account 108 less joint owned unit reserves.

<u>Transmission Plant Held for Future Use</u> shall equal the transmission-related balance of electric Plant Held for Future Use.

<u>Transmission Plant Materials and Supplies</u> shall equal FG&E's balance as assigned to transmission, as recorded in FERC Account No. 154.

<u>Transmission Prepayments</u> shall equal FG&E's Prepayments multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Accumulated Deferred Income Taxes</u> shall equal FG&E's electric balance of Total Accumulated Deferred Income Taxes multiplied by the Transmission Plant Allocation Factor.

Transmission Related Administrative and General Expense shall equal the sum of (1) electric Administrative and General Expenses multiplied by the Transmission Wages and Salaries Allocation Factor, plus (2) electric Property Insurance Expense reduced by amounts billed to Select Energy Inc. under a generation related entitlement sales agreement and multiplied by the Transmission Plant Allocation Factor, plus (3) electric expenses included in FERC Account No. 928 related to FERC fees and assessments, plus (4) any other electric transmission related expenses included in FERC Account No. 928

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plus (5) specific electric transmission related expenses included in FERC Account No. 930.1 and minus (6) any Administrative and General Expense amounts billed to Select Energy Inc. and not already deducted elsewhere, multiplied by the Transmission Wages and Salaries Allocation Factor.

Transmission Related Amortization of Intangible Plant and Other Regulatory Assets/Liabilities shall equal the sum of (1) electric Amortization of Intangible Plant and Common Plant multiplied by the Transmission Wages and Salaries Allocation Factor and (2) electric Amortization of Other Regulatory Assets/Liabilities-FAS 109 multiplied by the Transmission Plant Allocation Factor. This component shall include additional regulatory assets/liabilities as established by regulatory authority and relevant to transmission services.

<u>Transmission Related Amortization of Investment Tax Credits</u> shall equal FG&E's electric Amortization of Investment Tax Credits multiplied by the Transmission Plant Allocation Factor.

<u>Transmission Related Amortization of Loss on Reacquired Debt</u> shall equal FG&E's electric Amortization of Loss on Reacquired Debt multiplied by the Transmission Plant Allocation Factor.

<u>Transmission Related Cash Working Capital</u> shall be 12.5% allowance (45 days/360 days) of the sum of Transmission Operation and Maintenance Expense, plus Transmission Related Customer Accounting Bad Debts Expense and plus Transmission Related Administrative and General Expense.

<u>Transmission Related Common Plant</u> shall equal FG&E's electric Common Plant multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Customer Accounting Bad Debts Expense</u> shall equal FG&E's electric Customer Accounting Bad Debts Expense multiplied by the Transmission Revenue Allocation Factor.

<u>Transmission Related Depreciation & Amortization Reserve</u> shall equal the sum of (1) Transmission Plant Depreciation Reserve plus (2) electric Intangible Plant and electric Common Plant Amortization Reserves multiplied by the Transmission Wages and Salaries Allocation Factor and (3) electric General Plant and electric Common Plant Depreciation Reserves multiplied by the Transmission Wages and Salaries Allocation Factor.

Transmission Related Depreciation Expense shall equal the sum of (1) Transmission Plant Depreciation

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Expense, (2) electric General Plant Depreciation Expense multiplied by the Transmission Wages and Salaries Allocation Factor and (3) electric Common Plant Depreciation Expense multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related General Plant</u> shall equal FG&E's electric General Plant multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Intangible Plant</u> shall equal FG&E's electric Intangible Plant multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Loss on Reacquired Debt</u> shall equal FG&E's electric balance of Total Loss on Reacquired Debt multiplied by the Transmission Plant Allocation Factor.

<u>Transmission Related Other Regulatory Assets/Liabilities</u> shall equal the sum of (1) FG&E's electric balance of Other Regulatory Assets/Liabilities-FAS 106 multiplied by the Transmission Wages and Salaries Allocation Factor, and (2) FG&E's electric balance of Other Regulatory Assets/Liabilities-FAS 109 multiplied by the Transmission Plant Allocation Factor. This component shall include additional regulatory assets/liabilities as established by regulatory authority and relevant to transmission services.

<u>Transmission Related Payroll Tax</u> shall equal FG&E's electric Payroll Tax Expense multiplied by the Transmission Wages and Salaries Allocation Factor.

<u>Transmission Related Property Tax</u> shall equal FG&E's electric Property Tax Expense, reduced by amounts billed to Select Energy, Inc. under a generation related entitlement sales agreement, multiplied by the Transmission Plant Allocation Factor.

## III. CALCULATION OF TRANSMISSION REVENUE REQUIREMENT

This section describes the calculation of the components of the Transmission Revenue Requirement for FG&E's Non-PTF as provided in Section I.

A. <u>Non-PTF Return and Associated Income Taxes</u> shall equal the product of the Total Internal Transmission Investment Base and the Cost of Capital Rate, reduced by the amount recovered as PTF. For purposes of this computation, the PTF amount shall be calculated using the Cost of Capital Rate

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defined in III.A.2 below.

## 1. <u>Total Internal Transmission Investment Base</u>

The Total Internal Transmission Investment Base shall be the sum of the year end balances of the following items as defined in Section II.: (a) Transmission Plant, plus (b) Transmission Related Intangible Plant, plus (c) Transmission Related General Plant, plus (d) Transmission Related Common Plant, plus (e) Transmission Plant Held for Future Use, minus (f) Transmission Related Depreciation & Amortization Reserve, minus (g) Transmission Related Accumulated Deferred Income Taxes, plus (h) Transmission Related Loss on Reacquired Debt, plus (i) Transmission Related Other Regulatory Assets/Liabilities, plus (j) Transmission Prepayments, plus (k) Transmission Plant Materials and Supplies, plus (l) Transmission Related Cash Working Capital.

## 2. <u>Cost of Capital Rate</u>

The Cost of Capital Rate will equal (a) FG&E's Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.

(a) <u>The Weighted Cost of Capital</u> will be calculated based upon the capital structure at the end of each year and will equal the sum of:

- (i) <u>the long-term debt component</u>, which equals the product of the actual weighted average embedded cost to maturity of FG&E's long-term debt then outstanding and the ratio that long-term debt is to FG&E's total capital.
- (ii) <u>the preferred stock component</u>, which equals the product of the actual weighted average embedded cost to maturity of FG&E's preferred stock then outstanding and the ratio that preferred stock is to FG&E's total capital.
- (iii) <u>the return on equity component</u>, which equals the product of the cost of equity of 10.57% and the ratio that common equity is to FG&E's total capital.
- (b) <u>Federal Income Tax</u> shall equal  $\frac{(A+[(C+B)/])x FT}{1-FT}$

Where FT is the Federal Income Tax Rate; A is the sum of the preferred stock component and the return on equity component, as determined in Sections III.A.2.(a)(ii) and (iii) above; B is Transmission Related Amortization of Investment Tax Credits, as defined in Section II above, C is the equity AFUDC

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component of Transmission Related Depreciation Expense, as defined in Section II above, and D is Total Internal Transmission Investment Base, as determined in Section III.A.1., above.

## (c) <u>State Income Tax</u> shall equal

## $\frac{(A+\lceil (C+B)/D\rceil + Federal Income Tax) \times ST}{1-ST}$

Where ST is the State Income Tax Rate; A is the sum of the preferred stock component and return on equity component as determined in Sections III.A.2. (a)(ii) and (iii) above; B is the Transmission Related Amortization of Investment Tax Credits as defined in Section II. above; C is the equity AFUDC component of Transmission Related Depreciation Expense, as defined in Section II above; D is the Total Internal Transmission Investment Base, as determined in Section III.A.1. above; and Federal Income Tax is the rate determined in Section III.A.2.(b) above.

B. <u>Non-PTF Depreciation Expense</u> shall equal FG&E's Transmission Related Depreciation Expense reduced by the amount recovered as PTF.

C. <u>Non-PTF Amortization of Intangible Plant and Other Regulatory Assets/Liabilities</u> shall equal FG&E's Transmission Related Amortization of Intangible Plant and Other Regulatory Assets/Liabilities reduced by the amount recovered as PTF.

D. <u>Non-PTF Amortization of Rate Case Expenses</u> shall equal the Amortization of Rate Case Expenses reduced by the amount recovered as PTF.

E. <u>Non-PTF Amortization of Loss on Reacquired Debt</u> shall equal FG&E's Transmission Related Amortization of Loss on Reacquired Debt reduced by the amount recovered as PTF.

F. <u>Non-PTF Amortization of Investment Tax Credits</u> shall equal FG&E's Transmission Related Amortization of Investment Tax Credits reduced by the amount recovered as PTF.

G. <u>Non-PTF Property Tax Expense</u> shall equal FG&E's Transmission Related Property Tax Expense reduced by the amount recovered as PTF.

H. <u>Non-PTF Payroll Tax Expense</u> shall equal FG&E's Transmission Related Payroll Tax Expense

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reduced by the amount recovered as PTF.

I. <u>Non-PTF Transmission Operation and Maintenance Expense</u> shall equal Transmission Operation and Maintenance Expenses reduced by the amount recovered as PTF.

J. <u>Non-PTF Customer Accounting Bad Debts Expense</u> shall equal the Transmission Related Customer Accounting Bad Debts Expense reduced by the amount recovered as PTF.

K. <u>Non-PTF Administrative and General Expenses</u> shall equal the Transmission Related Administrative and General Expenses reduced by the amount recovered as PTF.

L. <u>Non-PTF Transmission Related Taxes and Fees Charge</u> shall include any fee or assessment imposed by any governmental authority on service provided hereunder which is not specifically identified under any other section. This amount shall be reduced by the amount recovered as PTF.

M. <u>Non-PTF Transmission Rents Received from Electric Property</u> shall equal any amount in FERC Account No. 454, Rents from Electric Property, associated with Transmission Plant. This amount shall be reduced by the amount recovered as PTF.

N. <u>Non-PTF Revenue for Through or Out Service</u> shall equal distributions received by FG&E from ISO out of revenues paid for Through or Out Service (as defined in the OATT), pursuant to Section II.12.2(d) of the Tariff.

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## Appendix A PTF and non-PTF Depreciation Rates

Account		Depreciation Rates (%) Eff. October 1, 2003	Depreciation Rates (%) Eff. January 1, 2011	
Transmission Plant				
351.00 Clearing Land and Rights of Way		y 1.32	1.27	
352.00 Structures and Improvements		1.81	2.29	
353.00 Station Equipment		4.16	4.11	
355.00 Poles and Fixtures		6.48	5.38	
356.00 Overhead Conductors and Devices		s 5.14	3.92	
General Plant				
394.00 Tool	s, Shop and Garage Equipme	ent 2.73	3.11	
395.00 Laboratory Equipment		3.13	4.29	
397.00 Communication Equipment		6.32	10.38	
398.00 Miscellaneous Equipment		4.17	4.75	
Common Plant				
390.00 Structures and Improvements		4.00	3.24	
390.20 Improvements to Leased Service Center		Center 2.89	3.23	
391.00 Office Furniture and Equipment		13.84	3.33	
393.00 Stores Equipment		0.97	2.31	
394.00 Tools, Shop and Garage Equipment		nt 2.91	2.63	
396.00 Power Operated Equipment		4.28	0.90	
397.00 Communication Equipment		9.64	8.76	
398.00 Miscellaneous Equipment		N/A	Fully Depreciated	

## ATTACHMENT I

## Index Of Local Network Service Customers

Customer Date of Service Agreement

Fitchburg Gas and Electric September 10, 1997 Light Company

Massachusetts Bay Transportation April 17, 2000 Company

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## Attachment L

#### **Creditworthiness Policy**

## 1. Introduction

This guide establishes creditworthiness standards for transmission service and/or interconnection service customers ("Customers") entering into new or amended service agreements with Fitchburg Gas and Electric Light Company ("FG&E") under the ISO New England Open Access Transmission Tariff ("ISO-NE OATT").<sup>6</sup> In accordance with the Federal Energy Regulatory Commission's Policy Statement on Credit-Related Issues for Electric OATT Transmission Providers, Independent System Operators and Regional Transmission Organizations ("Policy Statement"), this Creditworthiness Policy is intended to make FG&E's credit-related practices more transparent and comprehensive. The following describes FG&E credit review procedures and the types of security that are acceptable to FG&E to protect against the risk of non-payment.

## 2. Creditworthiness

FG&E will evaluate the creditworthiness of Customers entering into new or amended transmission or interconnection service agreements with FG&E in order to assess a Customer's credit risk relative to the exposure of "Total Outstanding Obligation" as defined in Section 2.1 below, created by the transaction or transactions that FG&E has with the Customer. For purposes of determining the ability of a Customer to meet its obligations, FG&E may require the Customer to submit financial information for the credit review, including credit ratings, credit reports and audited financial statements for the last five years, including audited quarterly reports for the prior two years, if available. Further, the Customer will be expected to provide calculations of the following: Current Total Capitalization Ratio, Including Short-Term Debt; Tangible Net Worth for a period within sixty days of a Customer's request; Earnings Before Interest, Taxes, Depreciation and Amortization for twelve of the last fifteen consecutive months; and additional calculations and other information deemed necessary for the evaluation credit. In completing its evaluation, FG&E may consider other factors including but not limited to past billing history or the characteristics of service being requested.

## 2.1 Total Outstanding Obligation

The Customer's Total Outstanding Obligation to FG&E will be the sum total of the following

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<sup>6</sup> See ISO New England Inc., ISO New England Inc. Transmission, Markets and Services Tariff, Section II. This policy is applicable to transmission or interconnection service agreements established from time-to-time under Schedules 21 - FG&E of the ISO-NE OATT and to individually negotiated agreements for similar transmission or interconnection services.

components:

2.1.1 If the Customer is making payments to FG&E for ongoing expenses (including, but not limited to, O&M expenses related to interconnections or other monthly charges such as monthly transmission charges under Schedule 21 – FG&E) the Customer will be required to provide security pursuant to Section 2.2 below, for four months' worth of the Customer's average payment obligation for such charges.

2.1.2 In accordance with the provisions of the ISO-NE OATT, a Customer will pay a Contribution in Aid of Construction ("CIAC") or transfer ownership of facilities to FG&E for transmission or interconnection facilities that are to be constructed on behalf of a Customer at the Customer's sole expense. If FG&E determines in good faith that the receipt of CIAC payments or property from the Customer are non-taxable, FG&E will require a form of security from the customer pursuant to Section 2.2 below for the amount of the potential tax liability to FG&E that would occur if such facilities were deemed taxable.

2.1.3 In accordance with the provisions of Schedule 21 – FG&E to the ISO-NE OATT, a Customer will pay a formula rate over time for return of and on the cost of capital incurred by FG&E on behalf of a Customer at the Customer's sole expense. The Customer will also be required to provide security pursuant to Section 2.2 below, for the unamortized balance of plant in service reserved for the sole use of the Customer.

## 2.2 Creditworthiness Requirements

A Customer will be considered creditworthy upon satisfying at least one of the following conditions or a combination of those conditions at the time that the customer enters into a transmission or interconnection service agreement and for so long as the Customer maintains satisfaction of at least one of these conditions for any outstanding obligations thereunder:

2.2.1 The Customer maintains a minimum credit rating from Standard & Poor's Long-term Issuer Credit Rating of BBB- or better or Moody's Investors Service Long-term Issuer Credit Rating of Baa3 or better so long as the Customer's Total Outstanding Obligation plus any other unsecured obligations with FG&E does not exceed the Credit Limits discussed in Section 4 below. When FG&E reviews a Customer's rating from two or more rating agencies and a split rating is present, the lower debt rating will apply. In the event that the Customer has no rating

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from either Standard & Poor's or Moody's Investors Service, a rating from Fitch may also be used with acceptable ratings equivalent to those from either Standard and Poor's or Moody's Investors Service. If unrated, the Customer's financial statements will be reviewed to determine an equivalent rating based on the Customer's unsecured credit limits and/or financial statements.

If, at any time, the Customer's rating falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify FG&E within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to FG&E, as described in this Section 2.2.

2.2.2 The Customer provides and maintains in effect during the term of and until full and final payment and performance of the service agreement an unconditional and irrevocable standby letter of credit for the Total Outstanding Obligation in the form and substance and issued by a bank reasonably acceptable to FG&E. A draft, acceptable form letter of credit is attached. Any such bank must satisfy the creditworthiness criteria described in 2.2.1 above.

If, at any time, the bank's rating falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify FG&E within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to FG&E, as described in this Section 2.2.

2.2.3 If the Customer's parent or an affiliate company satisfies the creditworthiness criteria described in 2.2.1 above and, subject to the Credit Limits stated in Section 4 below, such company submits to FG&E and maintains in effect a letter of guaranty reasonably acceptable to FG&E as to amount, form and substance for the term of and until full and final payment and performance of the service agreement.

If, at any time, the credit rating of the Customer's parent or affiliate providing the guaranty falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify FG&E within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to FG&E, as described in this Section 2.

2.2.4 The Customer makes an advance payment to FG&E in immediately available funds for

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the Total Outstanding Obligation.

## 3. Customer Costs Requiring Prepayment

In accordance with the provisions of the ISO-NE OATT, a Customer will pay a Contribution in Aid of Construction ("CIAC") for transmission or interconnection facilities to be constructed by FG&E on behalf of a Customer at the Customer's sole expense. The Customer will have the option to (i) prepay the CIAC in immediately available funds to FG&E, or (ii) make periodic CIAC progress payments, as defined in the Customer's service agreement, to prepay in increments capital costs scheduled to be incurred by FG&E. If FG&E determines in good faith that such payments or property transfers made by the Customer should be reported as income subject to taxation, the Customer shall also prepay all costs associated with the cost consequences of the current tax liability imposed on FG&E by those facilities (the "Tax Gross- up").

## 4. Determination of Credit Limits

FG&E reserves the right to limit the total amount of unsecured credit extended to a Customer under 2.2.1 and 2.2.3 above such that the sum of all unsecured credit that such Customer has with FG&E, including the Total Outstanding Obligation, shall not exceed the Credit Limits defined below. Such limitations are based on an assessment of the Customer's or its Guarantor's credit rating and the net worth of the Customer's or its Guarantor's assets.

	Unsecured Credit Limit as Percent	
Standard and Poor's (or	of Customer's or Guarantor's	
Equivalent) Rating	Tangible Net Worth	
A and above	1.0%	
A-	0.5%	
BBB+	0.3%	
BBB	0.2%	
BBB-	0.1%	

Once FG&E has evaluated or reevaluated and determined the maximum Credit limits for each Customer, it will inform the prospective Customer of the amount of such credit limits. A customer may request in writing a reevaluation of the maximum Credit limits, within 14 days from the date that they were informed by FG&E of such limits. Justification for such a reevaluation should be contained in the request. All requests for reevaluation must be submitted directly to the FG&E Contract Administrator.

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From time to time, principally due to unknown factors such as changing market, economic, banking or other financial conditions, but not solely limited to these factors, FG&E may find it necessary to modify or amend its creditworthiness policies and guidelines after a 15 day notice period and require that present and future Transmission Customers fulfill any additional conditions contained in the modified Creditworthiness Guide. Transmission Customers will have 30 days after the notice period to cure any deficiency.

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## FORM LETTER OF CREDIT

\_\_\_\_\_Bank

(address)

## IRREVOCABLE STANDBY LETTER OF CREDIT

DATE: \_\_\_\_\_\_ AMOUNT U.S. \$\_\_\_\_\_

## FOR INTERNAL IDENTIFICATION PURPOSES ONLY

\_\_\_\_\_

\_\_\_\_

\_ \_

\_\_\_\_\_

Our Number:

Beneficiary:

Applicant:

Attn: At the request of:

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Ref:\_\_\_

LADIES AND GENTLEMEN;

WE HEREBY ESTABLISH THIS IRREVOCABLE, AND UNCONDITIONAL, EXCEPT AS STATED HEREIN, LETTER OF CREDIT NUMBER \_\_\_\_\_\_ (LETTER OF CREDIT), BY ORDER OF, FOR THE ACCOUNT OF, AND ON BEHALF OF [CUSTOMER NAME] (ACCOUNT PARTY) IN FAVOR OF FITCHBURG GAS AND ELECTRIC LIGHT COMPANY (BENEFICIARY) FOR DRAWINGS, IN ONE OF MORE DRAFTS, UP TO AN AGGREGATE AMOUNT NOT EXCEEDING U.S. \$\_\_\_\_\_\_ EFFECTIVE IMMEDIATELY. THE TERM 'BENEFICIARY' INCLUDES ANY SUCCESSOR OF THE NAMED BENEFICIARY.

THIS LETTER OF CREDIT CANNOT BE AMENDED, MODIFIED OR REVOKED WITHOUT THE PRIOR WRITTEN CONSENT OF BOTH THE BANK AND THE BENEFICIARY. THE BENEFICIARY SHALL NOT BE DEEMED TO HAVE WAIVED ANY RIGHTS UNDER THIS LETTER OF CREDIT, UNLESS AN OFFICER OF THE BENEFICIARY SHALL HAVE SIGNED A WRITTEN WAIVER EXPRESSLY REFERENCING THE RIGHT TO BE WAIVED. NO SUCH WAIVER SHALL BE EFFECTIVE AS TO ANY TRANSACTION THAT OCCURS SUBSEQUENT TO THE DATE OF THE WAIVER, NOT AS TO ANY CONTINUANCE OF A BREACH AFTER THE WAIVER.

WE HEREBY UNDERTAKE TO PROMPTLY HONOR YOUR DRAFT(S) DRAWN ON US, INDICATING OUR LETTER OF CREDIT NUMBER \_\_\_\_\_\_ IS ISSUED, PRESENTABLE AND PAYABLE AND WE GUARANTY TO THE DRAWERS, ENDORSERS, AND BONA FIDE HOLDERS OF THIS LETTER OF CREDIT, THAT DRAFTS UNDER AND IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT WILL BE HONORED. THIS LETTER OF CREDIT MAY NOT BE TRANSFERRED OR ASSIGNED BY US.

SUBJECT TO THE EXPRESS TERMS AND CONDITIONS HEREIN, FUNDS UNDER THIS LETTER OF CREDIT ARE AVAILABLE TO YOU BY PRESENTATION AT OUR OFFICES LOCATED AT [\_\_\_\_\_] OF BENEFICIARY'S DRAWING CERTIFICATE ISSUED SUBSTANTIALLY IN THE FORM OF ANNEX 1 ATTACHED HERETO AND WHICH FORMS AN INTEGRAL PART HEREOF, DULY COMPLETED AND PURPORTEDLY BEARING THE ORIGINAL SIGNATURE OF AN OFFICER OF THE BENEFICIARY. PRRESENTATION OF ANY

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DRAWING CERTIFICATE UNDER THIS LETTER OF CREDIT MAY BE MADE IN PERSON TO US OR MAY BE SENT TO US BY TELEX TO [\_\_\_\_\_] OR BY FACSIMILE TRANSMISSION TO FACSIMILE TELEPHONE NUMBER [\_\_\_\_].

ALL COMMISSIONS AND CHARGES WILL BE BORNE BY THE ACCOUNT PARTY. IF DOCUMENTS, IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT, ARE RECEIVED BEFORE 10:00 AM (EASTERN TIME) ON A BUSINESS DAY, PAYMENT WILL BE EFFECTED ON OR BEFORE 5:00 PM (EASTERN TIME) ON THE NEXT BUSINESS DAY. IF DOCUMENTS, IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT ARE RECEIVED AFTER 10:00 AM ON A BUSINESS DAY, PAYMENT WILL BE EFFECTED ON OR BEFORE 5:00 PM ON THE SECOND BUSINESS DAY FOLLOWING SUCH DATE OF RECEIPT.

EXCEPT AS EXPRESSLY STATED HEREIN, THIS UNDERTAKING IS NOT SUBJECT TO ANY AGREEMENT, CONDITION OR QUALIFICATION. THIS LETTER OF CREDIT DOES NOT INCORPORATE, AND SHALL NOT BE DEEMED MODIFIED OR AMENDED BY REFERENCE TO ANY DOCUMENT, INSTRUMENT OR AGREEMENT (A) THAT IS REFERRED TO HEREIN (EXCEPT FOR THE UNIFORM CUSTOMS, AS DEFINED BELOW), OR (B) IN WHICH THIS LETTER OF CREDIT IS REFERRED TO OR TO WHICH THIS LETTER OF CREDIT RELATES.

OUR OBLIGATION UNDER THIS LETTER OF CREDIT SHALL BE OUR INDIVIDUAL OBLIGATION AND IS IN NO WAY CONTINGENT UPON THE REIMBURSEMENT WITH RESPECT THERETO, OR UPON OUR ABILITY TO PERFECT ANY LIEN, SECURITY INTEREST OR ANY OTHER REIMBURSEMENT.

THIS LETTER OF CREDIT EXPIRES WITH OUR CLOSE OF BUSINESS ON [364 days from effective date]; HOWEVER, IT IS A CONDITION OF THIS LETTER OF CREDIT THAT IT SHALL BE DEEMED AUTOMATICALLY EXTENDED WITHOUT AMENDMENT FOR 364 DAYS FROM THE PRESENT OR ANY FUTURE EXPIRATION DATE HEREOF, UNLESS AT LEAST SIXTY (60) DAYS BEFORE ANY SUCH EXPIRATION DATE WE NOTIFY YOU BY REGISTERED MAIL ADDRESSED TO: [address of beneficiary, ATTN: \_\_\_\_\_], THAT WE ELECT NOT TO RENEW THIS LETTER FOR SUCH ADDITIONAL PERIOD.

THIS LETTER OF CREDIT IS SUBJECT TO THE UNIFORM CUSTOMS AND PRACTICE FOR DOCUMENTARY CREDITS (1993 REVISION) INTERNATIONAL CHAMBER OF COMMERCE,

{W4603078.2}

PUBLICATION NO. 500. IF THIS LETTER OF CREDIT EXPIRES DURING THE INTERRUPTION OF BUSINESS AS DESCRIBED IN ARTICLE 17 THEREOF WE HEREBY SPECIFICALLY AGREE TO EFFECT PAYMENT IF THE LETTER OF CREDIT IS DRAWN AGAINST WITHIN 30 DAYS AFTER THE RESUMPTION OF BUSINESS.

{W4603078.2}

# ANNEX 1 TO [BANKNAME] IRREVOCABLE LETTER OF CREDIT NO.

[INSERT DATE]

[BANK NAME] [ATTENTION] [BANK ADDRESS 1] [BANK ADDRESS 2]

LADIES AND GENTLEMEN:

THE UNDERSIGNED \_\_\_\_\_\_, A DULY ELECTED AND ACTING OFFICER OF FITCHBURG GAS AND ELECTRIC LIGHT COMPANY (THE "BENEFICIARY"), HEREBY CERTIFIES TO [INSERT BANK NAME] (THE "BANK"), WITH REFERENCE TO IRREVOCABLE LETTER OF CREDIT NO. \_\_\_\_\_ DATED \_\_\_\_\_, ISSUED BY THE BANK IN FAVOR OF THE BENEFICIARY (THE "LETTER OF CREDIT"), AS FOLLOWS AS OF THE DATE THEREOF:

1. THE BENEFICIARY IS A PARTY TO THAT CERTAIN [INTERCONNECTION AGREEMENT], EFFECTIVE \_\_\_\_\_, BETWEEN THE BENEFICIARY AND [CUSTOMER NAME] (THE "AGREEMENT").

2. BENEFICIARY IS MAKING A DRAWING UNDER THE LETTER OF CREDIT IN THE AMOUNT OF \$\_\_\_\_\_ BECAUSE [CHECK APPLICABLE PROVISION]:

[\_\_\_\_] (A) THERE CURRENTLY EXIST ONE OR MORE UNPAID AMOUNTS WHICH [CUSTOMER NAME] IS OBLIGATED TO PAY PURSUANT TO THE TERMS OF THE AGREEMENT.

[\_\_\_\_] (B) THE BENEFICIARY HAS RECEIVED NOTICE FROM THE BANK OF ITS INTENTION NOT TO RENEW THE LETTER OF CREDIT BEYOND THE CURRENT EXPIRATION DATE AND [CUSTOMER NAME] HAS FAILED, PRIOR TO THE CLOSE OF BUSINESS ON

{W4603078.2}

\_\_\_\_\_ [INSERT DATE WHICH IS NOT MORE THAN THIRTY (30) DAYS BEFORE THE PRESENT EXPIRATION DATE], TO DELIVER TO BENEFICIARY A REPLACEMENT LETTER OF CREDIT SATISFYING THE REQUIREMENTS OF THE AGREEMENT.

4. FUNDS PAID PURSUANT TO THE PROVISIONS OF THE LETTER OF CREDIT SHALL BE WIRE TRANSFERRED TO THE BENEFICIARY IN ACCORDANCE WITH THE FOLLOWING INSTRUCTIONS:

\_\_\_\_\_

UNLESS OTHERWISE PROVIDED HEREIN, CAPITALIZED TERMS WHICH ARE USED AND NOT DEFINED HEREIN SHALL HAVE THE MEANING GIVEN EACH SUCH TERM IN THE LETTER OF CREDIT.

IN WITNESS WHEREOF, THIS CERTIFICATE HAS BEEN DULY EXECUTED AND DELIVERED ON BEHALF OF THE BENEFICIARY BY ITS DULY ELECTED AND ACTING OFFICER AS OF THIS \_\_\_\_\_ DAY OF \_\_\_\_\_.

BENEFICIARY: FITCHBURG GAS AND ELECTRIC LIGHT COMPANY

NAME:

TITLE

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## **SCHEDULE 21 - NEP**

## NEW ENGLAND POWER COMPANY LOCAL SERVICE SCHEDULE

#### I. COMMON SERVICE PROVISIONS

## 1 Definitions

Whenever used in this Schedule, in either the singular or plural number, the following capitalized terms shall have the meanings specified in this Section 1. Terms used in this Schedule that are not defined in this Schedule shall have the meanings set forth in the Tariff or customarily attributed to such terms by the electric utility industry in New England.

**1.0 New England Affiliate:** New England Affiliate means Massachusetts Electric Company, Nantucket Electric Company, The Narragansett Electric Company and Granite State Electric Company.

**1.1 Annual Peak Load:** The highest Network Load of the Network Customer during a calendar year.

**1.2 Contract Termination Charge (CTC):** New England Power Company's stranded cost charge to certain wholesale requirements customers, as defined and described in the Stipulations and Agreements and as calculated pursuant to Appendix 1 of the Offer of Settlement filed with the Commission in Docket Nos. ER97-678-000 and ER97-680-000.

**1.3** Contribution in Aid of Construction (CIAC): A contribution in aid of construction pursuant to Section 118(b) of the Internal Revenue Code of 1986.

**1.4 Distribution System:** Distribution System means the facilities owned or supported by NEP or its New England Affiliates that do not constitute PTF or Non-PTF and are used for Transmission Service under the Tariff for Transmission Customers other than end-use customers.

## 1.5 [Reserved]

**1.6 IRS Notice 87-82:** Internal Revenue Service Notice 87-82, Providing guidance with Respect to the Treatment of CIACs (received by regulated public utilities) After Enactment of New Section 118(b) of the Internal Revenue Code.

**1.7 IRS Notice 90-60:** Internal Revenue Service Notice 90-60, Contribution in Aid of Construction, issued September 10, 1990.

**1.7.1** Load Interconnections: Any load facility desiring to interconnect with NEP's electrical system or modify an existing interconnection, as further set forth in the Local Service Agreement in Schedule 21-Attachment A. In addition, Attachment C, D, E, F and H of Schedule 21-NEP shall apply.

**1.8 Load Power Factor:** The ratio of the load measured in kW to the same load measured in kVA during a one-hour period.

**1.9 Load Ratio Share:** Ratio of a Transmission Customer's monthly PTF Network Load occurring coincident with NEP's Total Monthly Peak Load, to NEP's Total Monthly Peak Load, calculated on a monthly basis.

## 1.10 [Reserved]

**1.11 Monthly Transmission Expenses:** The total monthly cost of the Transmission System as specified in Attachment RR to this Schedule until amended by NEP or modified by the Commission.

**1.12 NEP:** NEP means New England Power Company, a Transmission Owner under the Tariff

**1.13 NEPOOL Tariff:** The predecessor NEPOOL Open Access Transmission Tariff as filed with the Commission on December 31, 1996 and as amended and in effect from time to time.

1.14 NERC: North American Electric Reliability Council

**1.15** Network Load: The load interconnected (not reduced for any generation behind the meter) to the PTF, Non-PTF or Distribution Facilities of NEP or its New England Affiliates either directly or through Distribution Facilities or Non-PTF Facilities of other entities that a Network Customer designates to receive Local Network Service under Schedule 21 and this Schedule.

For purposes of establishing rates and charges under this Schedule, the Network Load will be subdivided into one of three categories:

**A. PTF Network Load** shall be the load over NEP's Local Network and shall equal the load of Network Customers directly interconnected with NEP's PTF or indirectly utilizing NEP's PTF through Non-PTF or Distribution Facilities of NEP or its New England Affiliates.

**B.** Non-PTF Network Load shall be the load over NEP's Non-PTF either directly interconnected with NEP's Non-PTF or indirectly utilizing NEP's Non-PTF through Distribution Facilities of NEP or its New England Affiliates.

**C. Distribution Facilities Network Load** shall be the load interconnected to the Distribution Facilities of NEP, its New England Affiliates or other entities.

**1.16** Network Upgrades: Modifications or additions to transmission-related facilities that are integrated with and support NEP's overall Transmission System for the general benefit of all users of such Transmission System or to reliably integrate a generating unit with the Transmission System or to interconnect to outside control areas.

**1.17** Non-PTF Load Ratio Share: Ratio of a Transmission Customer's monthly Non-PTF Network Load occurring coincident with NEP's Total Monthly Non-PTF Peak Load, to NEP's Total Monthly Non-PTF Peak Load.

1.18 NPCC: Northeast Power Coordinating Council, a regional reliability governing body.

**1.19 Own Use Energy:** Energy consumed by NEP's transmission facilities for purposes including but not limited to station service and sleet thawing, but excluding losses incurred on the Transmission System.

**1.20 Parties:** NEP and the Transmission Customer receiving service under this Schedule and the Tariff.

**1.21 Payment Schedule:** The payment schedule attached to a Local Service Agreement containing estimated milestones and estimated costs.

**1.22** Policy and Practices for Protection Requirements for New or Modified Load Interconnections: NEP's policy concerning protection requirements for new or modified interconnections to loads, are included in the associated attachments of the Transmission Customer's Local Service Agreement.

**1.23 Project:** The substation and all facilities ancillary and appurtenant thereto, which the Transmission Customer requests to interconnect to the Transmission System, as more fully described in associated attachments to this Schedule 21-NEP and Attachment A to Schedule 21, Local Transmission Service.

**1.24 Qualified Bidders List:** A list of contractors and vendors qualified by NEP to work on interconnection facilities.

**1.25 REMVEC:** The Rhode Island, Eastern Massachusetts, Vermont Energy Control, which operates as a Local Control Center to the ISO.

**1.26 Taxable Event:** An event taxable to NEP resulting from transfers made by the Transmission Customer to NEP for services provided under this Schedule and Schedule 21 with respect to construction and installation of new Direct Assignment Facilities or improvements.

**1.27 Total Monthly Peak Load:** For each month, the highest hourly sum of the coincident peaks of deliveries to all PTF Network Loads under this Schedule, plus the loads of customers served under New England Power Company's (NEP) FERC Electric Tariff, Original Volume No. 1, connected directly to NEP's PTF or indirectly utilizing NEP's PTF through Non-PTF or Distribution Facilities of NEP, its New England Affiliates or other entities, including losses and NEP's Own Use Energy.

**1.28** Total Monthly Non-PTF Peak Load: For each month, the highest hourly sum of the coincident peaks of deliveries to all Non-PTF Network Loads under this Schedule plus the loads of customers served under NEP's FERC Electric Tariff, Original Volume No. 1, that would otherwise qualify as Non-PTF Network Load, including losses and NEP's Own Use Energy.

**1.29** Transformation Facilities: One or more transformers in a substation that step the voltage from the transmission voltage level to the distribution voltage level.

**1.30** Transmission Service: Service provided under the OATT.

**1.31 Transmission System:** Transmission System means the facilities owned, controlled or operated by NEP that are used to provide Transmission Service.

## 2 Purpose of This Schedule

The OATT provides for a two-tier transmission arrangement integrating regional transmission service over PTF and Local Service over Non-PTF. The arrangement is designed and shall be operated in such a manner as to encourage and promote competition in the electric market to the benefit of ultimate users of electric energy. The OATT is intended to provide for comparable, non-discriminatory treatment of all similarly situated Transmission Owners and all Eligible Customers that are transmission users, and it shall be construed in the manner which best achieves this objective.

This Schedule functions in conjunction with the OATT to offer Transmission Services and Ancillary Services not provided pursuant to the other sections of the OATT, and to provide for the recognition of payments by and credits to NEP under the OATT. The rates, terms and conditions of this Schedule supplement and, where applicable, replace the rates, terms and conditions of the OATT and Schedule 21 with respect to Local Service; however Local PTP Service is not offered by NEP. In the event of a conflict between the terms of this Schedule and the terms of Schedule 21 with respect to Local Service, the terms of this Schedule shall govern.

Pursuant to this Schedule and to Schedules 22 and 23, NEP: (a) offers access to its Transmission Facilities for Excepted Transactions; (b) offers access to its Non-PTF in conjunction with the purchase of Transmission Service under the OATT; (c) provides rates, terms and conditions for the interconnection of new network load to the Transmission System and Distribution System for wholesale transactions; (d) reflects in the charges for Transmission Service and Ancillary Services amounts paid by NEP or credited to NEP in accordance with the OATT; and (e) provides for the recovery of costs associated with the Transmission Facilities and Ancillary Services that are not recovered pursuant to the OATT.

3 Ancillary Services

Ancillary Services are needed with Transmission Service to maintain reliability within and among the Control Areas affected by the Transmission Service. NEP is required to provide and the Network Customer or the Transmission Customer taking service in accordance with this Schedule and the OATT is required to purchase Local Scheduling, System Control and Dispatch Service in accordance with the rates and/or methodology described in Attachment S-1 and Attachment OCC to this Schedule.

## 4 Billing and Payment

**4.1 Billing Procedure:** Within a reasonable time after the first day of each month, NEP or its designee shall submit an invoice to the Transmission Customer for the charges for all services furnished by NEP under this Schedule and Schedule 21 during the preceding month. The invoice shall be paid by the Transmission Customer within twenty-five (25) days of issuance. All payments shall be made in immediately available funds payable to NEP, or by wire transfer to a bank named by NEP.

**4.2 Customer Default:** In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to NEP on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after NEP notifies the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, NEP may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission So approves any such request. In the event of a billing dispute between NEP and the Transmission Customer, NEP will continue to provide service under the Local Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then NEP may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy.

**4.3 After Termination or Cancellation:** The applicable provisions of the OATT, Schedule 21, this Schedule and any Local Service Agreement shall continue in effect after termination or cancellation thereof to the extent necessary to provide for final billings, billing adjustments and payments and with respect to liability and indemnification from acts or events that occurred while

the Local Service Agreement was in effect. Notwithstanding the above, if the OATT, Schedule 21, this Schedule or any Local Service Agreement is terminated prior to the end of its initially contemplated term, for reasons other than breach by NEP, the Transmission Customer shall reimburse NEP for all unrecovered costs applicable to facilities installed pursuant to the provisions of the OATT, Schedule 21, this Schedule or any Local Service Agreement.

4.4 Audits of Accounts and Records: Within two (2) years following a calendar year, NEP and the Transmission Customer shall have the right to audit each other's accounts and records at the offices where such accounts and records are maintained during normal business hours; provided that appropriate notice shall have been given prior to any audit and provided that the audit shall be limited to those portions of such accounts and records that relate to service for said calendar year. The party being audited will be entitled to review the audit report and any supporting materials. The independent auditor performing such audit shall be subject to a confidentiality agreement between the auditor and the party being audited. To the extent that audited information includes confidential information, the auditing party shall designate an independent auditor to perform such audit. For the purpose of this provision, confidential information is proprietary information supplied by a Transmission Customer or a provider of Ancillary Services to NEP, which the Transmission Customer or a provider of Ancillary Services requests NEP not to disclose. NEP will treat such information as confidential except to the extent that disclosure of this information is required by the OATT, by regulatory or judicial order for reliability purposes pursuant to Good Utility Practice, pursuant to the Commission's Final Order 889 in Docket No. RM95-9-000, or as required under the ISO New England Information Policy. NEP will not disclose such information to its power marketing Affiliate or others.

## 5 Creditworthiness

For the purpose of determining the ability of a Transmission Customer to meet its obligations related to service hereunder, NEP may require reasonable credit review procedures. Applicable creditworthiness procedures are specified in Attachment L of this Schedule.

#### 6 Dispute Resolution Procedures

**6.1 Interpretation:** The interpretation of and performance under this Schedule shall be according to and controlled by the laws of the Commonwealth of Massachusetts when not in conflict with or pre-empted by the Federal Power Act.

**6.2 Indemnification:** In cases where the Transmission Customer enjoys limitation of its liability under the Massachusetts Tort Claims Act, G.L. c. 258,  $\Box \Box 1$  and 2, as amended from time to time, NEP will have a similar limitation on its liability under the OATT, Schedule 21 and this Schedule.

## II. NORTH AMERICAN ENERGY STANDARDS BOARD ("NAESB") WHOLESALE ELECTRICITY QUADRANT ("WEQ") STANDARDS

In accordance with Commission order, the NAESB Version 002.1 WEQ Standards incorporated by reference in Schedule 21 are applicable to the provision of transmission service over the NEP-transmission system, except as otherwise noted in this Schedule 21 NEP.

On October 4, 2010, NEP requested waiver of the following NAESB Version 002.1 WEQ Standards:

Open Access Same Time Information Systems (OASIS), Version 1.5 (WEQ 001, Version 002.1, March 11, 2009, with minor corrections applied May 29, 2009 and September 8, 2009), with the exception of Standards 001 0.1, 001 0.9 through 001-0.13, 001-1.0, 001-9.7, 001-14.1.3, and 001-15.1.2; and including Standards 001 1.6(b)(1) through 001 1.6(b)(3); 001 2.1 through 001 2.14; 001 2.2 through 001-2.2; 001-2.3 through 001-2.3.2; 001-4 through 001-4.27; 001-5 through 001-5.6; 001-8 through 001-8.3.2; 001-9 through 001-9.8.1; 001-10 through 001-10.8.7; 001-11 through 001-11.7.1; 001-12 through 001-12.5.2, and 001 A and 001 B; Standards 001-13.1.5; Standards 001-14 through 001-14.2.3.3; Standards 001-15 through 001-15.2.3.5; Standards 001-16 through 001-16.1; Standards 001-18 through 001-18.2; Standards 001-19 through 0.1-19.1.2; Standards 001-20 through 001-20.3; Standards 001-21 through 001-21.5.5; Standards 001-22 through 001-22.2; and 001-D.

NEP has been granted a waiver of the above NAESB Version 002.1 WEQ Standards by Order of the Commission dated December 3, 2010 in FERC Docket No. ER11-23-000.

## **III<u>II</u>. LOCAL NETWORK SERVICE**

The rates, terms and conditions set forth below supplement and, where applicable, replace the rates, terms and conditions of Local Network Service set forth in Schedule 21. In the event of a conflict between the terms of this Schedule and the terms of Schedule 21, the terms of this Schedule shall govern.

#### 19 Real Power Losses

Real Power Losses are associated with all Transmission Service. NEP is not obligated to provide Real Power Losses. The Network Customer is responsible for replacing losses associated with all Transmission Service as calculated by NEP. The applicable Real Power Loss factors tabulated in Attachment I to this Schedule will be applied to metered loads to account for losses on the Non-PTF System and/or Distribution System that are not otherwise accounted for and allocated. Determination of losses across NEP's PTF system will be according to the procedure set by the ISO. In cases where the ISO or the Tariff does not allocate PTF losses, PTF losses will be assigned at 3%. When a load interconnects to the Transmission System at a Non-PTF point, the Real Power Loss factors in Attachment I to this Schedule will be applied to metered load amounts to reflect the losses incurred between the metering point and the PTF. Application of appropriate loss compensation to the meter would negate the need to apply the Real Power Loss factors. The Real Power Loss factors vary, depending upon the system voltage level at the interconnection point. If multiple voltage levels intervene between the PTF and the interconnection point/metering point, the Real Power Loss factors for each of the intervening voltage levels are additive. Any Non-PTF losses not allocated under Attachment I to this Schedule will be allocated to Non-PTF Network Load on the basis of Non-PTF Load Ratio Share.

## 20 Metering and Power Factor Correction at Point(s) of Delivery

**20.1 Power Factor:** The Network Customer's cumulative Load Power Factor for all Point(s) of Delivery in an area as defined by the ISO shall be maintained within a range, as required by NEP, the ISO, and/or REMVEC, in accordance with Good Utility Practice. This range will be reviewed periodically and is subject to change. The Network Customer shall be notified of such changes. If the Network Customer's cumulative Load Power Factor does not fall within the required range, and NEP has existing means of providing the deficient reactive power NEP will charge the Network Customer a Power Factor Penalty in accordance with Attachment OCC to this Schedule. The Power Factor Penalty charge will be suspended if the customer's Load Power Factor or, if during periods when the range may be changed, the customer's Load Power Factor is within the prescribed range. If NEP cannot provide the deficient reactive power from existing facilities, NEP will install, at the Customer's sole expense, the appropriate equipment to bring the customer's power factor within the required range. NEP will file with the Commission the cost support for such installations.

## 21 Network Resources

#### 21.1 [Reserved]

**21.2 Designation of New Network Resources:** Each designation of a Network Resource shall be effective as of the beginning of a month, shall remain in effect for at least one full month, and shall only be terminated at the end of a month.

## 22 Construction of Facilities Associated with Interconnection of New Network Load

**22.1 Basic Understandings:** In cases in which the Transmission Customer intends to interconnect new network load to the Transmission System or Distribution System, the interconnection: (i) shall require the construction of interconnection facilities and associated equipment and (ii) may require the construction or installation of facilities and/or associated equipment in addition to the interconnection facilities on the Transmission System or Distribution System or the transmission system of another utility. These interconnection facilities and additional facilities shall be the financial responsibility of the Transmission Customer, to the extent consistent with Commission policy.

Subject to the following terms and conditions, NEP or its New England Affiliate shall, at the Transmission Customer's expense, build the facilities or make preparations so that this construction can be submitted for written bids to parties on the Qualified Bidders List. NEP shall have the right to supervise any construction undertaken by qualified outside contractors at the Transmission Customer's expense and to reject any construction work which fails to meet its requirements.

**22.2 General Considerations:** NEP or its New England Affiliate or another party selected pursuant to this Section shall construct the facilities at the Transmission Customer's expense. NEP or its New England Affiliate shall design, own, and maintain the facilities. NEP and the Transmission Customer shall mutually agree upon a schedule for construction and final interconnection. NEP shall use due diligence to fulfill its obligations under this Schedule in order to permit the interconnection of the Project in a timely manner. NEP reserves the exclusive right to make the final interconnection between the Project and NEP's Transmission System. NEP shall use, or specify that the Transmission Customer's selected contractor use, standard

equipment customarily employed by NEP or its New England Affiliate for its own system in accordance with Good Utility Practice in making the final interconnection.

The Transmission Customer shall pay NEP for all reasonable costs and fees required to enable NEP to fulfill its obligations, including any tax liability, the costs and fees of all permits, licenses, franchises or regulatory or other approvals necessary for the construction and operation of the facilities. NEP shall consult with Transmission Customer on decisions involving substantial additional costs to be incurred by NEP in fulfillment of its obligations.

**22.3 Tax Security Arrangements:** The Transmission Customer shall acknowledge that under IRS Notice 87-82, transfers made by the Transmission Customer to NEP for services provided hereunder with respect to the construction and installation of new facilities or improvements may, under certain circumstances cause a Taxable Event to NEP. The Transmission Customer agrees to assure NEP recovery of all potential tax costs, both state and federal, including all interest and penalty claims, if a Taxable Event occurs.

The Transmission Customer shall expressly agree to indemnify and save NEP harmless from and against any and all federal and/or state income tax, interest or penalty claims, or liability related to any tax gross-up incurred as a result of the work performed for and the services rendered to the Transmission Customer.

**22.4 Security:** In addition to the security provided for in Section 5 of this Schedule, the Transmission Customer shall agree to provide NEP with security for the potential tax liability for a term and in a form acceptable to NEP. Such security shall cover an amount calculated in accordance with the terms of Section 22.5 of this Schedule. If the Transmission Customer fails to provide NEP with satisfactory security within thirty (30) days of notice by NEP, NEP may cease all work related to the Transmission Customer's request until such security is in place.

NEP reserves the right to require the Transmission Customer to increase the value of the security to reflect changed circumstances including, but not limited to, an increase in the taxable value of the Direct Assignment Facilities or changes in tax law which affect NEP's tax position vis-à-vis the construction and installation of new or modified facilities. The Transmission Customer shall provide NEP with the security as well as any periodic renewals that may be required by NEP. Such security shall have a minimum term of one (1) year and, in the case of a letter of credit, shall

designate NEP as beneficiary with authority to draw drafts on the issuer for the secured amount in accordance with this Schedule. Such security shall also provide that NEP may draw the full amount of the security in the event it has not been renewed, extended or replaced on or before thirty (30) days prior to the expiration date of such security.

If at any time during the term of the Transmission Customer's Service Agreement with NEP there is a change in federal law tax which, in NEP's view, mitigates or eliminates its tax liability under applicable law or regulation, NEP shall agree, to the extent it deems appropriate, to release to the Transmission Customer any security determined to be in excess of NEP's potential tax liability.

**22.5 Determination of Secured Amount:** The Transmission Customer agrees that if a Taxable Event occurs, NEP's tax liability will be based upon the fair market value of the facilities constructed, installed or modified hereunder. The Transmission Customer agrees that the fair market value of the facilities is deemed to be the depreciated replacement cost of such facilities at the time of the transfer, as prescribed by IRS Notice 90-60.

The Transmission Customer shall secure an amount equal to the product of the depreciated replacement cost of the facilities times NEP's gross-up tax factor (net federal and state tax rate). NEP shall provide an initial estimate of the amount to be secured, based upon its facilities construction, installation or modification estimate. These projected figures, however, are subject to adjustment for actual construction costs when they become known.

The Transmission Customer shall agree to increase the secured amount to reflect any other adjustments as required by NEP to ensure that the existing security is sufficient to cover NEP's potential tax liability. The Transmission Customer shall agree to increase the secured amount within thirty (30) days of receipt of notice from NEP of any such adjustment to these costs. In the event that the Transmission Customer fails to do so, NEP shall have the right to seek termination of its service to the Transmission Customer until it increases the secured amount to the level specified by NEP.

**22.6 Payment of Tax and Reconciliation:** In the event that a Taxable Event occurs, NEP may exercise its rights under the security arrangement and draw upon all amounts necessary to pay the applicable taxes. If, in NEP's judgment, there are insufficient funds from such security to pay the applicable taxes, the Transmission Customer agrees to provide NEP with the balance of

the funds needed within fifteen (15) days notice from NEP of such insufficiency. Any excess funds covered by security shall remain at NEP's disposal until NEP has received a final determination from the taxing authorities on the amounts payable as a result of the Taxable Event.

Upon such final determination, there shall be a reconciliation of the taxes payable by NEP, including any interest or penalties, and amounts provided by the Transmission Customer, in the form of security or otherwise. If the funds provided by the Transmission Customer prove insufficient to cover NEP's tax liability, the Transmission Customer shall pay NEP the amount of the underpayment within fifteen (15) days notice from NEP of the additional amount owed. If NEP receives a refund from the taxing authorities of any amounts paid due to the Taxable Event, NEP shall refund to the Transmission Customer such amount refunded to NEP. If taxes had not as yet been paid by NEP, in the form of estimated tax payments or otherwise, NEP shall refund the amount paid by the Transmission Customer in excess of NEP's actual tax liability. Interest on such amounts shall accrue, from the applicable following date: (a) the date the refund is received by NEP; (b) the date of recovery of estimated taxes previously paid by NEP (i.e., the due date of the tax payment following the determination); or (c) the date of final payment by the Transmission Customer under this Schedule, to the date NEP refunds such amount to the Transmission Customer. Once the Transmission Customer has fulfilled all of its obligations with respect to the final determination of the tax amounts payable, NEP shall release the Transmission Customer from all obligations under this Section. Interest, however, will not apply when a Letter of Credit is used as security.

**22.7 IRS Private Letter Ruling.** In the case of a Contribution in Aid of Construction ("CIAC") amounting to at least \$100,000 and upon written request by a Transmission Customer, NEP will request a Private Letter Ruling from the Internal Revenue Service on the taxable nature of the Transmission Customer's CIAC. The Transmission Customer must submit such written request to NEP, with payment for the estimated costs of obtaining such ruling, within 30 days of the Commission's acceptance of the transmission Customer's Service Agreement (or its amendment) covering construction under this Schedule. Payment shall be sufficient to cover NEP's estimated expenses in retaining outside tax counsel with expertise in such matters, all regulatory, filing and application fees and any other reasonable expenses, including salary and overhead costs, deemed appropriate and necessary for preparing, managing and obtaining the ruling.

The Transmission Customer shall be responsible for all costs that NEP incurs in pursuing the Private Letter Ruling. If NEP's costs in pursuing the Private Letter Ruling exceed the estimated costs shown, it shall so notify the Transmission Customer and the Transmission Customer shall reimburse or pay the estimated additional cost, as the case may be, within thirty (30) days of notification. NEP shall not be responsible for pursuing or continuing to pursue the Private Letter Ruling if the Transmission Customer has not complied with these payment provisions.

The Transmission Customer agrees that the selection and retention of outside tax counsel in this regard shall be exclusively determined by NEP. Furthermore, the Transmission Customer understands that NEP cannot predict or guarantee the outcome of the Private Letter Ruling and, should the Internal Revenue Service deem the CIAC taxable to NEP, the Transmission Customer must meet its financial obligations to NEP to cover federal and state taxes.

The Transmission Customer shall cooperate in the preparation and provision of information, documents and other materials needed by NEP and its outside counsel for the Private Letter Ruling application and its supporting description and analysis. As soon as practicable after NEP's receipt of the Private Letter Ruling from the IRS, it shall provide the Transmission Customer with a copy of the document. The parties agree that the decision of the IRS as to the taxable status of the CIAC shall be binding upon the parties, their successors and/or assigns.

**22.8 Land Interests:** The Transmission Customer recognizes that acquisition of the land interests necessary for the interconnection facilities may require individual agreements between NEP or its New England Affiliate and the landowners. The Transmission Customer agrees to pay NEP all its reasonable costs associated with these acquisition agreements in advance of their execution. In the event the Transmission Customer acquires the land, permits, licenses, franchises or regulatory or other approvals necessary for the construction and operation of the interconnection facilities, NEP has the right, at the Transmission Customer's expense, to approve or reject any terms and conditions related thereto prior to the acceptance of the interconnection facilities.

**22.9 Construction:** If the Transmission Customer does not request that the construction of the interconnection facilities be submitted for written bids as described below, NEP or its New England Affiliate shall construct the interconnection facilities and the Transmission Customer shall pay NEP the total costs associated with the construction of the interconnection facilities.

The estimated costs (exclusive of any regulatory approval costs and/or fees) and the schedule for the Transmission Customer's payments to NEP will be shown the Service Agreement.

The Transmission Customer shall pay NEP following the close of the Transmission Customer's construction financing (if any) in accordance with the Payment Schedule shown in the Service Agreement. The Payment Schedule contains estimated milestones and estimated costs. NEP shall invoice the Transmission Customer for costs, on an estimated basis.

Within a reasonable period of time following completion of the interconnection facilities, NEP shall provide the Transmission Customer with a report of actual construction costs sufficient to allow identification of all major cost components. Upon completion of the interconnection facilities, the Transmission Customer and NEP agree to make a final adjustment to correct for any overpayment or underpayment of the construction costs.

**22.10 Construction by Third-Party:** The Transmission Customer may request that the construction of the interconnection facilities be submitted for written bids by NEP-approved contractors having the capability and skill to perform the work in accordance with the terms and conditions contained herein. The Transmission Customer shall assume all risks and consequences associated with the decision to use such bidding process.

The Transmission Customer understands that if a contractor other than NEP or its New England Affiliate constructs the interconnection facilities, the RFP process and interconnection facilities construction may require more time than if NEP or its New England Affiliate constructed the interconnection facilities. Notwithstanding the foregoing, the Transmission Customer understands and agrees that all construction work on existing facilities shall be done by NEP or its New England Affiliate. Such work shall not be included in the work submitted for bid by the Transmission Customer to outside contractors.

If the Transmission Customer requests that the construction of the interconnection facilities be submitted for written bids in accordance with the preceding paragraph, NEP shall prepare RFPs for construction of the interconnection facilities which, at a minimum, shall include construction drawings, steel structure specifications, bid drawings and specifications, materials specifications, and construction specifications. NEP shall also prepare the Qualified Bidders List. Materials, including steel structures, shall be obtained from suppliers listed in the Qualified Bidders List.

The Transmission Customer shall seek NEP's prior approval with respect to any additions to the Qualified Bidders List or substitution of equal items of material from approved suppliers. The Transmission Customer shall reimburse NEP for its reasonable costs of preparing the RFPs and the Qualified Bidders List.

Upon the Transmission Customer's acceptance of the RFPs and the Qualified Bidders List, the Transmission Customer shall issue the RFPs to the contractors on the Qualified Bidders List. NEP and its New England Affiliates shall have the right to respond to the RFPs. The Transmission Customer shall review the responses to the RFPs and select a contractor to construct the interconnection facilities. Selection of the contractor shall be at the Transmission Customer's sole discretion, but subject to the limitations and criteria contained herein. The contractor selected by this process shall contract directly with the Transmission Customer for this construction. In no event shall NEP become legally or financially obligated to the selected contractor for construction of the interconnection facilities or any other related work.

If NEP or its New England Affiliate is not the successful bidder, NEP shall have the ongoing right to monitor, at the Transmission Customer's expense, and approve or reject the contractor's construction of the interconnection facilities to ensure that the contractor's performance satisfies NEP's specifications and the criteria set forth in this Schedule and all appendices, exhibits, and attachments hereto. NEP shall have the right to make a final inspection and acceptance of the completed interconnection facilities. NEP's evaluation and acceptance of the interconnection facilities shall be based on compliance with the contract specifications; Good Utility Practice; the National Electric Safety Code as in effect during the time of construction; the appropriate state rules and regulations; NEP's Policy and Practices for Protection Requirements for New or Modified Load Interconnections; and other practices, procedures, specifications, and applicable standards developed by NEP's New England Affiliate. Any part of the work which NEP reasonably finds unsatisfactory shall be corrected prior to its acceptance of the completed interconnection facilities.

If the Transmission Customer selects a contractor other than NEP or its New England Affiliate, within thirty days following completion of the interconnection facilities, the Transmission Customer shall provide NEP with all detailed construction cost data that NEP needs to meet construction cost unitizing requirements under the Federal Power Act and relevant regulations.

## 22.11 Delivery and Measurement of Electricity:

**22.11.1 Voltage Level:** All electricity across the interconnection point shall be the form of three-phase sixty-hertz alternating current at a voltage class determined by mutual agreement of the parties.

**22.11.2 Machine Reactive Capability:** The Transmission Customer will be required to provide reactive capability to regulate and maintain system voltage at the interconnection point. NEP and the ISO shall establish a scheduled range of voltages to be maintained by the Project. The reactive capability requirements shall be reviewed during the System Impact Study and Facilities Study.

**22.11.3 Metering and Related Equipment:** The Transmission Customer shall be responsible for the cost of installing and maintaining compatible metering and communication equipment at or distant from the Project which measures steam flow, if the Project is a generating source (as applicable and where necessary), as well as electricity flows between NEP and Transmission Customer and determines the status of switching equipment. The Transmission Customer shall be responsible for communicating to NEP accurate information on capacity and energy being transmitted. Instrument transformers shall be approved by NEP before the design is finalized. In cases where it may be appropriate for the metering equipment to be installed at the Transmission Customer's property, NEP reserves the right to inspect, commission and witness test such meters. NEP shall also have access to read such meters remotely and locally to facilitate measurements and billing.

The Transmission Customer shall provide suitable space within its facilities for installation of the metering, telemetering, environmental control, and communication equipment at no cost to NEP.

The Transmission Customer shall be responsible for providing all necessary leased telephone lines and any necessary protection for leased lines and shall furthermore be responsible for all communication required by the ISO, or its designee. The Transmission Customer shall maintain all telemetering and transducer equipment on the Project in accordance with applicable criteria, rules, standards and operating procedures. At the Transmission Customer's expense, NEP shall purchase, own and maintain all telemetering equipment located on NEP's facilities. The Transmission Customer shall be responsible for the cost of installing NEP-approved or NEPspecified test switches in the transducer circuits.

If the metering equipment, the interconnection point and the Point(s) of Receipt are not at the same location, the metering equipment shall record delivery of electricity in a manner that accounts for losses occurring between the metering point and the Point(s) of Receipt or between the metering point and the interconnection point, as appropriate. Accounting for transmission losses between the metering point and the Point(s) of Receipt or between the metering point and the interconnection point (s) of Receipt or between the metering point and the Point(s) of Receipt or between the metering point and the interconnection point (s) of Receipt or between the metering point and the interconnection point shall be pursuant to the rates, terms and conditions of this Schedule and the OATT.

All metering equipment may be routinely tested by NEP at the Transmission Customer's expense, in accordance with applicable criteria, rules, standards and operating procedures. If, at any time, any metering equipment is found to be inaccurate by a margin greater than that allowed under applicable criteria, rules, standards and operating procedures, NEP shall cause such metering equipment to be made accurate or replaced at the Transmission Customer's expense. Meter readings for one-half the period extending back to the last successful meter test shall be adjusted so far as the same can be reasonably ascertained. Each party shall comply with any reasonable request of the other concerning the sealing of meters, the presence of a representative of the other party when the seals are broken and the tests are made, and other matters affecting the accuracy of the measurement of electricity delivered from the Project. If either party believes that there has been a meter failure or stoppage, it shall immediately notify the other.

The Transmission Customer shall be responsible for the cost of purchasing and installing software, hardware and/or other technology that may be required to read billing meters.

The Transmission Customer shall be responsible for the costs of all metering and related equipment pursuant to Attachment OCC to this Schedule and/or Attachment DAF to this Schedule, as applicable.

**22.12** Notice Provisions: If at any time, in the reasonable exercise of NEP's judgment, operation of the Project adversely affects the quality of service to other customers or interferes with the safe and reliable operation of the Transmission System or Distribution System, NEP may discontinue service to the Transmission Customer until the condition has been corrected. Unless

an emergency exists or the risk of one is imminent, NEP shall give the Transmission Customer reasonable notice of its intention to discontinue service and, where practical, allow suitable time for the Transmission Customer to remove the interfering condition. NEP's judgment with regard to discontinuance of deliveries or disconnection of facilities under this paragraph shall be made in accordance with Good Utility Practice. In the case of such discontinuance, NEP shall immediately confer with the Transmission Customer regarding the conditions causing such discontinuance and its recommendation concerning the timely correction thereof.

**22.13** Access and Control: Properly accredited representatives of NEP or its New England Affiliates shall at all reasonable times have access to the Project to make reasonable inspections and obtain information required in connection with this Schedule. At the Project, such representatives shall make themselves known to the Transmission Customer's personnel, state the object of their visit, and conduct themselves in a manner that will not interfere with the construction or operation of the Project. NEP or its New England Affiliates will have control such that it may open or close the circuit breaker or disconnect and place safety grounds at the Point(s) of Receipt, or at the station, if the Point(s) of Receipt is (are) remote from the station.

**22.14 Insurance Requirements:** The Transmission Customer shall be subject to the insurance requirements specified in the Local Service Agreement.

## 23 Load Shedding and Curtailments

**23.1 Transmission Constraints:** During any period when NEP determines that a transmission constraint exists on the Non-PTF, and such constraint may impair the reliability of the New England Transmission System, NEP will take whatever actions, consistent with Good Utility Practice, that are reasonably necessary to maintain the reliability of the system. To the extent NEP determines that the reliability of the New England Transmission System can be maintained by redispatching resources, NEP will initiate procedures pursuant to contracts with owners of the identified resources to redispatch all Network Resources and NEP's own resources on a least-cost basis without regard to the ownership of such resources. Any redispatch under this Section may not unduly discriminate between NEP's use of the Non-PTF on behalf of its Native Load Customers and any Network Customer's use of the Non-PTF to serve its designated Network Load.

**23.2** Cost Responsibility for Relieving Transmission Constraints: Whenever NEP implements least-cost redispatch procedures in response to a transmission constraint, NEP and the Network Customers will each bear a proportionate share of the total redispatch cost based on their respective Load Ratio Shares.

**23.3 System Reliability:** A Network Customer that fails to respond to established load shedding and curtailment procedures will be deemed by NEP of making unauthorized use of the Transmission System. If unauthorized use occurs, NEP will charge and the Transmission Customer will be obligated to pay a penalty equal to twice the standard rate for such a transaction, as described more fully in Section 24.15 of this Schedule. In all cases of unauthorized use of the Transmission System, the service will be considered non-firm and NEP will be under no obligation to provide any services for such use.

## 24 Compensation for Local Network Service

The following rates and charges may apply to Local Network Service as specified below. Charges under this Section shall include any applicable PTF costs not otherwise recovered under the OATT. To the extent that NEP enters into an incentive rate plan(s), the incentive rate terms shall be reflected in a separate filing with the Commission under Section 205 of the Federal Power Act. Additionally, all costs and revenues under such incentive rate plan(s) shall be excluded from NEP's PTF and Non-PTF Transmission Revenue Requirement. However, liquidated damages mandated by the Commission in Docket No. RM02-1-000 shall be reflected in NEP's costs and included in its PTF and Non-PTF Transmission Revenue Requirement calculations.

**24.1** Monthly Demand Charge: Any Network Customer utilizing NEP's PTF facilities either directly or indirectly shall pay a Monthly Demand Charge as calculated in accordance with Attachment OCC to this Schedule.

**24.2 Monthly Non-PTF Demand Charge:** Any Network Customer with Network Load qualifying as Non-PTF Network Load, shall pay a Monthly Non-PTF Demand Charge determined in accordance with Attachment OCC to this Schedule.

**24.3** Transformer Surcharge: In the event that a Network Customer does not own the stepdown transformation from 69 kV or greater voltage to distribution voltage level, where it

utilizes NEP's Transformation Facilities, the Network Customer will be subject to a Transformer Surcharge calculated in accordance with Attachment OCC to this Schedule.

**24.4** Meter Surcharge: If the Network Customer neither owns nor supports metering equipment necessary for provision of Local Network Service, that customer will be subject to a Meter Surcharge calculated in accordance with Attachment OCC to this Schedule.

**24.5 Power Factor Penalty:** Pursuant to the requirements of Section 20.1 of this Schedule, the Network Customer may be subject to a Power Factor Penalty calculated in accordance with Attachment OCC to this Schedule.

**24.6 Direct Assignment Facility Charge:** The Direct Assignment Facility Charge compensates NEP for the annual costs of the facilities, expansions and upgrades that may be directly assigned by NEP or by the ISO, as appropriate, to the Transmission Customer. These costs may include, but are not limited to, the capital carrying cost, income tax, depreciation, operation and maintenance, administrative and general expenses and property tax. The Direct Assignment Facility Charge shall be calculated as specified in Attachment DAF to this Schedule. In no event shall the Direct Assignment Facilities Charge be less than \$1,000.00 per year. If NEP enters into an agreement for use and support of facilities owned by other entities on behalf of a Transmission Customer, any charges incurred by NEP will be directly assigned to the Transmission Customer.

The Direct Assignment Facilities Charge in each year shall be billed based on forecast data for that year and shall be adjusted for experienced costs as soon as practicable after the close of the year. The charge so calculated shall commence on the date the facilities, expansions or upgrades are placed in service.

## 24.7 Distribution Service:

**24.7.1 Specific Distribution Surcharge:** Any Network Customer listed in Attachment OCC, VI, to this Schedule, which relies on the specific distribution facilities of NEP's New England Affiliate, Massachusetts Electric Company, as provided to NEP under the Integrated Facilities provision of NEP's FERC Electric Tariff No. 1 (Tariff No. 1), will be subject to a Specific Distribution Surcharge calculated in accordance with Attachment OCC to this Schedule.

**24.7.2 Rolled-In Distribution Surcharge:** To the extent that a Network Customer listed in Attachment OCC, VI, to this Schedule, utilizes distribution facilities in addition to the specific facilities identified in NEP's Tariff No. 1 (as of February 28, 1998), the Network Customer will pay the Rolled-In Distribution Surcharge calculated in accordance with Attachment DS to this Schedule for delivery service to load. To the extent that distribution service to a new Network Customer is subject to the direct jurisdiction of the Federal Energy Regulatory Commission, the provision of distribution service to that customer on or after March 1, 1998 shall be reflected in the Network Customer's Local Service Agreement.

In the event that the integrated distribution facilities under NEP's FERC Electric Tariff No. 1 are otherwise eliminated or superseded, the customers listed in Attachment OCC, VI, to this Schedule, will take distribution service entirely under the Rolled-In Distribution Surcharge calculated in accordance with Attachment DS to this Schedule.

**24.8** Ancillary Services: Any Network Customer with Network Load qualifying as PTF Network Load will be subject to the Network Load Dispatch Surcharge calculated in accordance with Attachment OCC to this Schedule.

**24.9 OASIS Charges:** Identifiable usage-dependent costs of OASIS may be charged to the specific user in accordance with the Commission's Final Order 889 in Docket No. RM95-9-000, and any subsequent amendments thereto.

## 24.10 [Reserved]

**24.11 EPRI Credit:** The Network EPRI Credit, calculated in accordance with Attachment OCC to this Schedule, shall apply to any wholesale Network Customer, which is not also an Affiliate of NEP.

**24.12 Pre-1997 RNS Revenue Credit:** Pursuant to the compliance filing made by NEP in FERC Docket Nos. EC99-70-00 and ER99-2832-000 (Not Consolidated), Taunton Municipal Lighting Plant, Middleborough Gas and Electric Department and Pascoag Fire District will receive a credit in their monthly bill under this Schedule calculated in accordance with Attachment OCC to this Schedule.

**24.13** Network Upgrade Charge: If network upgrades are required in association with a new load, the Network Customer shall be required to pay a Network Upgrade Charge. The monthly Network Upgrade charge shall be the higher of (i) the allocated Monthly Transmission Expenses for Local Network Service with the New Network Upgrades rolled-in; or (ii) an incremental monthly charge for service based upon the total costs of the Network Upgrades for which the Transmission Customer is responsible as determined by the formula in Attachment DAF to this Schedule.

**24.14 Redispatch Charge:** Pursuant to Section 23.2 of this Schedule, the Transmission Customer may be subject to charges for generation redispatch.

**24.15 Unauthorized Use Penalty:** Pursuant to Section 23.3 of this Schedule, the Transmission Customer may be subject to a penalty equal to twice the standard rate for unauthorized use of the Transmission System, based on the period of unauthorized use.

The annual standard rate per KW for unauthorized use of the Transmission System shall be derived from (i) the previous calendar year's annual transmission expenses as calculated in Attachment RR, excluding any revenue credits associated with Section 24.1 of this Schedule divided by (ii) the average of the twelve Total Monthly Peak Loads from the previous year.7

The monthly standard rate per KW shall equal one-twelfth of the annual standard rate; the weekly standard rate per KW shall equal one-fifty-second of the annual standard rate; and the daily standard rate per KW shall equal one-fifth of the weekly standard rate.

The unauthorized use penalty charge for a single hour of unauthorized use shall be based on the daily standard rate, and more than one assessment for a given duration (e.g., daily) results in an increase of the penalty period to the next longest duration (e.g., weekly). The unauthorized use penalty charge for multiple instances of unauthorized use (i.e., more than one hour) within a day will be based on the daily standard rate. The unauthorized use penalty charge for multiple instances of one calendar week would result in a penalty based on the weekly standard rate. The unauthorized use penalty charge for multiple instances of unauthorized use pe

<sup>&</sup>lt;sup>7</sup> The standard rate is analogous to the former Firm Local Point-To-Point Service rate that was eliminated from Schedule 21-NEP (Attachment J) effective November 1, 2007; *see Docket No. ER07-1323-000.* 

use during more than one week during a calendar month will be based on the monthly standard rate.

# ATTACHMENT C

#### Form of System Impact Study Agreement

This Agreement dated \_\_\_\_\_\_, is entered into by \_\_\_\_\_\_ (the Transmission Customer) and New England Power Company (NEP), for the purpose of setting forth the terms, conditions and costs for conducting a System Impact Study relative to \_\_\_\_\_\_.

1. The Transmission Customer agrees to provide, in a timely and complete manner, all required information and technical data necessary for NEP to conduct the System Impact Study. The Transmission Customer understands that it must provide all such information and data prior to NEP's commencement of the Study. Such information and technical data is specified in Exhibit 1 to this Agreement.

2. All work pertaining to the System Impact Study that is the subject of this Agreement will be approved and coordinated only through designated and authorized representatives of NEP and the Transmission Customer. Each party shall inform the other in writing of its designated and authorized representative.

3. NEP will advise the Transmission Customer of any additional studies as it may in its sole discretion deem necessary. Any such additional studies shall be conducted only if required by Good Utility Practice and shall be subject to the Transmission Customer's consent to proceed, such consent not be unreasonably withheld.

4. NEP contemplates that it will require \_\_\_\_\_\_ to complete the System Impact Study. Upon completion of the Study by NEP, NEP will provide a report to the Transmission Customer based on the information provided and developed as a result of this effort. If, upon review of the Study results, the Transmission Customer decides to pursue \_\_\_\_\_\_, NEP will, at the Transmission Customer's direction, tender a Facilities Study Agreement within thirty (30) days. The System Impact and Facilities Studies, together with any additional studies contemplated in Paragraph 3, shall form the basis for the Transmission Customer's proposed use of NEP's transmission system and shall be furthermore utilized in obtaining necessary third-party approvals of any interconnection facilities and requested transmission services. The Transmission Customer or their agents, whether in preliminary or final form, prior to application approval pursuant to Section I.3.9 of the Tariff, is completely at the Transmission Customer's risk and that NEP

will not guarantee or warrant the completeness, validity or utility of study results prior to application approval pursuant to Section I.3.9 of the Tariff.

5. The estimated costs contained within this Agreement are NEP's good faith estimate of its costs to perform the System Impact Study contemplated by this Agreement. NEP's estimates do not include any estimates for wheeling charges that may be associated with the transmission of facility output to third parties or with rates for station service. The actual costs charged to the Transmission Customer by NEP may change as set forth in this Agreement. Prepayment will be required for all study, analysis, and review work performed by NEP or its Designated Agent, all of which will be billed by NEP to the Transmission Customer in accordance with Paragraph 6 of this Agreement.

6. The payment required is \$\_\_\_\_\_\_ from the Transmission Customer to NEP for the primary system analysis, coordination, and monitoring of the System Impact Study. NEP will, in writing, advise the Transmission Customer in advance of any cost increases for work to be performed if total amount increases by 10% or more. Any such changes to NEP's costs for the study work shall be subject to the Transmission Customer's consent, such consent not to be unreasonably withheld. The Transmission Customer shall, within thirty (30) days of NEP's notice of increase, either authorize such increases and make payment in the amount set forth in such notice, or NEP will suspend the System Impact Study and this Agreement will terminate if so permitted by the Federal Energy Regulatory Commission.

In the event this Agreement is terminated for any reason, NEP shall refund to the Transmission Customer the portion of the above credit or any subsequent payment to NEP by the Transmission Customer that NEP did not expend in performing its obligations under this Agreement. Any additional billings under this Agreement shall be subject to an interest charge computed in accordance with the provisions of the OATT. Payments for work performed shall not be subject to refunding except in accordance with Paragraph 7 below.

7. If the actual costs for the work exceed prepaid estimated costs, the Transmission Customer shall make payment to NEP for such actual costs within thirty (30) days of the date of NEP's invoice for such costs. If the actual costs for the work are less than those prepaid, NEP will credit such difference toward NEP costs unbilled, or in the event there will be no additional billed expenses, the amount of the overpayment will be returned to the Transmission Customer with interest computed as stated in Paragraph 6 of this Agreement, from the date of reconciliation.

8. Nothing in this Agreement shall be interpreted to give the Transmission Customer immediate rights to wheel over or interconnect with NEP's Transmission or Distribution System. Such rights shall be provided for under separate agreement and in accordance with the OATT.

9. Within one (1) year following NEP's issuance of a final bill under this Agreement, the Transmission Customer shall have the right to audit NEP's accounts and records at the offices where such accounts and records are maintained, during normal business hours; provided that appropriate notice shall have been given prior to any audit and provided that the audit shall be limited to those portions of such accounts and records that relate to service under this Agreement. NEP reserves the right to assess a reasonable fee to compensate for the use of its personnel time in assisting any inspection or audit of its books, records or accounts by the Transmission Customer or their Designated Agent.

10. Each party agrees to indemnify and hold the other party and its Affiliates, including affiliated trustees, directors, officers, employees, and agents of each of them, harmless from and against any and all damages, costs (including attorney's fees), fines, penalties and liabilities, in tort, contract, or otherwise (collectively "Liabilities") resulting from claims of third parties arising, or claimed to have arisen as a result of any acts or omissions of either party under this Agreement. Each party hereby waives recourse against the other party and its Affiliates for, and releases the other party and its Affiliates from, any and all Liabilities for or arising from damage to its property due to a performance under this Agreement by such other party.

11. If either party materially breaches any of its covenants hereunder, the other party may terminate this Agreement by filing a notice of intent to terminate with the Federal Energy Regulatory Commission and serving notice of same on the other party to this Agreement.

12. This agreement shall be construed and governed in accordance with the laws of the Commonwealth of Massachusetts and with Part II of the Federal Power Act, 16 U.S.C. §§824d et seq., and with Part 35 of Title 18 of the Code of Federal Regulations, 18 C.F.R. §§35 et seq.

13. All amendments to this Agreement shall be in written form executed by both parties.

14. The terms and conditions of this Agreement shall be binding on the successors and assigns of either party.

15. This Agreement will remain in effect for a period of up to two years from its effective date as permitted by the Federal Regulatory Commission, and is subject to extension by mutual agreement. Either party may terminate this Agreement by thirty (30) days' notice except as is otherwise provided herein. If this Agreement expires by its own terms, it shall be NEP's responsibility to make such filing.

NEP:

Ву:			
Name	Title	Date	
Transmission Cu	stomer:		
Bv:			

Title

Name

Date

# System Impact Study Agreement EXHIBIT 1

# Information to be Provided to NEP by the Transmission Customer for System Impact Study

# 1.0 Facilities Identification

1.1 Requested capability in MW and MVA; summer and winter

1.2 Site location and plot plan with clear geographical references

1.3 Preliminary one-line diagram showing major equipment and extent of Transmission Customer ownership

1.4 Auxiliary power system requirements

1.5 Back-up facilities such as standby generation or alternate supply sources

## 2.0 Major Equipment

2.1 Power transformer(s): rated voltage, MVA and BIL of each winding, LTC and or NLTC taps and range, Z1 (positive sequence) and Z0 (zero sequence) impedances, and winding connections. Provide normal, long-time emergency and short-time emergency thermal ratings.

2.2 Generator(s): rated MVA, speed and maximum and minimum MW output, reactive capability curves, open circuit saturation curve, power factor (V) curve, response (ramp) rates, H (inertia), D (speed damping), short circuit ratio, X1 (leakage), X2 (negative sequence), and X0 (zero sequence) reactances and other data:

	Direct	Quadrature
	Axis	Axis
saturated synchronous reactance	Xdv	Xqv

	Direct	Quadrature
	Axis	Axis
unsaturated synchronous reactance	Xdi	Xqi
saturated transient reactance	X'dv	X'qv
unsaturated transient reactance	X'di	X'qi
saturated subtransient reactance	X"dv	X"qv
unsaturated subtransient reactance	X"di	X"qi
transient open-circuit time	T'do	T'qo
constant		
transient short-circuit time	T'd	T'q
constant		
subtransient open-circuit time	T"do	T"'qo
constant		
subtransient short-circuit time	T"d	T"q
constant		

2.3 Excitation system, power system stabilizer and governor: manufacturer's data in sufficient detail to allow modeling in transient stability simulations.

2.4 Prime mover: manufacturer's data in sufficient detail to allow modeling in transient stability simulations, if determined necessary.

2.5 Busses: rated voltage and ampacity (normal, long-time emergency and short-time emergency thermal ratings), conductor type and configuration.

2.6 Transmission lines: overhead line or underground cable rated voltage and ampacity (normal, long-time emergency and short-time emergency thermal ratings), Z1 (positive sequence) and Z0 (zero sequence) impedances, conductor type, configuration, length and termination points.

2.7 Motors greater than 150 kW 3-phase or 50 kW single-phase: type (induction or synchronous), rated hp, speed, voltage and current, efficiency and power factor at ½, 3/4 and full load, stator resistance and reactance, rotor resistance and reactance, magnetizing reactance.

2.8 Circuit breakers and switches: rated voltage, interrupting time and continuous, interrupting and momentary currents. Provide normal, long-time emergency and short-time emergency thermal ratings.

2.9 Protective relays and systems: ANSI function number, quantity manufacturer's catalog number, range, descriptive bulletin, tripping diagram and three-line diagram showing AC connections to all relaying and metering.

2.10 CT's and VT's: location, quantity, rated voltage, current and ratio.

2.11 Surge protective devices: location, quantity, rated voltage and energy capability.

## 3.0 Other

3.1 Additional data to perform the System Impact Study will be provided by the Transmission Customer as requested by NEP.

3.2 NEP reserves the right to require specific equipment settings or characteristics necessary to meet the applicable criteria and standards.

# ATTACHMENT D

#### Form of Facilities Study Agreement

This agreement dated \_\_\_\_\_\_, is entered into by \_\_\_\_\_\_ (the Transmission Customer) and New England Power Company (NEP), for the purpose of setting forth the terms, conditions and costs for conducting a Facilities Study Agreement relative to \_\_\_\_\_\_. The Facilities Study will determine the detailed engineering, design and cost of the facilities necessary to satisfy the Transmission Customer's request for service over NEP's Transmission System.

1. The Transmission Customer agrees to provide, in a timely and complete manner, all required information and technical data necessary for NEP to conduct the Facilities Study. Where such information and technical data was provided for the System Impact Study, it should be reviewed and updated with current information, as required.

2. All work pertaining to the Facilities Study that is the subject of this Agreement will be approved and coordinated only through designated and authorized representatives of NEP and the Transmission Customer. Each party shall inform the other in writing of its designated and authorized representative.

3. NEP will advise the Transmission Customer of additional studies as may be deemed necessary by NEP. Any such additional studies shall be conducted only if required by Good Utility Practice and shall be subject to the Transmission Customer's consent to proceed, such consent not to be unreasonably withheld.

4. NEP contemplates that it will require \_\_\_\_ days to complete the Facilities Study. Upon completion of the study by NEP, NEP will provide a report to the Transmission Customer based on the information provided and developed as a result of this effort. If, upon review of the study results, the Transmission Customer decides to pursue its transmission service request, the Transmission Customer must sign a supplemental Service Agreement with NEP. The System Impact and Facilities Studies, together with any additional studies contemplated in Paragraph 3, shall form the basis for the Transmission Customer's proposed use of NEP's Transmission System and shall be furthermore utilized in obtaining necessary third-party approvals of any facilities and requested transmission services. The Transmission Customer understands and acknowledges that any use of the study results by the Transmission Customer or their agents, whether in preliminary or final form, prior to application approval

pursuant to Section I.3.9 of the Tariff, is completely at the Transmission Customer's risk and that NEP will not guarantee or warrant the completeness, validity or utility of the study results prior to application approval pursuant to Section I.3.9 of the Tariff.

5. The estimated costs contained within this Agreement are NEP's good faith estimate of its costs to perform the Facilities Study contemplated by this Agreement. NEP's estimates do not include any estimates for wheeling charges that may be associated with the transmission of facility output to third parties or with rates for station service. The actual costs charged to the Transmission Customer by NEP may change as set forth in this Agreement. Prepayment will be required for all study, analysis, and review work performed by NEP's or its Designated Agent's personnel, all of which will be billed by NEP to the Transmission Customer in accordance with Paragraph 6 of this Agreement.

6. The payment required is \$\_\_\_\_\_ from the Transmission Customer to NEP for the primary system analysis, coordination, and monitoring of the Facilities Study to be performed by NEP for the Transmission Customer's requested service. NEP will, in writing, advise the Transmission Customer in advance of any cost increases for work to be performed if the total amount increases by 10% or more. Any such changes to NEP's costs for the study work to be performed shall be subject to the Transmission Customer's consent, such consent not to be unreasonably withheld. The Transmission Customer shall, within thirty (30) days of NEP's notice of increase, either authorize such increases and make payment in the amount set forth in such notice, or NEP will suspend the study and this Agreement will terminate if so permitted by the Federal Energy Regulatory Commission. In the event this Agreement is terminated for any reason, NEP shall refund to the Transmission Customer that NEP did not expend in performing its obligations under this Agreement. Any additional billings under this Agreement shall be subject to an interest charge computed in accordance with the provisions of the OATT. Payments for work performed shall not be subject to refunding except in accordance with Paragraph 7 below.

7. If the actual costs for the work exceed prepaid estimated costs, the Transmission Customer shall make payment to NEP for such actual costs within thirty (30) days of the date of NEP's invoice for such costs. If the actual costs for the work are less than that prepaid, NEP will credit such difference toward NEP costs unbilled, or in the event there will be no additional billed expenses, the amount of the overpayment will be returned to the Transmission Customer with interest computed in accordance with the provisions of the OATT.

8. Nothing in this Agreement shall be interpreted to give the Transmission Customer immediate rights to interconnect to or wheel over NEP's Transmission or Distribution System. Such rights shall be provided for under separate agreement.

9. Within one (1) year following NEP's issuance of a final bill under this Agreement, the Transmission Customer shall have the right to audit NEP's accounts and records at the offices where such accounts and records are maintained during normal business hours; provided that appropriate notice shall have been given prior to any audit and provided that the audit shall be limited to those portions of such accounts and records that relate to service under this Agreement. NEP reserves the right to assess a reasonable fee to compensate for the use of its personnel time in assisting any inspection or audit of its books, records or accounts by the Transmission Customer or their Designated Agent.

10. Each party agrees to indemnify and hold the other party and its Affiliates, including affiliated trustees, directors, officers, employees, and agents of each of them, harmless from and against any and all damages, costs (including attorney's fees), fines, penalties and liabilities, in tort, contract, or otherwise (collectively "Liabilities") resulting from claims of third parties arising, or claimed to have arisen as a result of any acts or omissions of either party under this Agreement. Each party hereby waives recourse against the other party and its Affiliates for, and releases the other party and its Affiliates from, any and all Liabilities for or arising from damage to its property due to performance under this Agreement by such other party.

11. If any party materially breaches any of its covenants hereunder, the other party may terminate this Agreement by filing a notice of intent to terminate with the Federal Energy Regulatory Commission and serving notice of same on the other party to this Agreement.

12. This agreement shall be construed and governed in accordance with the laws of the Commonwealth of Massachusetts and with Part II of the Federal Power Act, 16 U.S.C. §§824d et seq., and with Part 35 of Title 18 of the Code of Federal Regulations, 18 C.F.R. §§35 et seq.

13. All amendments to this Agreement shall be in written form executed by both parties.

14. The terms and conditions of this Agreement shall be binding on the successors and assigns of either party.

15. This Agreement will remain in effect for a period of up to two years from its effective date as permitted by the Federal Energy Regulatory Commission, and is subject to extension by mutual agreement.

Either party may terminate this Agreement by thirty (30) days' notice except as is otherwise provided herein. If this Agreement expires by its own terms, it shall be NEP's responsibility to make such filing. NEP:

By:			
Name	Title	Date	
Transmission Custome	r:		
By:			
Name	Title	Date	

# ATTACHMENT E

#### Local Service Agreement

# Policy and Practices for Protection Requirements For New or Modified Load Interconnections

Any load facility, hereafter called a LF, desiring to interconnect with NEP's electrical system or modify an existing interconnection must meet the technical specifications and requirements set forth in this Policy and Practices. Once interconnected, NEP, in keeping with Good Utility Practice and in its sole discretion, may disconnect the LF if the LF departs from the technical specifications and requirements of this Policy and Practices. The LF must return to full compliance with this Policy prior to reconnecting with NEP's electrical system.

If it is possible for the LF to be a significant source of current flow into NEP's lines due to generation sources within the LF system then NEP may determine the LF to be considered a Generation Facility and the Policy and Practices for Protection Requirements for Generation Interconnections shall apply as set forth in the New England ISO OATT.

This document is divided into the following sections:

- 1. Protection Information Required from the LF for All Interconnections
- 2. General Protection Requirements for All LF Interconnections
- 3. Protection Equipment Requirements for All LF Interconnections
- 4. Requirements for Protection of NEP's System
- 5. Requirements for Protection of NEP's System: Facilities Having Sources
- 6. Requirements for Emergency Load Reduction
- 7. Protection System Testing and Maintenance
- 8. Changes to the LF's Protection System

# 1.) PROTECTION INFORMATION REQUIRED FROM THE LF FOR ALL INTERCONNECTIONS

A. The following information must be submitted by the LF for review and acceptance by NEP prior to finalizing the LF's protection design:

- A station one-line drawing.
- A one-line drawing showing the relays and metering including current transformer (CT) and voltage transformer (VT) connections and ratios.
- A three-line drawing showing the AC connections to the relays and meters.
- The LF's transformer nameplate information including rated voltage, rated KVA, positive and zero sequence impedances and winding connections.
- A list of protective relay equipment proposed to be furnished to conform with this Policy and Practices including: relay types, styles, manufacturer's catalog numbers, ranges and descriptive bulletins.
- Schematic drawings showing the control circuits for the interconnection breaker(s) or equivalent interrupting device(s).
- Equipment specifications for CTs and VTs relevant to the interconnection.
- Interconnection breaker or equivalent interrupting device operating time.
- Other information that may be determined by NEP as required for a specific interconnection.

B. Relay settings for all LF protective relays that affect the interconnection with NEP's system must be submitted by the LF for review and acceptance by NEP at least four weeks prior to the scheduled date for setting the relays.

C. If, due to the interconnection of the LF to the line, the fault interrupting, continuous, momentary or other rating of any of NEP's equipment or the equipment of others connected to NEP's system is exceeded, NEP shall have the right to require the LF to pay for the purchase, installation, replacement or modification of equipment to eliminate the condition. Where such action is deemed necessary by NEP, NEP will, where possible, permit the LF to choose among two or more options for meeting NEP's requirements as described in this Policy and Practices.

## 2.) GENERAL PROTECTION REQUIREMENTS FOR ALL LF INTERCONNECTIONS

A. A circuit breaker, or other fault interrupting method acceptable to NEP, shall be installed to isolate the LF from NEP's system. This will hereafter be called the "interconnection breaker". If there is more than one interconnection breaker, the requirements of this Policy and Practices apply to each one individually.

B. NEP will review the relay settings as submitted by the LF to assure adequate protection for NEP's facilities. NEP shall not be responsible for the protection of the LF's facilities. Providing the relaying is installed and maintained as reviewed, the LF shall not be responsible for the protection of NEP's facilities. The LF shall be responsible for protection of its system against possible damage resulting from interconnection with NEP.

If requested by the LF, NEP will provide system protection information for the line terminal(s) directly related to the interconnection. This protection information is provided exclusively for use by the LF in evaluating protection of the LF's facilities during parallel operation.

C. NEP shall specify whether the transformer, if any, between NEP's voltage and the LF's distribution voltage, hereafter called the "LF's transformer", is to be grounded or ungrounded at NEP's voltage.

# 3.) PROTECTION EQUIPMENT REQUIREMENTS FOR ALL LF INTERCONNECTIONS

A. The interconnection breaker control circuits shall be DC powered from a station battery.

B. The LF shall provide a switch at the Interconnection Point with NEP that can be opened for isolation. NEP shall have the right to open the interconnection during emergency conditions or with due notice to the LF at other times. NEP shall exercise such right in accordance with Good Utility Practice. The switch shall be gang operated, have a visible break when open, and be capable of being locked open, tagged and grounded on NEP side by NEP personnel. The switch shall be of a manufacture and type generally accepted for use by NEP.

C. Protective relaying control circuits shall be DC powered from a station battery. Solid state relays shall be self powered or DC powered from a station battery.

D. CT ratios and accuracy classes shall be chosen such that secondary current is less than 100 amperes and transformation errors are less than 10% under maximum fault conditions.

E. All protective relays required by this Policy and Practices shall meet ANSI/IEEE standard C37.90 and be of a manufacture and type generally accepted for use by NEP.

F. Protective relays provided by the LF as required per this Policy and Practices shall be sufficiently redundant and functionally separate so as to provide adequate protection, as determined by NEP, upon the failure of any one component. The use of a single all-inclusive relay package is not acceptable.

G. NEP may require the LF to provide two independent, redundant relaying systems in accordance with NPCC Criteria for the Protection of the Bulk Power System if the interconnection is to the Bulk Power System or if it is determined that delayed clearing of faults within the LF adversely affects the Bulk Power System.

H. A direct transfer tripping system, if provided, shall use equipment generally accepted for use by NEP and shall, at the option of NEP, use dual channels.

## 4.) REQUIREMENTS FOR PROTECTION OF THE TRANSMISSION SYSTEM

A. The LF must provide protective relays to detect any faults, whether phase-to-phase or phase-toground within the LF, and isolate the LF from NEP's line(s) such that the following criteria are met, as determined by NEP:

- The existing sensitivity of fault detection is not substantially degraded.
- The existing speed of fault clearing is not substantially degraded.
- The coordination margin between relays is not substantially reduced.
- The sustained unfaulted phase voltage during a line-to-ground fault is not increased beyond 1.25 times the normal phase-to-ground voltage. (This value may be further reduced if required to coordinate with existing system insulation levels and overvoltage protection.)
- Non-directional line relays will not operate for faults external to the line due to the LF's contribution.
- Proper settings for existing relays are achievable within their ranges.

NEP may perform engineering studies to evaluate the LF's protection compliance with respect to the above and may make recommendations to the LF on methods to achieve compliance.

If, due to the interconnection of the LF to NEP's system, any of the above criteria are violated for NEP's facilities or for the facilities of others connected to NEP's system, NEP shall have the right to require the

LF to pay for the purchase, installation, replacement or modification of protective equipment to eliminate the violation and restore the level of protection existing prior to the interconnection. This may include the addition of pilot relaying systems involving communications between all terminals. Where such action is deemed necessary by NEP, NEP will, where possible, permit the LF to choose among two or more options for meeting NEP's requirements as described in this Policy and Practices.

B. The LF is responsible for procuring any communications channels necessary between the LF and NEP's stations and for providing protection from transients and overvoltages at all ends of these communication channels.

C. The LF may be required to use high speed protection if time-delayed protection would result in degradation in the existing sensitivity or speed of the protection systems on NEP's lines.

D. The LF may be required to provide local breaker failure protection which may include direct transfer tripping to NEP's line terminal(s) in order to detect and clear faults within the LF that cannot be detected by NEP's back-up protection.

# 5.) REQUIREMENTS FOR PROTECTION OF THE TRANSMISSION SYSTEM: FACILITIES HAVING SOURCES

If it is possible for the LF to be a source of current flow into NEP's system, either due to generation within the LF system or due to connections within the LF system to other sources, the LF must provide protective relays to detect any faults, whether phase-to-phase or phase-to-ground on NEP's lines or within the LF, and isolate the LF from NEP's line(s) per the requirement of Section 4 above and the following:

A. A control interlock scheme that detects voltage on NEP's line(s) shall be used to prevent an interconnection breaker from closing to energize NEP's line(s).

B. A voltage transformer shall be provided by the LF, connected to NEP side of the interconnecting breaker. The voltage from this VT shall be used in the interlock as specified in Section 5A above. If the LF's connection is ungrounded at NEP voltage, this VT shall be a single three-phase device or three single-phase devices connected from each phase to ground, rated for phase-to-phase voltage and provided with two secondary windings. One winding shall be connected in open delta, have a loading resistor to prevent ferroresonance, and be used for the relay specified in Section 5C below.

C. If the LF's connection to NEP's system is un-grounded, the LF shall provide a zero sequence overvoltage relay fed from the open delta of the three phase VT specified in Section 5B above.

D. NEP's lines generally have automatic reclosing following a trip with reclosing times as short as five seconds and without regard to whether the LF is keeping the circuit energized. The LF is responsible for protecting its equipment from being reconnected out of synchronism with NEP's system by an automatic line reclosure operation. The LF may choose to install additional equipment such as direct transfer tripping from NEP's station(s) to insure the LF is off the line prior to the line reclosing.

# 6.) **REQUIREMENTS FOR EMERGENCY LOAD REDUCTION**

A. The LF shall provide a manual load shed lockout relay to trip and block closing of selected load feeders. This relay shall be operated via a signal sent from an area dispatching center to a remote terminal unit (RTU) provided by the LF and shall be manually reset. The selection of feeders to trip shall be in conformance with NPCC Emergency Operation Criteria and determined by the area control authority. Alternatively, the LF may elect to provide compensatory load reduction through contractual arrangements with other area customers or by other means.

B. During system conditions where local area load exceeds generation, NPCC Emergency Operation Criteria requires a program of phased automatic underfrequency load shedding of up to 25% of area load to assist in arresting frequency decay and to minimize the possibility of system collapse. In conformance to these criteria, the LF shall provide an underfrequency relay with a lockout function to trip and block closing of selected load feeders. Feeders so shed shall not be re-energized without the express permission of the area control authority. If desired, the LF may use the RTU specified in Section 6A above to receive a signal sent from an area dispatching center that would reset the lockout function and permit automatic restoration of the feeders. The underfrequency settings and the selection of feeders shall be in conformance with these Criteria and determined by the area control authority. Alternatively, the LF may elect to provide compensatory load reduction to conform with the requirements of this Section through contractual arrangements with other area customers or by other means.

C. The LF shall provide a voltage reduction function to reduce the feeder voltage regulation set point by 5% for all load feeders. This function shall be operated via a signal sent from an area dispatching

center to an RTU provided by the LF and shall be remotely reset from the dispatching center or self reset in 4 hours.

D. Depending on the point of connection of the LF to NEP's system, NEP may require a dead station tripping function to disconnect the LF from NEP's lines following six minutes of de-energized NEP lines in order to assist in restoration of service following an area or system wide shutdown.

# 7.) PROTECTION SYSTEM TESTING AND MAINTENANCE

A. NEP shall have the right to witness the testing of protective relays and control circuits required by this Policy and Practices at the completion of construction and to receive a copy of all test data. The LF shall provide NEP with at least a one week notice prior to the final scheduling of these tests. Testing shall consist of:

- CT and CT circuit polarity, ratio, insulation, excitation, continuity and burden tests.
- VT and VT circuit polarity, ratio, insulation and continuity tests.
- Relay pick-up and time delay tests.
- Functional breaker trip tests from protective relays.
- Relay in-service test to check for proper phase rotation and magnitudes of applied currents and voltages.
- Breaker closing interlock tests.
- Other relay commissioning tests typically performed for the relay types involved.

B. The protective relays shall be tested and maintained by the LF on a periodic basis but not less than once every four years or as determined by NEP. The results of these tests shall be summarized by the LF and reported in writing to NEP.

For relays installed in accordance with the NPCC Criteria for the Protection of the Bulk Power System, maintenance intervals shall be in accordance with the NPCC Maintenance Criteria for Bulk Power System Protection. The status of conformance with the NPCC Maintenance Criteria for Bulk Power System Protection shall be reported in writing to NEP annually.

## 8.) CHANGES TO THE LF'S PROTECTION SYSTEM

The LF must provide NEP with reasonable advance notice of any proposed changes to be made to the protective relay system, relay settings, operating procedures or equipment that affect the interconnection. NEP will determine if such proposed changes require re-acceptance of the interconnection per the requirements of this Policy and Practices.

In the future, should NEP implement changes to the system to which the LF is interconnected, the LF will be responsible at its own expense for identifying and incorporating any necessary changes to its protection system. Those changes to the LF's protection system are subject to review and approval by NEP.

# ATTACHMENT F

## Local Service Agreement

## **Insurance Requirements**

During the term of this Agreement, the interconnecting Transmission Customer, at its own cost and expense, shall procure and maintain insurance in the forms and amounts acceptable to NEP at the following minimum levels of coverage:

1) Statutory coverage for workers' compensation, and Employer's Liability Coverage with a limit no less than \$500,000.00 per accident;

2) Comprehensive General Liability Coverage including Operations, Contractual Liability and Broad Form Property Damage Liability written with limits no less than \$5,000,000.00 combined single limit for Bodily Injury Liability and Property Damage Liability; and

3) Automobile Liability for Bodily Injury and Property Damage to cover all vehicles used in connection with the work with limits no less than \$1,000,000.00 combined single limit for Bodily Injury and Property Damage Injury.

Prior to commencing the work, the interconnecting Transmission Customer shall have its insurer furnish to NEP certificates of insurance evidencing the insurance coverage required above and the interconnecting Transmission Customer shall notify and send copies to NEP of any policies maintained hereunder written on a "claims-made" basis. NEP may at its discretion require the interconnecting Transmission Customer to maintain tail coverage for five years on all policies written on a "claims-made" basis.

Every contract of insurance providing the coverages required in this provision shall contain the following or equivalent clause: "No reduction, cancellation or expiration of the policy shall be effective until thirty (30) days from the date written notice thereof is actually received by the interconnecting Transmission Customer. Upon receipt of any notice of reduction, cancellation or expiration, the interconnecting Transmission Customer shall immediately notify NEP.

NEP and its Affiliates shall be named as additional insureds, as their interests may appear, on the Comprehensive General Liability and Automobile Liability policies described above.

The interconnecting Transmission Customer shall waive all rights of recovery against NEP for any loss or damage covered by said policies. Evidence of this requirement shall be noted on all certificates of insurance provided to NEP.

## ATTACHMENT H

## Methodology for Completing System Impact Study

When New England Power Company ("NEP") determines on a non-discriminatory basis that a System Impact Study is needed because its Transmission System will be inadequate to accommodate a request for service, the following outlines the study methodology that NEP will employ to estimate the transmission system impact of a request for firm Transmission Service and/or any Costs for System Redispatch, Direct Assignment Facilities or Network Upgrades that would be incurred in order to provide the requested transmission service.

- 1. System Impact will be estimated based on consideration of reliability requirements to
  - . meet obligations under agreements that predate the OATT;
  - . meet obligations of existing and pending Valid Requests under the OATT; and
  - . maintain thermal, voltage and stability system performance within acceptable regional practices

2. Guidelines and Principles followed by NEP - NEP is a Participating Transmission Owner under the TOA and the Tariff and a member of the NPCC. When performing the System Impact Study, NEP will apply the following, as amended and/or adopted from time to time.

- . Good Utility Practice;
- . Criteria rules and reliability standards applicable to the New England Transmission System;
- . NPCC criteria and guidelines; and
- . New England Power Service Company (or its successor) guides

**3. Transmission System Model Representation** - The Transmission System Model will be based on a library of loadflow cases prepared by the ISO for studies of the New England area. The models may include representations of other NPCC and neighboring systems. These loadflow cases include individual system model representations provided by members of the ISO and represent forecasted system conditions for up to ten years in to the future. This library of loadflow cases is maintained and updated as appropriate by the ISO, and is consistent with information filed under FERC Form 715. NEP will use system models that it deems appropriate for study of the Request for Service. Additional system models and operating conditions, including assumptions specific to a particular analysis, may be developed for conditions not available in the library of loadflow cases. The system models may be modified, if necessary, to include additional system information on load, transfers and configuration, as it becomes available.

4. System Conditions - Loading of all transmission system elements shall be less than normal ratings for precontingency conditions and less than long-term emergency (LTE) ratings for post-contingency conditions. Post-contingency loading above LTE rating and less than short-term emergency (STE) rating may be allowed where demonstrated that loading can be reduced below the LTE rating within 15 minutes.

Transmission system voltages shall be within the applicable design ratings of connected equipment for normal and emergency conditions. Normal and post-contingency voltages shall be in accordance with NEP and ISO standards.

**5. Short Circuits** - Transmission system short circuit currents shall be within the applicable equipment design ratings.

**6. Study Analysis** - System impact of the integration of new generators will be evaluated to meet the requirements of design, identified in the guidelines and principles under Item 2, to provide sufficient transmission capability to maintain stability and to maintain thermal and voltage levels of lines and equipment within applicable limits. The same applies to the evaluation of transmission and delivery service under this tariff.

**7. Loss Evaluation** - The impact of losses on the Transmission System will be taken into account in the System Impact Study to ensure Good Utility Practice in the design and operation of its system.

8. System Protection - Protection requirements will be evaluated by NEP.

**9. Approvals** - NEP will conduct the System Impact Study to ensure compliance with its planning and design policies and practices. However, the actions to be taken by the Parties to implement the recommendations of the System Impact Study are subject to approval under the ISO New England Operating Procedures or Section I.3.9 of the Tariff, as amended and/or adopted from time to time.

**10. Study Scope and Reporting** - The study will determine the impacts and identify changes required, if any, to NEP's existing Transmission System. NEP will provide the Eligible Customer with a written report of the physical interconnection alternative(s), required NEP system additions and/or modifications, if any, associated study grade cost estimates (+/-25%) and the results of the analysis.

## ATTACHMENT I

# **Real Power Losses Factors**

Voltage Class	Losses as a % of
kV	Energy Delivered
Stepdown transformer*	1.00
69	1.25**
34.5	1.98
23	2.61
15	4.18
5	4.34
Dist. Secondary	0.52

\*The transformer that steps the voltage from the transmission level to the delivery level.

\*\*The loss factor for the 69 kV level applies only when the Point of Delivery is not directly interconnected with the PTF.

Note: When multiple voltage levels are present between the Point of Delivery and the metering point, the loss factors are additive.

# ATTACHMENT DAF

#### **Direct Assignment Facilities**

This Attachment applies to all transactions that utilize any Direct Assignment Facilities or any other charges specifically assigned to a customer by NEP under this Schedule or the OATT. The formula set forth in this Attachment, as it may be amended from time to time, represents the Direct Assignment Facilities Charge which a Transmission Customer or Network Customer (together, "Transmission Customer") will pay in addition to the other applicable charges specified herein.

The determination of the annual Direct Assignment Facilities Charges chargeable to a specific Transmission Customer or group of Transmission Customers shall be calculated by the Annual Facility Charge formulas set forth below for transmission and distribution facilities. In no event will the Annual Facilities Charge be less than \$1,000 per calendar year.

## TRANSMISSION

## **Determination of Annual Facilities Charges for Transmission Facilities**

The basis for this charge is data of NEP. The Annual Facilities Charge for NEP and its New England Affiliates shall equal the product of the year-end Gross Plant Investment associated with the facility and the average Annual Transmission Carrying Charge, for the life of the facility.

The Gross Plant Investment will be the investment from the plant accounting records associated with the facility.

The average Annual Transmission Carrying Charge shall be the Annual Transmission Revenue Requirement as determined in Attachment RR, Sections I. (A) through I. (H) to this Schedule, divided by the year-end balance of total transmission plant investment determined in accordance with Attachment RR, Section I. (A) (1) (a) to this Schedule.

To the extent that the Transmission Customer provides a Contribution in Aid of Construction the average Annual Transmission Carrying Charge calculation will be modified to exclude Sections I. (A) (1) (a), I. (A) (1) (d), I. (A) (1) (e), I. (A) (1) (f), I. (B), and I. (C) of Attachment RR to this Schedule.

If the Transmission Customer permanently terminates service prior to the normal expiration of its Service Agreement, the Transmission Customer may, at its option, close out its continuing obligation to pay the Annual Facilities Charge by paying NEP a lump sum payment equal to the net present value of the Return and Depreciation Expense on the net book value of the facility at the time of termination that would have been collected over the remaining life of the facility, plus any cost of removal if applicable. The return shall be equal to that found in Attachment RR, Section I. (A)(2) to this Schedule, in the year of termination. Depreciation Expense shall be based on a straight-line method. The discount rate in the net present value calculation shall be equal to the interest rate pursuant to Section 35.19(a) of the Commission's regulations effective at the time of termination.

Billings shall initially be based upon estimates calculated based on actual costs in the preceding year, such estimates being adjusted to actual as soon as practicable after such costs become known. The source of the data shall be NEP's accounting records.

# DISTRIBUTION

## Determination of the Annual Facilities Charge for Distribution Facilities

The basis for this charge is data of NEP's New England Affiliate(s) or any other Affiliate that shall assume ownership over the Facilities included under this attachment.

The Annual Facilities Charge shall equal the product of the year-end Gross Plant Investment associated with the facility and the average Annual Distribution Carrying Charge, for the life of the facility.

The Gross Plant Investment will be the investment from the plant accounting records associated with the facility.

The average Annual Distribution Carrying Charge shall be the Annual Distribution Revenue Requirement as determined in Attachment RR, Exhibit 1 to this Schedule, divided by the year-end balance of total distribution plant investment determined in accordance with Attachment RR, Exhibit 1, Section I. (A) (1) (a) to this Schedule.

To the extent that the Transmission Customer provides a Contribution in Aid of Construction the average Annual Distribution Carrying Charge calculation will be modified to exclude Sections I. (A) (1) (a), I. (A) (1) (d), I. (A) (1) (e), I. (A) (1) (f), I. (B), and I. (C) of Attachment RR, Exhibit 1 to this Schedule.

If the Transmission Customer permanently terminates service in advance of the term of its Service Agreement, the Transmission Customer may, at its option, close out its continuing obligation to pay the Annual Facilities Charge by paying NEP a lump sum payment equal to the net present value of the Return and Depreciation Expense on the net book value of the facility at the time of termination that would have been collected over the remaining life of the facility, plus any cost of removal if applicable. The return shall be equal to that found in Attachment RR, Exhibit 1, Section I.(A)(2) to this Schedule, in the year of termination. Depreciation Expense shall be based on a straight-line method. The discount rate in the net present value calculation shall be equal to the interest rate pursuant to Section 35.19(a) of the Commission's regulations effective at the time of termination.

Billings in accordance with this Schedule shall initially be based upon estimates calculated based on actual costs in the preceding year, such estimates being adjusted to actual as soon as practicable after such costs become known. The source of the data shall be NEP's or its applicable New England Affiliate's accounting records.

# METERS

### **Determination of Annual Metering Charges**

The Meter Maintenance Charge shall equal the product of NEP's installed metering costs for the customer and the Meter Carrying Charge determined in Attachment OCC, Exhibit 3 to this Schedule.

In accordance with the Meter Carrying Charge referenced above, the Annual Metering Charges will be updated on May 31 each year to reflect costs from the prior calendar year.

If the customer makes a CIAC, then the carrying charge in Attachment OCC, Exhibit 3 to this Schedule, will be adjusted accordingly.

### ATTACHMENT DS

# **Rolled-In Distribution Surcharge**

The monthly Rolled-in Distribution Surcharge shall be (i) the monthly cost per kilowatt of \$2.77, multiplied by (ii) the annual peak load of the Transmission Customer on the distribution system of NEP's applicable New England Affiliate(s) from the prior calendar year. Notwithstanding the foregoing, this provision will not apply to the Transmission Customer's Network Load taking service under the Specific Distribution Surcharge.

### ATTACHMENT OCC

#### **Other Charges & Credits**

The following charges and credits may apply to a Transmission Customer or Network Customer, as applicable:

#### I. Monthly Demand Charge:

Pursuant to Section 24.1 of this Schedule, the Network Customer will pay a monthly charge determined by multiplying its Load Ratio Share by the NEP's Monthly Local Network Transmission Expense as calculated in accordance with Exhibit 2 of this Attachment.

### II. Monthly Non-PTF Demand Charge:

Pursuant to Section 24.2 of this Schedule, the Network Customer will pay a monthly charge determined by multiplying its Non-PTF Load Ratio Share by the Monthly Non-PTF Transmission Expense calculated in accordance with Attachment RR to this Schedule.

#### III. Transformer Surcharge:

Pursuant to Section 24.3 of this Schedule, the Transmission Customer or Network Customer will pay a monthly surcharge computed in accordance with Exhibit 1 of this Attachment.

This charge shall be multiplied by the Network Customer's Annual Peak Load, from the prior calendar year (coinciding with the calendar year used to calculate the Transformer Surcharge) in Exhibit 1 of this Attachment.

### IV. Meter Surcharge:

The monthly meter surcharge shall be computed in accordance with Exhibit 3 of this Attachment multiplied by the number of NEP meters necessary to measure the delivery of transmission service to the Transmission Customer or Network Customer.

#### V. Power Factor Penalty:

Pursuant to Section 20.1 of this Schedule, a Network Customer or Transmission Customer will pay a Monthly Power Factor Penalty of \$0.62 multiplied by the customer's deficient kilovars.

### VI. Specific Distribution Surcharge:

The monthly Specific Distribution Surcharge shall be available to the following Network Customers Georgetown Municipal Light Dept. Ipswich Municipal Light Dept. Princeton Electric Light Dept. Hull Municipal Lighting Plant Granite State Electric Green Mountain Power Corp. Groveland Municipal Light Dept. Merrimac Municipal Light Dept. Rowley Municipal Light Dept.

The monthly Specific Distribution Surcharge shall equal \$.70 per KW month multiplied by the customer's Annual Peak Load from the prior calendar year.

### VII. Network Load Dispatch Surcharge:

The monthly Network Load Dispatch Surcharge shall equal the monthly Dispatching Expense, Account 561, as defined in Attachment RR, Section I.G. to this Schedule, less any revenue received by NEP from the ISO for load dispatching services, multiplied by the Network Customer's Load Ratio Share.

### VIII. [Reserved]

### IX. Network EPRI Credit:

The Network EPRI Credit shall be determined by multiplying the Monthly Transmission-Related EPRI Expenses by the customer's Non-PTF Network Load Ratio Share.

The Monthly Transmission-Related EPRI Expenses shall equal themonthly EPRI Expenses as recorded in Account 930.

### X. [Reserved]

### XI. Pre-1997 RNS Revenue Credit:

The Pre-1997 RNS Revenue Credit will apply in the subsequent month's billing for the period June 1, 2001 through March 1, 2008, unless the transitional arrangements for the period prior to March 1, 2008 are otherwise amended.

### **Transformer Surcharge**

I. No later than May 31 of each calendar year, the Transformer Surcharge will be calculated based on the prior calendar year's annual costs. The annual costs for Transformation Facilities service shall be the year-end balance of transmission plant investment in transformers included in Attachment RR, Section I. (A)(1)(a) to this Schedule multiplied by the Average Annual Carrying Charge.

II. The Average Annual Carrying Charge shall be the Annual Transmission Revenue Requirement as determined in Attachment RR, Sections I. (A) through I. (H) to this Schedule, divided by the year-end balance of total transmission plant investment included in Attachment RR, Section I. (A)(1)(a) to this Schedule.

III. To determine the monthly Transformer Surcharge rate, the annual costs for transformation service will be divided by the Annual Peak Loads of that portion of all Transmission Customers' or Network Customers' load receiving such transformation service under this Schedule, and further divided by 12.

### Monthly Local Network Transmission Expense

I. The Monthly Local Network Transmission Expense shall be the monthly balance of PTF Transmission Plant investment included in Attachment RR, Section I. (A)(1)(a) to this Schedule multiplied by the Monthly Carrying Charge, less any revenue received from the ISO associated with transmission-related services provided under the OATT.

II. The Monthly Carrying Charge shall be the Monthly Transmission Revenue Requirement as determined in accordance with Attachment RR to this Schedule, excluding any revenue credits associated with Transmission-related revenues from the ISO and revenues under Section 24.1 of this Schedule and as specified in Attachment RR, Section I.(G) and (J) to this Schedule, divided by the monthly balance of Transmission Plant determined in accordance with Attachment RR, Section I.(A)(1)(a) to this Schedule.

### Meter Surcharge

I. No later than May 31 of each calendar year, the Meter Surcharge will be calculated based on the prior calendar year's annual costs. The annual costs for metering service shall be the year-end balance of plant investment in meters included in Attachment RR, Section I. (A) (1) (a) to this Schedule multiplied by the Average Annual Carrying Charge.

II. The Average Annual Carrying Charge shall be the Annual Transmission Revenue Requirement as determined in Attachment RR, Sections I. (A) through I. (H) to this Schedule, divided by the year-end balance of transmission plant investment included in Attachment RR, Section I.(A) (1) (a) to this Schedule.

III. To determine the monthly Meter Surcharge rate, the annual costs for meter service will be divided by the number of NEP-Owned Billing Meters and further divided by twelve. The number of NEP-Owned billing meters shall equal the total number of meters owned by NEP and used for billing purposes under NEP's tariffs for wholesale all requirements and firm and non-firm transmission services.

### Pre-1997 RNS Revenue Credit

The respective Pre-1997 RNS Revenue Credit to Taunton Municipal Lighting Plant, Middleborough Gas and Electric Department and Pascoag Fire District will be equal to

[1- <u>EUA RNS Rate</u>]\* [customer's payment for RNS] Combined RNS Rate

### Where:

EUA RNS Rate is former Montaup's 1999 Pre-1997 RNS rate as calculated under the NEPOOL Tariff.

Combined RNS Rate is equal to:

(A\*B) + (C\*D) / (B+D)

Where:

- A = EUA's 1999 Pre-1997 RNS Rate as calculated under the NEPOOL Tariff.
- B = EUA's 1999 12 CP Network Load (MW) as calculated under the NEPOOL Tariff.
- C = NEP's 1999 Pre-1997 RNS Rate as calculated under the NEPOOL Tariff.
- D = NEP's 1999 12 CP Network Load (MW) as calculated under the NEPOOL Tariff.

### ATTACHMENT RR

#### **Transmission Revenue Requirements**

The Transmission Revenue Requirement will be determined based on the calculation shown below. In determining the rate for Local Network Service, the Revenue Requirement calculation as set forth below will be determined on a monthly basis.

I. The Transmission Revenue Requirement shall equal the sum of NEP's (A) Return and Associated Income Taxes, (B) Transmission Depreciation Expense, (C) Transmission-Related Amortization of Loss on Reacquired Debt, (D) Transmission-Related Amortization of Investment Tax Credits, (E)
Transmission-Related Amortization of FAS 109, (F) Transmission-Related Municipal Tax Expense, (G)
Transmission Operation and Maintenance Expense, (H) Transmission-Related Administrative and
General Expense, (I) Transmission-Related Integrated Facilities Credit, (J) Transmission Revenue Credit,
(K) Distribution-Related Integrated Facilities Credit, and plus (L) Billing Adjustments; plus (M) Reactive
Power Expense; plus (N) Bad Debt Expense.

A. Return and Associated Income Taxes shall equal the product of the Transmission Investment Base and the Cost of Capital Rate.

#### 1. Transmission Investment Base

The Transmission Investment Base will be (a) Transmission Plant, plus (b) Transmission-Related General Plant, plus (c) Transmission Plant Held for Future Use, plus (d) Transmission-Related Construction Work in Progress, less (e) Transmission-Related Depreciation Reserve, less (f) Transmission-Related Accumulated Deferred Taxes, plus (g) Transmission-Related Loss on Reacquired Debt, plus (h) Other Regulatory Assets, less (i) Allowance for Funds Used During Construction (AFUDC) Regulatory Liability, plus (j) Transmission-Related Cash Working Capital.

(a) **Transmission Plant** will equal the balance of NEP's Total Investment in Transmission Plant, plus NEP's Total Investment in Distribution Plant excluding NEP's capital leases in the Hydro-Quebec DC facilities (HQ leases). NEP's investment in PTF transmission plant and stepdown transformers beyond NEP's Point of Delivery, including associated equipment, shall be included but stated separately. NEP's investment in wholesale metering, including associated equipment, shall also be included but stated separately.

(b) **Transmission-Related General Plant** shall equal NEP's balance of investment in General Plant excluding General Plant related to NEP's generation facilities as specifically identified in NEP's CTC.

(c) **Transmission Plant Held for Future Use** shall equal the balance of investment in FERC Account 105.

(d) Transmission-Related Construction Work In Progress shall equal the portion of NEP's investment in Transmission-related projects as recorded in FERC Account 107 consistent with Commission orders.

(e) **Transmission-Related Depreciation Reserve** shall equal the balance of Total Depreciation Reserve, excluding any generation-related depreciation reserve associated with assets identified in NEP's CTC.

(f) Transmission-Related Accumulated Deferred Taxes shall equal NEP's balance of Total Accumulated Deferred Income Taxes, excluding any Accumulated Deferred Taxes associated with non-utility assets or generation facilities as identified in the CTC.

(g) **Transmission-Related Loss on Reacquired Debt** shall equal NEP's balance of Total Loss on Reacquired Debt excluding losses associated with NEP Generation as specifically identified in the CTC, or any generation-related losses associated with pollution control bonds.

(h) Other Regulatory Assets shall equal NEP's balance of FAS 109 excluding FAS 109 balances associated with NEP Generation as specifically identified in the CTC.

(i) **AFUDC Regulatory Liability** shall equal the unamortized balance of the capitalized AFUDC booked on NEP's Transmission-related projects as recorded in FERC Account 254 consistent with Commission orders.

(j) **Transmission Prepayments** shall equal NEP's balance of prepayments excluding any prepayments related to NEP's ongoing generation-related activities.

(k) Transmission Materials and Supplies shall equal NEP's balance of Transmissionrelated Materials and Supplies.

(I) Transmission-Related Cash Working Capital shall be a 12.5% allowance (45 days/360 days) of Transmission Operation and Maintenance Expense and Transmission-Related Administrative and General Expense.

### 2. Cost of Capital Rate

The Cost of Capital Rate will equal (a) NEP's Weighted Cost of Capital, plus (b) the Yankee Adjustments plus (c) Federal Income Tax plus (d) State Income Tax.

(a) The Weighted Cost of Capital will be calculated based upon the capital structure at the end of each month and will equal the sum of:

(i) the long-term debt component, which equals the product of the actual weighted average embedded cost to maturity of NEP's long-term debt excluding any debt associated with pollution control bonds then outstanding and the ratio that long-term debt is to NEP's total capital less the end-of-year investment in Yankee Units.

(ii) the preferred stock component, which equals the product of the actual weighted average embedded cost to maturity of NEP's preferred stock then outstanding and the ratio that preferred stock is to NEP's total capital less the end-of-year investment in Yankee Units.

(iii) the return on equity component (ROE), which equals the product of the allowed based ROE of 10.57% and the ratio that common equity is to NEP's total capital less the end-of-year investment in Yankee Units.

For purposes of implementing the exclusion of the FERC-approved adders from Section J. below, the following ROEs will be applied to the corresponding investment:

post-2003 to pre-2009 PTF transmission plant	11.74%%
investment in Regional System Plan approved by	
ISO-NE	

remaining PTF transmission plant investment	11.07%
remaining transmission plant investment	10.57%

plus any ROE incentive approved by the FERC under Order No. 679 for other plant investments.8

(b) The Yankee Adjustment shall be calculated in accordance with FERC Opinion Nos. 49 and 49(a) issued in NEP's R-10 rate case and FERC Opinion No. 158 issued in NEP's W-3 rate case.

# (c) Federal Income Tax shall equal $\frac{A \times FT}{1 - FT}$

Where FT is the Federal Income Tax Rate and A is the sum of the preferred stock component and the return on equity component, as determined in Section (I)(A)(2)(a)(ii), and Section (I)(A)(2)(a)(iii) above.

# (d) State Income Tax shall equal (A + Federal Income Tax) x ST 1 - ST

where ST is the State Income Tax Rate, A is the sum of the preferred stock component and the return on equity component determined in Section (I)(A)(2)(a)(ii) and Section (I)(A)(2)(a)(iii) above, and Federal Income Tax is the rate determined in Section (I)(A)(2)(c) above.

**B. Transmission Depreciation Expense** shall equal the Depreciation Expense associated with the Transmission Plant, Transmission-Related General Plant and Transmission Plant Held for Future Use as described in Sections I.A.(a)(1), (b) and (c), less the amortization of AFUDC regulatory credit as recorded in FERC Account 407.4.

**C. Transmission-Related Amortization of Loss on Reacquired Debt** shall equal NEP's Amortization of the balance on Loss on Reacquired Debt as defined in Section I.A.(1)(f).

<sup>&</sup>lt;sup>8</sup> FERC Form-730 contains a list of transmission projects for which FERC has granted incentives under Order No. 679

**D. Transmission-Related Amortization of Investment Tax Credits** shall equal NEP's Amortization of Investment Tax Credits, excluding any ITC credits specifically identified as generation-related in NEP's CTC.

**E. Transmission-Related Amortization of FAS 109** shall equal the Amortization of NEP's Balance of FAS 109, as identified in Section I.A.(1)(q) over a ten-year period beginning on the Divestiture Date of NEP's Generating Assets as defined in the CTC.

**F. Transmission-Related Municipal Tax Expense** shall equal NEP's total municipal tax expense excluding specifically identified generation-related municipal taxes or payments in lieu of such generation-related municipal taxes.

**G. Transmission Operation and Maintenance Expense** shall equal all expenses charged to FERC Account Numbers 560 through 598. Account Number 565, Transmission by Others, shall only include those expenses in support of facilities that are integrated with NEP's Transmission System or other transmission systems. Transmission Operation and Maintenance Expense shall include any expenses associated with transmission-related administrative services provided by the ISO and the expenses associated with providing Transmission Customers with the Pre-1997 Revenue Credit as described in Attachment OCC to this Schedule.

**H. Transmission-Related Administrative and General Expenses** shall equal NEP's Administrative and General Expenses, less Production-related Administrative and General Expense associated with joint-owned production units, plus Payroll Taxes,

I. Transmission-Related Integrated Facilities Credit shall equal NEP's transmission payments to its New England Affiliates for use of the integrated transmission facilities of those New England Affiliates.

J. Transmission Revenue Credit shall equal NEP's total transmission revenue, FERC Account Number 456, transmission-related sub-accounts of 447, and those revenues received from the ISO associated with the provision of transmission services under the OATT excluding the revenue received under the terms set forth in Section 24.2 of this Schedule, excluding any revenue received for the Hydro-Quebec DC facilities, excluding any revenue directly credited to Network Customers under Section 24.11 of this Schedule, excluding distribution revenues associated with expenses that have been excluded from NEP's Transmission Revenue Requirement, and excluding any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment in accordance with Section II.A.2.(a)(iii) of Attachment F under the OATT. To the extent that NEP's transmission-related revenue under FERC Electric Tariff No. 1 is not reflected in the above-reference accounts on or after July 9, 1996, such revenue will be imputed under the formula set forth in the OATT and included in the Transmission Revenue Credit in accordance with the above specifications. Any Transmission Revenue Credit related to Section 24.1 of this Schedule shall be stated separately. Any revenue from the ISO associated with the provision of transmission service under the OATT, shall also be included but stated separately.

**K. Distribution-Related Integrated Facilities Credit** shall be equal to the credit applied to the purchased power bill of Massachusetts Electric Company under NEP's Tariff No. 1 for use of its distribution facilities used in support of wholesale transactions.

L. Billing Adjustments shall be plus or minus any billing adjustments from the prior transmission billing periods, including ISO adjustments. Billing adjustments shall include, but not be limited to, adjustments due to metering errors, corrections to any value included in this Attachment RR, or the Load Ratio Share. Such adjustments may be corrected prospectively. However, if the error is substantial, or substantially affects an individual Network or Transmission Customer, NEP reserves the right to credit and rebill customers for each affected billing month in which the error occurred.

**M. Reactive Power Expense** shall be set at zero as of the Second Effective Date, as defined in the NEPOOL Agreement.

**N. Bad Debt Expense** shall be the bad debt expense as reported in Account 904 related to transmission billing.

**O. Miscellaneous Provisions** In the event that the FERC accounts listed above are renumbered, renamed, or otherwise modified, the above sections shall be deemed amended to incorporate such renumbered, renamed, modified or additional accounts.

### EXHIBIT 1

#### **Distribution Cost of Service**

Pursuant to Attachment DAF to this Schedule, the Distribution Cost of Service shall be calculated as follows for the applicable New England Affiliate:

I. The Primary Distribution System Cost of Service shall equal the sum of (A) Return and Associated Income Taxes, (B) Primary Depreciation Expense, (C) Primary Related Amortization of Loss on Reacquired Debt, (D) Primary Related Amortization of Investment Tax Credits, (E) Primary Related Municipal Tax Expense, (F) Primary Operation and Maintenance Expense, (G) Primary Related Administrative and General Expense, and (H) Primary Revenue Credit.

A. Return and Associated Income Taxes shall equal the product of the Primary Investment Base and the Cost of Capital Rate.

(1) **Primary Investment Base** will be (a) Total Primary Distribution Plant, plus (b) Primary Related General Plant, plus (c) Primary Plant Held for Future Use, less (d) Primary Depreciation Reserve, less (e) Primary Related Accumulated Deferred Income Taxes, plus (f) Primary Related Loss on Reacquired Debt, plus (g) Other Regulatory Assets, plus (h) Primary Materials and Supplies, plus (i) Primary Related Prepayments, plus (j) Primary Related Cash Working Capital.

(a) Total Primary Distribution Plant shall equal the New England Affiliate's Plant Accounts 360 to 373 multiplied by allocation factors from the Distribution Engineering Study.

(b) Primary Related General Plant shall equal the New England Affiliate's Investment in General Plant, multiplied by the Primary Wages & Salaries Allocation Factor. The Primary Wages & Salaries Allocation Factor shall equal the ratio of Total Distribution Wages & Salaries to the Total New England Affiliate's Wages & Salaries excluding A&G, multiplied by the ratio of Primary Distribution related O&M to Total Distribution O&M (Primary O&M Allocation Factor).

(c) Primary Plant Held for Future Use shall equal the New England Affiliate's Account
 105, multiplied by the Primary Land Allocation Factor from the Distribution Engineering Study.

(d) **Primary Depreciation Reserve** shall equal the New England Affiliate's Depreciation Reserve multiplied by the ratio of Primary Depreciable Distribution Plant to Total Depreciable Distribution Plant (Primary Depreciable Plant Allocation Factor), plus an allocation of average General Plant Depreciation Reserve calculated by multiplying beginning and end of year General Plant Depreciation Reserve by the Primary Wages and Salaries Allocation Factor described in Section (I)(A)(1)(b) above.

(e) Primary Related Accumulated Deferred Income Taxes shall equal the Total Accumulated Deferred Income Taxes, multiplied by the ratio of average Primary Plant in Service to average Total Plant in Service excluding General Plant (Primary Plant Allocation Factor).

(f) Primary Related Loss on Reacquired Debt shall equal the Total Loss on Reacquired Debt, multiplied by the Primary Plant Allocation Factor described in Section (I)(A)(1)(e) above.

(g) Other Regulatory Assets shall equal the New England Affiliate's balance of FAS 106, multiplied by the Primary Wages and Salaries Allocator described in Section (I)(A)(1)(b), plus the New England Affiliate's balance of FAS 109, multiplied by the Primary Plant Allocation Factor described in Section (I)(A)(1)(c) above.

(h) **Primary Materials and Supplies** shall equal the New England Affiliate's Distribution Plant Materials and Supplies, multiplied by the Primary O&M Allocation Factor as described in Section (I)(A)(1)(b) above.

(i) **Primary Related Prepayments** shall equal the New England Affiliate's Prepayments, multiplied by the Primary Wages and Salaries Allocator described in Section (I)(A)(1)(b) above.

(j) Primary Related Cash Working Capital shall be a 45 day allowance or 12.5% of Primary Operation and Maintenance Expense and Primary Related Administrative and General Expense.

(2) Cost of Capital Rate will equal (a) the New England Affiliate's Weighted Cost of Capital, plus (b) Federal Income Tax, plus (c) State Income Tax.

(a) The Weighted Cost of Capital will be calculated based upon the capital structure at the end of each year and will equal the sum of:

i) **the long-term debt component**, which equals the product of the actual dollar weighted average embedded cost to maturity of the New England Affiliate's long-term debt then outstanding and the ratio that long-term debt is to the New England Affiliate's total capital.

**ii) the preferred stock component**, which equals the product of the actual weighted average embedded cost to maturity of the New England Affiliate's preferred stock then outstanding and the ratio that preferred stock is to the New England Affiliate's total capital.

**iii) the return on equity component**, which equals the product of 10.57% and the ratio that common equity is to the New England Affiliate's total capital.

### (b) Federal Income Tax shall equal

where FT is the Federal Income Tax Rate and A the sum of the preferred stock component and the return on equity component determined in Section (I)(A)(2)(a)(ii) and Section (I)(A)(2)(a)(iii) above.

### (c) State Income Tax shall equal

where ST is the State Income Tax Rate, A is the sum of the preferred stock component and the return on equity component determined in Section (I)(A)(2)(a)(ii) and Section (I)(A)(2)(a)(iii) above, and Federal Income Tax is Federal Income Tax as determined in Section (I)(A)(2)(b) above.

**B. Primary Depreciation Expense** shall equal Depreciation Expense for Distribution Plant, multiplied by the Primary Depreciable Plant Allocation Factor as described in Section (I)(A)(1)(d) above,

plus an allocation of General Plant Depreciation Expense calculated by multiplying General Plant Depreciation Expense by the Primary Wages and Salaries Allocation Factor described in Section (I)(A)(1)(b) above.

**C. Primary Related Amortization of Loss on Reacquired Debt** shall equal the New England Affiliate's Amortization of Loss on Reacquired Debt, multiplied by the Primary Plant Allocation Factor described in Section (I)(A)(1)(e) above.

**D. Primary Related Amortization of Investment Tax Credits** shall equal the New England Affiliate's Amortization of Investment Tax Credits, multiplied by the Primary Plant Allocation Factor described in Section (I)(A)(1)(e) above.

**E. Primary Related Municipal Tax Expense** shall equal a pro-rata share of the New England Affiliate's total municipal taxes allocated by the Primary Plant Allocation Factor described in Section (I)(A)(1)(e) above.

F. Primary Operation and Maintenance Expense shall the sum of all expenses charged to FERC Account Numbers 580 through 598, allocated to Primary as indicated by the Distribution Engineering Study.

**G. Primary Related Administrative and General Expenses** shall equal the New England Affiliate's Administrative and General Expenses, plus Payroll Taxes, multiplied by the Primary Wages & Salaries Allocation Factor described in Section (I)(A)(1)(b) above.

### ATTACHMENT L

#### **Creditworthiness Policy**

#### 1. Introduction & Applicability

This policy establishes creditworthiness standards for transmission service and/or interconnection service customers ("Customers") entering into new, amended or assigned service agreements with NEP under the ISO-NE OATT. The following describes NEP's qualitative and quantitative credit review procedures and the types of security that are acceptable to NEP to protect against the risk of default.

### 2. Information Requirements

For purposes of determining the ability of a Customer to meet its obligations, NEP may require the Customer to submit financial information for the credit review, including credit ratings, credit reports and audited financial statements. In addition, the following factors may be considered in evaluation of the Customer's creditworthiness: applicant's history; nature of organization and operating environment; management; contractual obligations; governance, financial / accounting policies, risk management and credit policies; market risk including price exposures, credit exposures, and operational exposures; and event risk. All information required under this Attachment should be forwarded to the NEP account manager as specified on the NEP OASIS website.

#### 3. Creditworthiness Evaluation

NEP will evaluate the creditworthiness of Customers entering into new or amended transmission or interconnection service agreements with NEP in order to assess a Customer's credit risk relative to the exposure or "Total Outstanding Obligation" as defined in Section 3.1 below, created by the transaction or transactions that NEP has with the Customer.

#### 3.1 Total Outstanding Obligation

The Customer's Total Outstanding Obligation to NEP will be the sum total of the following components:

3.1.1 If the Customer is making payments to NEP for ongoing expenses (including, but not limited to, O&M expenses related to interconnections or other monthly charges such as monthly transmission charges under Schedule 21-NEP of the ISO-NE OATT) the Customer will be required to provide security pursuant to Section 3.2 below, for four months' worth of the Customer's average payment obligation for such charges

3.1.2 Whenever, in accordance with the provisions of the ISO-NE OATT, a Customer pays a Contribution in Aid of Construction ("CIAC") or transfers ownership of facilities to NEP for transmission or interconnection facilities that are to be constructed on behalf of a Customer at the Customer's sole expense, and NEP determines in good faith that the receipt of CIAC payments or property from the Customer are non-taxable, NEP will require a form of security from the Customer pursuant to Section 3.2 below for the amount of the potential tax liability to NEP that would occur if such facilities were deemed taxable.

3.1.3 Whenever, in accordance with the provisions of the ISO-NE OATT, a Customer pays a formula rate over time for return of and on the cost of capital incurred by NEP on behalf of a Customer at the Customer's sole expense, the Customer will be required to provide security pursuant to Section 3.2 below, for the unamortized balance of plant in service reserved for the sole use of the Customer.

3.2 Creditworthiness Requirements

A Customer will be considered creditworthy upon satisfying at least one of the following conditions, or a combination of those conditions, at the time that the Customer enters into a transmission or interconnection service agreement and for so long as the Customer maintains satisfaction of at least one of these conditions for any outstanding obligations thereunder:

3.2.1 The Customer maintains a minimum credit rating of BBB from Standard & Poor's Longterm Issuer Credit Rating or Baa2 from Moody's Investors Service Long-term Issuer Credit Rating, so long as the Customer's Total Outstanding Obligation plus any other unsecured obligation with NEP and its Affiliates does not exceed the Credit Limits discussed in Section 5 below.<sup>9</sup> If unrated, the Customer's financial statements will be reviewed to determine an equivalent rating based on the Customer's unsecured credit limits and/or financial statements.

3.2.2 The Customer provides and maintains in effect during the term of and until full and final payment and performance of the service agreement an unconditional and irrevocable Letter of Credit for the Total Outstanding Obligation in the form and substance and issued by a bank acceptable to NEP. A draft, acceptable form letter of credit is posted on OASIS. Any such bank must satisfy the creditworthiness criteria described in 3.2.1 above.

3.2.3 The Customer's parent or an Affiliate company satisfies the creditworthiness criteria described in 3.2.1 above and, subject to the Credit Limits stated in Section 4 below, such company submits to NEP and maintains in effect a Letter of Guaranty acceptable to NEP as to amount, form and substance for the term of and until full and final payment and performance of the service agreement.

3.2.4 The Customer is a municipal that is a member of the Massachusetts Municipal Wholesale Electric Cooperative (MMWEC). In such instances, MMWEC must meet the criteria set out in 3.2.1 or 3.2.2 above and provide to NEP a Letter of Guaranty that MMWEC will be unconditionally responsible for all financial obligations associated with the Customer's receipt of transmission or interconnection service from NEP.

3.2.5 The Customer makes an advance payment to NEP in immediately available funds for the Total Outstanding Obligation.

If, at any time, the credit rating of the Customer, Customer's bank, or Customer's parent or Affiliate providing the Guaranty as set out in 3.2.1, 3.2.2 or 3.2.3 above falls below investment grade (BBB- from Standard and Poor's and or Baa3 from Moody's), the Customer will be required to provide (i) notification to NEP within 10 days and, (ii) another form of security acceptable to NEP, as described in this Section 3.2, within 30 days.

#### 4. Customer Costs Requiring Prepayment

<sup>&</sup>lt;sup>9</sup> When NEP reviews a Customer's rating from two or more rating agencies and a split rating is present, the lower debt rating will apply. In the event that the Customer only has a rating from either Standard & Poor's or Moody's Investors Service, a rating from Duff & Phelps or Fitch and Weiss may also be used with acceptable ratings equivalent to those from either Standard and Poor's or Moody's Investors Service.

Whenever, in accordance with the provisions of the ISO-NE OATT, a Customer pays a CIAC for transmission or interconnection facilities to be constructed by NEP on behalf of a Customer at the Customer's sole expense, the Customer will have the option to (i) prepay the CIAC in immediately available funds to NEP, or (ii) make periodic CIAC progress payments, as defined in the Customer's service agreement, to prepay in increments capital costs scheduled to be incurred by NEP. If NEP determines in good faith that such payments or property transfers made by the Customer should be reported as income subject to taxation, the Customer shall also prepay all costs associated with the cost consequences of the current tax liability imposed on NEP by those facilities (the "Tax Gross- up").

### 5. Credit Limits

NEP reserves the right to limit the total amount of unsecured credit extended to a Customer under 3.2.1 and 3.2.3 above such that the sum of all unsecured credit that such Customer has with NEP and its Affiliates, including the Total Outstanding Obligation, shall not exceed the Credit Limits defined below. Such limitations are based on an assessment of the Customer's or its Guarantor's credit rating and the net worth of the Customer's or its Guarantor's assets.

	Unsecured Credit Limit as Percent
Standard and Poor's (or	of Customer's or Guarantor's
Equivalent) Rating	Tangible Net Worth
A and above	1.0%
A-	0.5%
BBB+	0.2%
BBB	0.1%
BBB-	0.0%

#### 6. Contesting Creditworthiness Determinations

A Customer may contest NEP's determination of creditworthiness by submitting a written request to NEP for re-evaluation within 20 calendar days of being notified of the creditworthiness determination. Such request should provide information supporting the basis for a request to re-evaluate the Customer's creditworthiness. NEP will review and respond to the request within 20 calendar days.

#### 7. Process for Changing Credit Requirements

In the event that NEP plans to revise its requirements for credit levels or collateral requirements as detailed in this Attachment L, NEP shall submit such changes in a filing to the Federal Energy Regulatory Commission ("Commission") under Section 205 of the Federal Power Act. NEP shall follow the notification requirements pursuant to Section 3.04(a) of the Transmission Operating Agreement and reflected herein.

### 7.1 General Notification Process

7.1.1 NEP shall provide written notification to ISO-NE and stakeholders of any filing described above, at least 30 days in advance of such filing. Filing notifications shall include a detailed description of the filing, including a redlined document containing revised change(s) to the Creditworthiness Policy. NEP shall consult with interested stakeholders upon request.

7.1.2 Following Commission acceptance of such filing and upon the effective date, NEP shall revise its Attachment L Creditworthiness Policy and an updated version of Schedule 21-NEP shall be posted on the ISO-NE website.

#### 7.2 Customer Responsibility

7.2.1 Upon the effective date of any revision to these creditworthiness requirements or upon the date of the Commission's order accepting such revisions, whichever is later, the Customer shall have 30 days to forward updated financial information to NEP and indicate whether the revised creditworthiness requirements impair the Customer's ability to comply with the revised requirements. In such cases, the Customer must take all reasonable steps to comply with the revised requirements of the Creditworthiness Policy within 45 days of the effective date of the change.

7.3 Notification for Active Customers

7.3.1 Active Customers are defined as any current Customer that has a Service Agreement currently in effect and has posted an irrevocable letter of credit, letter of guaranty or prepayment in accordance with Sections 3.2.2, 3.2.3, 3.2.4, or 3.2.5, above.

7.3.2 All Active Customers will be served with copies of any filing submitted to the Commission to modify the NEP's creditworthiness requirements.

### 8. Suspension of Service

NEP may, immediately suspend service (with notification to Commission) to a customer, and may initiate proceedings with Commission to terminate service, if the customer does not meet the terms described in this Attachment. A customer is not obligated to pay for Transmission Service that is not provided as a result of a suspension of service.

### ATTACHMENT S-1

#### Local Scheduling, System Control and Dispatch Service

This service is required to schedule the movement of power through, out of, within, or into a Control Area over Non-PTF. The Transmission Customer or Network Customer must purchase this service from NEP. The charges for Scheduling, System Control and Dispatch Service shall be based on the Local Network Load Dispatch Surcharge set forth in Attachment OCC to this Schedule. To the extent the ISO performs this service for NEP, charges to the Transmission Customer are to reflect only a pass-through of the costs charged to NEP by the ISO.

Northeast Utilities Companies SCHEDULE 21-NU

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## SCHEDULE 21-NU NORTHEAST UTILITIES COMPANIES LOCAL SERVICE SCHEDULE

In accordance with paragraphs 126–130 of Commission Order No. 676 E, the NAESB Version 002.1-Standards listed below apply to the provision of transmission service pursuant to this Schedule 21-NU forservice provided hereunder by Public Service Company of New Hampshire:

Gas/Electric Coordination (WEQ-011, Version 002.1, March 11, 2009, with minor corrections applied May 29, 2009 and September 8, 2009), Standards 011–1.2 and 011–1.3.

### I. COMMON SERVICE PROVISIONS

#### 1 Definitions

Capitalized terms not defined herein shall have the meanings given them in the Tariff.

### 1.1 Annual Transmission Costs

The total annual cost of the Transmission System for purposes of Local Network Service shall be the amount specified in Attachments NU-H and NU-I, until amended by the Companies or modified by the Commission.

### 1.2 Annual True Up

The reconciliation to actual costs and actual loads of the estimated costs and loads costs used for billing purposes under Section 3.0 of this Local Service Schedule for any Service Year.

#### 1.3 Category A Load Ratio Share

Ratio of a Transmission Customer's Category A Network Load to the NU Companies' total load computed in accordance with Sections 16.5 and 16.6 under Part III of this Local Service Schedule and calculated on a rolling twelve month basis. Also referred to as "Load Ratio Share".

#### 1.4 Category B Load Ratio Share

Ratio of a Transmission Customer's Monthly Category B Load in the Designated State or Area for a Localized Facility to the Monthly Transmission System Category B Load for such Designated State or Area, calculated in accordance with Sections 16.5 and 16.6, and calculated on a rolling twelve month basis.

#### 1.5 Designated Agent

See Tariff. Also, the Designated Agent of the NU Companies is the Northeast Utilities Service Company ("NUSCO") which is a subsidiary of Northeast Utilities ("NU").

### 1.6 Designated State or Area

The state or area to which the Commission allocates the costs of a Localized Facility identified in Section 16.3.

### 1.7 Interest

The amount computed in accordance with the Commission's regulations at 18 CFR §35.19a (a)(2)(iii). Interest on deposits and shall be calculated from the day the deposit check is credited to the NU Companies' account.

#### 1.8 Interruption

A reduction in non-firm transmission service due to economic reasons pursuant to Schedule 21.

#### 1.9 Localized Facility

Facility or costs that the New England System Operator determines should not be included in Attachment F of the ISO OATT.

#### 1.10 Network Load

The load that a Network Customer designates for Local Network Service. The Network Customer's Network Load shall include all load served by the output of any Network Resources designated by the Network Customer. A Network Customer may elect to designate less than its total load as Network Load but may not designate only part of the load at a discrete Point of Delivery. Where an Eligible Customer has elected not to designate a particular load at discrete points of delivery as Network Load, the Eligible Customer is responsible for making separate arrangements for any Point-To-Point Transmission Service that may be necessary for such nondesignated load.

#### 1.11 Network Operating Agreement

An executed agreement that contains the terms and conditions under which the Network Customer shall operate its facilities and the technical and operational matters associated with the implementation of Local Network Service under Part III of this Local Service Schedule.

#### 1.12 Network Upgrades

Modifications or additions to transmission-related facilities that are integrated with and support the NU Companies' overall Transmission System for the general benefit of all users of such Transmission System.

### 1.13 New England System Operator

ISO New England Inc. ("ISO") or its successor entity.

#### 1.14 Party(ies)

The NU Companies and the Transmission Customer receiving service under the Tariff.

#### 1.15 Short-Term Firm Point-To-Point Transmission Service

Firm Point-To-Point Transmission Service with a term of less than one year.

#### 1.16 Service Agreement

Service Agreement is a transmission service agreement for transmission service provided under this Local Service Schedule or Localized Costs Responsibility Agreement ("LCRA").

### 1.17 Service Year

The calendar year in which the Transmission Customer is receiving service under this Local Service Schedule.

### 1.18 NU Companies

The Northeast Utilities Companies (or "NU Companies") which consists of The Connecticut Light and Power Company, Western Massachusetts Electric Company, and Public Service Company of New Hampshire, each an operating company of Northeast Utilities ("NU").

### 1.19 NU Companies' Monthly Transmission System Peak

The maximum firm usage of the NU Companies Transmission System in a calendar month (this does not include load of the NU Companies' customers exclusively connected to PTF).

### 1.20 NU Companies' Transmission System

The PTF and non-PTF facilities owned, controlled or operated by the NU Companies that are used to provide transmission service under this Local Service Schedule. This includes PTF facilities whose costs are not included in the regional rate.

#### 1.21 Transmission Service

Point-To-Point Transmission Service provided under this Local Service Schedule on a firm and non-firm basis.

### 2. Ancillary Services

Ancillary Services are needed with transmission service to maintain reliability within and among the Control Areas affected by the transmission service. The NU Companies are required to provide (or offer to arrange with the New England System Operator as discussed below), and the Transmission Customer is required to purchase, the following Ancillary Service (i) Scheduling, System Control and Dispatch.

The Transmission Customer serving load within the NU Companies' Control Area shall also obtain the following ancillary services: (i) Reactive Supply and Voltage Control from Generation Sources, (ii) Regulation and Frequency Response, (iii) Energy Imbalance, (iv) Operating Reserve - Spinning, and (v) Operating Reserve - Supplemental.

The Transmission Customer serving load within the NU Companies' Control Area is required to acquire the appropriate Ancillary Services, whether from the New England System Operator, NU Companies, another party, or by self-supply.

The Transmission Customer may not decline the NU Companies' or the New England System Operator's offer of appropriate Ancillary Services unless it demonstrates that it has acquired the Ancillary Services from another source. The Transmission Customer must list in its Application which Ancillary Services it will purchase from the NU Companies.

If the NU Companies are unable to provide Scheduling, System Control and Dispatch, the NU Companies can fulfill their obligation to provide this Ancillary Service by acting as the Transmission Customer's agent to secure this Ancillary Service from the New England System Operator. The Transmission Customer may elect to (i) have the NU Companies act as its agent to obtain Scheduling, System Control and Dispatch, (ii) secure Scheduling, System Control and Dispatch directly from the New England System Operator, or from a third party.

The NU Companies or New England System Operator shall specify the rate treatment and all related terms and conditions in the event of an unauthorized use of Ancillary Services by the Transmission Customer.

The specific Ancillary Services, prices and/or compensation methods are described on the Schedule that is attached to and made a part of the Tariff. Three principal requirements apply to discounts for Ancillary Services provided by the NU Companies in conjunction with their provision of transmission service as follows: (1) any offer of a discount made by the NU Companies must be announced to all Eligible Customers solely by posting on the OASIS, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on the OASIS, and (3) once a discount is negotiated, details must be immediately posted on the OASIS. A discount agreed upon for an Ancillary Service must be offered for the same period to all Eligible Customers on the NU Companies' system.

### 3. Billing and Payment

#### 3.1 Billing Procedure

Within a reasonable time after the first day of each month, the NU Companies shall submit an invoice to the Transmission Customer for the charges for all services furnished or costs allocated under the Tariff during the preceding month.

The invoice shall be paid by the Transmission Customer within twenty five (25) days of the date of the invoice. All payments shall be made in immediately available funds payable to the NU Companies, or by wire transfer to a bank named by the NU Companies. Billing hereunder shall be based on cost estimates made by the NU Companies subject to Annual True-up when actual costs for the Service Year are known. Such Annual True-up shall occur no later than six (6) months after the close of the Service Year to which the Annual True-up relates. The Annual True-up will include interest calculated in accordance with Section 35.19a of the Commission's regulations. If the in service date of a forecasted capital addition changes, and the impact of such change on the NU Companies' annual revenue requirement is ten percent or more, the NU Companies will adjust current billing to the Transmission Customer as appropriate.

#### 3.2 Interest on Unpaid Balances

Interest on any unpaid amounts (including amounts placed in escrow) shall be calculated in accordance with the methodology specified for interest on refunds in the Commission's regulations at 18 C.F.R. § 35.19a(a)(2)(iii). Interest on delinquent amounts shall be calculated from the due date of the bill to the date of payment. When payments are made by mail, bills shall be considered as having been paid on the date of receipt by the NU Companies.

#### **3.3** Customer Default

In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to the NU Companies on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after the NU Companies notifies the Transmission Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, the NU Companies may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission so approves any such request. In the event of a billing dispute between the NU Companies and the Transmission Customer, the NU Companies will continue to provide service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then the NU Companies may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy. Neither Party shall have the right to challenge any monthly bill or to bring any court or administrative action of any kind questioning the propriety of any bill after a period of twenty four (24) months from the date the bill was due; provided, however, that in the case of a bill based on estimates, such twenty-four month period shall run from the due date of the final adjusted bill.

#### 3.4 Transmission Customer Right to Audit

The NU Companies shall keep complete and accurate accounts and records with respect to their performance under this Local Service Schedule and shall maintain such data for a period of at least two (2) years after final billing for audit by a Transmission Customer. The Transmission Customer shall provide thirty (30) days' written notice to the NU Companies to request an audit of all such accounts and records relevant to service provided to the Transmission Customer for a specific time period. The Transmission Customer shall have the right, during normal business hours and at its own expense, to examine, inspect and make copies of all such accounts and records relevant to service provided to the Transmission Customer at such offices where such accounts and records are maintained, insofar as may be necessary for the purpose of ascertaining the reasonableness and accuracy of all relevant data, estimates or statements of charges submitted hereunder to the Transmission Customer. The records made available to a Transmission Customer for auditing purposes hereunder shall not include information pertaining to the loads of or charges to an individual customer other than the Transmission Customer; unless the Transmission Customer requests that the Commission order that such information be made

available to the Transmission Customer and the Commission so orders. Nothing in this section shall be interpreted as limiting the Transmission Customer's access to system-wide load or charge data.

### 3.5 Regulatory Oversight of Formula Rate

The NU Companies will submit to the Connecticut Public Utilities Regulatory Authority, the Massachusetts Department of Public Utilities and the New Hampshire Public Utilities Commission ("State Commissions") the following information:

(a) A copy of the New England Power Pool's ("NEPOOL's") or any successor's annual informational filing at FERC supporting the total transmission revenue requirement for New England, which contains information submitted by the NU Companies supporting their total transmission revenue requirement;

(b) The NU Companies' total transmission revenue requirement as calculated in Attachments H & I under Schedule 21-NU;

(c) A copy of the NU Companies' applications under Restated NEPOOL Agreement Section 15.5, concerning the installation of or material changes to transmission facilities (or any successor approval process), and Section 18.4, concerning plans for additions, retirements, or changes in the capacity of transmission facilities (including descriptions of facilities and cost estimates);

(d) A copy of ISO New England's or any successor's Regional Transmission System Plan, which contains all identified improvements to the New England power system approved by the ISO New England or any successor's board;

(e) A copy of NU's filing to each New England state's siting council for those projects to be recovered through the RNS or LNS rates, such copy to be filed with the State Commissions when the estimated costs of the projects in question are proposed to be included in the RNS and LNS rates;

(f) At the same time that new estimated rates are implemented, the estimated cost for each capital addition (on a project-by-project basis) the cost of which is to be included in the estimated rates; and, for each such capital addition with an estimated cost of \$20 million or greater, the NU

Companies will provide the following to the extent available: (i) a breakdown of the projected cost into the following categories: labor (broken down into planning, engineering, construction, and other), outside services (broken down into planning, engineering, construction and other), materials (broken down into station equipment, towers and poles, overhead conductor, underground conduit and conductor, and other), land (broken down into fee ownership, easement, and other), and other (if applicable) and (ii) a non-binding estimate of the total project costs by calendar quarter;

(g) Within 60 days after the true-up is rendered for a year, the actual cost for each capital addition that was placed in service during that year; and, for each such capital addition with an actual or estimated cost of \$20 million or greater, the NU Companies will provide the following to the extent available: (i) a breakdown of the actual cost into the following categories: labor (broken down into planning, engineering, construction, and other), outside services (broken down into planning, engineering, construction, underground conduit and conductor, and other), land (broken down into fee ownership, easement, and other), and other (if applicable) and (ii) the actual total project costs by calendar quarter.

#### 4. Regulatory Filings

Nothing contained in the Tariff or any Service Agreement shall be construed as affecting in any way the right of the NU Companies to unilaterally make application to the Commission for a change in rates, terms and conditions, charges, classification of service, Service Agreement, rule or regulation under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder.

Nothing contained in the Tariff or any Service Agreement shall be construed as affecting in any way the ability of any Party receiving service under the Tariff to exercise its rights under the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder.

5. Creditworthiness: See Attachment NU-L to this Schedule 21-NU.

#### 6. Rights Under The Federal Power Act

Nothing in this section shall restrict the rights of any party to file a complaint with the Commission under relevant provisions of the Federal Power Act.

### II. POINT-TO-POINT TRANSMISSION SERVICE

### Scheduling of Point-To-Point Transmission Service:

The System Operator will dispatch all resources subject to its control, pursuant to Market Rule 1, in order to meet load and to accommodate external transactions. Resources within the New England Control Area using Firm Point-to-Point Transmission Service shall be dispatched based on economic merit in accordance with Market Rule 1 and will have no physical scheduling or dispatch rights. Transmission Customers will be charged for congestion costs and any other costs associated with such dispatch in accordance with Market Rule 1.

### 7. Nature of Firm Point-To-Point Transmission Service

### 7.1 Classification of Firm Transmission Service

The Transmission Customer will be billed for its Reserved Capacity under the terms of Schedule NU-2, as appropriate, for Long and Short-Term Firm Point-To-Point Transmission Service. In the event that either a Transmission Customer has not made a capacity reservation, or a Transmission Customer exceeds its firm capacity reservation at the Point of Receipt and Point of Delivery the Transmission Customer shall be billed and pay for its actual use of such excess capacity in addition to any Reserved Capacity pursuant to Schedule NU-2, including ancillary services provided pursuant to Schedule NU-1 hereto.

### 8. Nature of Non-Firm Point-To-Point Transmission Service

### 8.1 Classification of Non-Firm Point-To-Point Transmission Service

The Transmission Customer will be billed for its Reserved Capacity under the terms of Schedule NU-3, as appropriate, for non-firm Point-To-Point Transmission Service. In the event that either a Transmission Customer has not made a capacity reservation, or a Transmission Customer exceeds its non-firm capacity reservation at any Point of Receipt or Point of Delivery, the Transmission Customer shall be billed and pay for its actual use of such excess capacity in addition to any Reserved Capacity pursuant to Schedule NU-3, including ancillary services provided pursuant to Schedule NU-1 hereto. Non-Firm Point-To-Point Transmission Service shall include transmission of energy on an hourly basis and transmission of scheduled short-term

capacity and/or energy on a daily, weekly or monthly basis, but not to exceed one month's reservation for any one Application, under Schedule NU-3.

### 9. Service Availability

## 9.1 Real Power Losses

Real Power Losses are associated with all transmission service. The NU Companies are not obligated to provide Real Power Losses. The Transmission Customer is responsible for replacing losses associated with all transmission service as determined under Market Rule 1. The applicable Real Power Loss factors are as follows:

The amount of transmission losses incurred in transmitting power from the POR(s) to the POD(s) ("Loss Amount") shall be determined from time to time by the New England System Operator in accordance with ISO procedures applicable at the time of delivery. The Loss Amounts, when determined by the New England System Operator, shall be posted on the NU Companies' Open Access Same-Time Information System ("OASIS"). In the event that the New England System Operator, for any reason, does not determine the entire Loss Amount, the losses not determined by the New England System Operator shall be based on average system losses as set forth below:

Cumulative	Losses	in I	Percent
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POR/POD	Peak*	Off-Peak	24 Hr. Avg.
Bulk Transmission	1.98	2.42	2.21
Bulk Substation	2.46	2.92	2.70
Pri. Distribution	4.58	4.50	4.54

\*Peak hours are defined as 0700-2300, Monday-Friday; Off-Peak hours are all other hours.

### 10. Procedures for Arranging Firm Point-To-Point Transmission Service

10.1 Deposit

A Completed Application for Firm Point-To-Point Transmission Service also shall include a deposit of either three month's charge for Reserved Capacity or the full charge for Reserved Capacity for service requests of less than one month.

### 11. Additional Study Procedures For Firm Point-To-Point Transmission Service Requests:

#### 11.1 Disbursement Methodology for Late Study Penalties

See Attachment NU-D to Schedule 21-NU.

### 12. Compensation for Transmission Service

The Transmission Customers taking Point-To-Point Transmission Service shall pay the NU Companies for any Direct Assignment Facilities, Ancillary Services and applicable study costs, along with the following:

### 12.1 Rates and Charges for Transmission Service

Rates for Firm and Non-Firm Point-To-Point Transmission Services are provided in the Attachments appended to this Local Service Schedule: Firm Point-To-Point Transmission Services (Schedule NU-2); and Non-Firm Point-To-Point Transmission Services (Schedule NU-3).

#### 12.2 Rates for Firm and Non-Firm Point-To-Point Transmission Services

Rates for Firm and Non-Firm Point to Point Transmission Services shall be determined as set forth in Attachments NU-2 and NU-3 of this Local Service Schedule on the basis of estimated costs for each Service Year until the actual costs for such Service Year are determined. Thereafter, payments made on such estimated costs shall be recalculated based on actual data for that Service Year, and an appropriate billing adjustment shall be made pursuant to Section 3 of this Local Service Schedule. The NU Companies shall use Part II of the Tariff to make their Third-Party Sales. The NU Companies shall account for such use at the applicable Tariff rates.

### III. LOCAL NETWORK SERVICE

13. Nature of Local Network Service

## 13.1 Real Power Losses

Real Power Losses are associated with all transmission service. The NU Companies are not obligated to provide Real Power Losses. The Network Customer is responsible for replacing losses associated with all transmission service as determined under Market Rule 1. The applicable Real Power Loss factors are as follows:

The amount of transmission losses incurred in transmitting power across the NU Companies' Transmission System to the Network Customer's Network Load shall be determined from time to time by the New England System Operator in accordance with ISO procedures applicable at the time of delivery. The Loss Amounts, when determined by the New England System Operator, shall be posted on the Open Access Same-Time Information System ("OASIS"). In the event that the New England System Operator, for any reason, does not determine the entire Loss Amount, the losses not determined by the New England System Operator shall be based on average system losses as set forth below:

### Cumulative Losses in Percent

			24 Hr.
POR/POD	Peak*	Off-Peak	Avg.
Bulk Transmission	1.98	2.42	2.21
Bulk Substation	2.46	2.92	2.70
Pri. Distribution	4.58	4.50	4.54

\*Peak hours are defined as 0700-2300, Monday-Friday; Off-Peak hours are all other hours.

## 14. Network Resources

### 14.1 Use of Interface Capacity by the Network Customer

There is no limitation upon a Network Customer's use of the NU Companies' Transmission System at any particular interface to integrate the Network Customer's Network Resources (or substitute economy purchases) with its Network Loads. However, a Network Customer's use of the NU Companies' total interface capacity with other transmission systems may not exceed the Network Customer's Load.

## 15. Additional Study Procedures For Local Network Service Requests

**15.1 Disbursement Methodology for Late Study Penalties** See Attachment NU-D to Schedule 21-NU

### 16. Rates and Charges

The Network Customer shall pay the NU Companies for any Direct Assignment Facilities, Ancillary Services, and applicable study costs, consistent with Commission policy, along with the following:

### 16.1 Rates and Charges

Rates for Local Network Service shall be determined as set forth in Schedule NU-4 on the basis of estimated costs for each Service Year until the actual costs for such Service Year are determined. Thereafter, payments made on such estimated costs shall be recalculated based on actual data for that Service Year, and an appropriate billing adjustment shall be made pursuant to Section 3 of this Local Service Schedule.

### 16.2 Eligible Customers Taking Service Under the ISO Tariff

Any Eligible Customer taking Regional Network Service under the ISO Tariff in a Designated State or Area shall pay to the NU Companies the customer's Category B Load Ratio Share of the Formula Requirements as calculated in Schedule NU-4, Appendix B for such Designated State or Area. The NU Companies shall execute a LCRA under this Local Service Schedule, in the form set forth in Attachment NU-E, to recover such charges from such customer. The NU Companies shall not bill any such customer any such costs until (1) such LCRA has been executed with the Eligible Customer, or (2) an unexecuted LCRA has been permitted to be made effective **by** the Commission.

16.3 Listing of Localized Facilities by Designated State or Area:

(a) Connecticut:
Bethel to Norwalk Project
Middletown to Norwalk Project
Glenbrook Cables Project
Greater Springfield Reliability Project (Connecticut portion)

(b) Massachusetts:

Greater Springfield Reliability Project (Massachusetts portion)

### 16.4 Monthly Demand Charge

The Network Customer shall pay monthly Demand Charges, which shall be determined by multiplying its Category A Load Ratio Share times one twelfth (1/12) of the Formula Requirements in Schedule NU-4, Appendix A, and by multiplying its Category B Load Ratio Share for the Designated State or Area times one twelfth (1/12) of the Formula Requirements in Schedule NU-4, Appendix B for the Localized Facilities that are in such Designated State or Area.

#### 16.5 Determination of Network Customer's Monthly Network Load

The Network Customer's Monthly Category A Network Load is its hourly load (including its designated Network Load not physically interconnected with the NU Companies under Schedule 21) coincident with the NU Companies' Monthly Transmission System Peak.

The Network Customer's Monthly Category B Load for a Designated State **or** Area for a Localized Facility is its hourly load in such Designated State or Area coincident with the monthly transmission system peak load for such Designated State or Area.

For Localized Facilities for which the Designated State or Area is identified as "Connecticut" in Section 16.3(a) of this Schedule 21-NU, the customer's hourly load shall be all of the customer's Regional Network Load in Connecticut, and the monthly transmission system peak load shall be all Regional Network Load in Connecticut.

For Localized Facilities for which the Designated State or Area is identified as "Massachusetts" in Section 16.3(b) of this Schedule 21-NU, the customer's hourly load shall be all of the customer's Regional Network Load in Massachusetts, and the monthly transmission system peak load shall be all Regional Network Load in Massachusetts; provided, that the customer's monthly load and the monthly transmission system peak load shall exclude the load of generators taking RNS for the delivery of offline station service.

### 16.6 Determination of NU Companies' Monthly Transmission System Load

The NU Companies' Monthly Transmission System Category A Load is the NU Companies' Monthly Transmission System Peak minus the coincident peak usage of all Firm Point-To-Point Transmission Service customers pursuant to this Local Service Schedule plus the Reserved Capacity of all Firm Point-To-Point Transmission Service customers.<sup>1</sup>

The NU Companies' Monthly Transmission System Category B Load for the Designated State or Area for a **Localized** Facility is the monthly transmission system peak load for such Designated State or Area.<sup>1</sup>

For Localized Facilities for which the Designated State or Area is identified as "Connecticut" in Section 16.3(a) of this Schedule 21-NU, the monthly transmission system peak load shall be all Regional Network Load in Connecticut.

For Localized Facilities for which the Designated State or Area is identified as "Massachusetts" in Section 16.3(b) of this Schedule 21-NU, the monthly transmission system peak load shall be all Regional Network Load in Massachusetts; provided, that the monthly transmission system peak load shall exclude the load of generators taking RNS for the delivery of offline station service.

<sup>&</sup>lt;sup>1</sup> Excludes MWs associated with lump sum payment transactions identified in footnote 2.

## 17. Operating Arrangements

#### 17.1 Operation under the Network Operating Agreement

The Network Customer shall plan, construct, operate and maintain its facilities in accordance with Good Utility Practice and in conformance with the Network Operating Agreement.

### 17.2 Network Operating Agreement

The terms and conditions under which the Network Customer shall operate its facilities and the technical and operational matters associated with the implementation of Part III of the Tariff shall be specified in the Network Operating Agreement. The Network Operating Agreement shall provide for the Parties to (i) operate and maintain equipment necessary for integrating the Network Customer within the NU Companies' Transmission System (including, but not limited to, remote terminal units, metering, communications equipment and relaying equipment), (ii) transfer data between the NU Companies and the Network Customer (including, but not limited to, heat rates and operational characteristics of Network Resources, generation schedules for units outside the NU Companies' Transmission System, interchange schedules, unit outputs for redispatch, voltage schedules, loss factors and other real time data), (iii) use software programs required for data links and constraint dispatching, (iv) exchange data on forecasted loads and resources necessary for long-term planning, and (v) address any other technical and operational considerations required for implementation of Part III of the Tariff, including scheduling protocols. The Network Operating Agreement will recognize that the Network Customer shall either (i) operate as a Control Area under applicable guidelines of the North American Electric Reliability Council (NERC) and the Northeast Power Coordinating Council (NPCC), (ii) satisfy its Control Area requirements, including all necessary Ancillary Services, by contracting with the NU Companies, or (iii) satisfy its Control Area requirements, including all necessary Ancillary Services, by contracting with another entity, consistent with Good Utility Practice, which satisfies NERC and NPCC requirements. The NU Companies shall not unreasonably refuse to accept contractual arrangements with another entity for Ancillary Services. The Network Operating Agreement is included in Attachment NU-G.

### SCHEDULE NU-1

### SCHEDULING, SYSTEM CONTROL AND DISPATCH SERVICE

This service is required to schedule the movement of power through, out of, within, or into a Control Area. This service can be provided only by the operator of the Control Area in which the transmission facilities used for transmission service are located. Scheduling, System Control and Dispatch Service is to be provided directly by the NU Companies (if the NU Companies are the Control Area operator) or indirectly by the NU Companies making arrangements with the New England System Operator that performs this service for the NU Companies' Transmission System. The Transmission Customer must purchase this service from the NU Companies or the New England System Operator. The charges for Scheduling, System Control and Dispatch Service are to be based on the rates set forth below. To the extent the New England System Operator performs this service for the NU Companies by that New England System Operator.

Each Point-To-Point Transmission Customer under this Local Service Schedule will be charged for Transmission Scheduling, System Control and Dispatch Services for the total Reserved Capacity specified in each reservation for Point-To-Point Transmission Service made under this Local Service Schedule at the rates set forth in Appendix A of this Schedule NU-1. In the event that a Transmission Customer utilizes transmission capacity without a reservation or exceeds its capacity reservation at any Point of Receipt or Point of Delivery, the Transmission Customer **shall** pay for its actual use of such excess capacity in addition to any Reserved Capacity. The charge for such excess use of capacity shall be determined by multiplying the sum of the actual use in excess of its capacity reservation times the hourly non-firm rate posted on the NU Companies' OASIS including ancillary services provided pursuant to Schedule NU-1 hereto.

Each Network Customer under this Local Service Schedule will be charged a monthly Transmission Scheduling, System Control and Dispatch Service Demand Charge, which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of the Formula Requirements specified in Appendix B of this Schedule NU-1.

Each Transmission Customer with generation within the New England Control Area shall be required also to provide for Scheduling, System Control and Dispatch Service for that generation. It is anticipated that the Transmission Customer will obtain these services from the ISO. The NU Companies will make

available Generation Scheduling, System Control and Dispatch Service at the rates set forth in Appendix C of this Schedule NU-1.

Each Transmission Customer with generation located outside of the New England Control Area shall be required to provide for Scheduling, System Control and Dispatching Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting for these services from the provider of these services within the Control Area where the generation is located.

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule NU-1 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE NU-1 Appendix A POINT-TO-POINT TRANSMISSION RATE

The NU Companies' Formula Rate for Point-To-Point Transmission Scheduling, System Control and Dispatch Service ("Formula Rate") is an annual rate determined from the following formula.

Formula  $Rate_i = (A_{i-1} - B_{i-1}) C_{i-1}$  WHERE:

- i equals the calendar year during which service is being rendered ("Service Year").
- A<sub>i-1</sub> is the Annual Control Center Expenses (expressed in dollars) of the NU Companies for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule NU-1.
- B<sub>i-1</sub> is the actual transmission scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual transmission scheduling and dispatch revenues shall be those recorded on the books of the NU Companies in FERC Account No. 456.1 pertaining to Transmission of Electricity for Others and such other applicable FERC accounts for the calendar year prior to the Service Year.
- C<sub>i-1</sub> is the average NU Companies' Monthly Transmission System Category A Load (expressed in kilowatts).

# SCHEDULE NU-1

# Appendix A

# Exhibit 1

# DETERMINATION OF ANNUAL CONTROL CENTER EXPENSES

The rate formula for determination of the annual control center expenses revenue requirements for each of the NU Companies is determined as follows:

# A. <u>ANNUAL CONTROL CENTER EXPENSES</u>

The NU Companies' System Control and Load Dispatching Expense, for the calendar year prior to the Service Year, as recorded in FERC Account 561.1-561.4 and the revenue requirement calculation for the CL&P Dispatch Center Plant as described in Appendix A, Exhibit 2.

# SCHEDULE NU-1 APPENDIX A EXHIBIT 2 CL&P DISPATCH CENTER REVENUE REQUIREMENT

This exhibit calculates the CL&P Dispatch Center Revenue Requirement. The CL&P Dispatch Center Revenue Requirement for use during a calendar year shall be based on CL&P's costs for the immediately preceding calendar year.

### I. DEFINITIONS

Capitalized terms not otherwise defined in Section I. of the ISO-NE Transmission, Markets and Services Tariff and as used in this exhibit have the following definitions:

Dispatch Center means CL&P's CONVEX dispatch center.

<u>Dispatch Center Plant</u> shall equal CL&P's year-end gross plant balances used for CL&P's Dispatch Center as recorded in FERC Account Nos. 303, 350-359, and 389-399.

<u>Dispatch Center Depreciation Reserve</u> shall equal CL&P's year-end depreciation reserve balance for Dispatch Center Plant as recorded in FERC Account No. 108.

Dispatch Center Accumulated Deferred Income Taxes shall equal the net of CL&P's year-end deferred tax balances for Dispatch Center Plant as recorded in FERC Account Nos. 281-283 and 190.

## II. CALCULATION OF TOTAL DISPATCH CENTER REVENUE REQUIREMENT

The Dispatch Center Revenue Requirement shall equal the sum of (A) Dispatch Center Return and Associated Income Taxes, (B) Dispatch Center Depreciation Expense, (C) Dispatch Center Amortization of Investment Tax Credits, and (D) Dispatch Center Municipal Tax Expense; provided, that during the period January 1, 2008 through December 31, 2008, the Dispatch Center Revenue Requirement shall equal the product of (i) the number of months (or fractions thereof) remaining in 2007 on and after the date upon which the CONVEX Agreements are permitted to be made effective by FERC, divided by 12 and (ii) the sum of (A) Dispatch Center Return and Associated Income Taxes, (B) Dispatch Center Depreciation Expense, (C) Dispatch Center Amortization of Investment Tax Credits, and (D) Dispatch Center Municipal Tax Expense. "CONVEX Agreements" refers to the agreements between The

Connecticut Light & Power Company and various entities relating to the operation of the Dispatch Center and filed with FERC contemporaneously with the filing of this Exhibit 2.

A. <u>Dispatch Center Return and Associated Income Taxes</u> shall equal the product of the Dispatch Center Investment Base and the Cost of Capital Rate.

1. Dispatch Center Investment Base

<u>The Dispatch Center Investment Base</u> will be the year-end balances of: (a) Dispatch Center Plant, less (b) Dispatch Center Depreciation Reserve, less (c) Dispatch Center Accumulated Deferred Income Taxes.

2. Cost of Capital Rate

<u>The Cost of Capital Rate</u> will equal (a) the Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.

(a) The Weighted Cost of Capital will be calculated based upon CL&P's capital structure at the end of each year and will equal the sum of (i),(ii), and (iii) below.

(i) The long-term debt component, which equals the product of the year-end balance of CL&P's first mortgage bonds and pollution control notes adjusted for premiums, discounts, debt expense and losses on reacquired debt and the ratio of the long term debt to CL&P's total capital.

(ii) The preferred stock component, which equals the product of the year-end balance of CL&P's preferred stock adjusted for premiums, discounts and unamortized issue expense and the ratio of the preferred stock to CL&P's total capital.

(iii) The common equity component, which equals the product of 10.3% and the ratio of the common equity to CL&P's total capital.

(b and c) Federal and State Income Taxes shall be computed as follows:

A x B x C

where: A = Dispatch Center Investment Base

B = Cost of equity capital (the sum of the preferred stock component and common equity component)

C = TE / (1-TE), where TE is the effective combined federal and state statutory income tax rates in effect at the applicable time.

B. <u>Dispatch Center Depreciation Expense</u> shall equal CL&P's Dispatch Center depreciation expense as recorded in FERC Account No. 403.

C. <u>Dispatch Center Amortization of Investment Tax Credits</u> shall equal CL&P's Dispatch Center amortization of investment tax credits as recorded in FERC Account No. 411.4.

D. <u>Dispatch Center Municipal Tax Expense</u> shall equal CL&P's Dispatch Center municipal tax expense as recorded in FERC Account Nos. 408.1 and 409.1.

# SCHEDULE NU-1

### Appendix B

# NETWORK TRANSMISSION FORMULA REQUIREMENTS

The NU Companies' formula requirements for Network Transmission Scheduling, System Control and Dispatch Service is determined from the following formula.

Formula Requirements<sub>i</sub> =  $(A_{i-1} - B_{i-1})$ 

### WHERE:

- i equals the calendar year during which service is being rendered ("Service Year").
- A<sub>i-1</sub> is the Annual Control Center Expenses (expressed in dollars) of the NU Companies for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to this Appendix B of Schedule NU-1.
- B<sub>i-1</sub> is the actual transmission scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual transmission scheduling, system control and dispatch revenues shall be those recorded on the books of the NU Companies in FERC Account No. 456.1 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

# SCHEDULE NU-1 APPENDIX B

# EXHIBIT 1

## DETERMINATION OF ANNUAL CONTROL CENTER EXPENSES

The rate formula for determination of the annual control center expenses for each of the NU Companies is determined as follows:

# A. <u>ANNUAL CONTROL CENTER EXPENSES</u>

The NU Companies' System Control and Load Dispatching Expense), for the calendar year prior to the Service Year as recorded in FERC Account 561.1-561.4 and the revenue requirement calculation for the CL&P Dispatch Center Plant as described in Appendix B, Exhibit 2.

# SCHEDULE NU-1 APPENDIX B EXHIBIT 2 CL&P DISPATCH CENTER REVENUE REQUIREMENT

This exhibit calculates the CL&P Dispatch Center Revenue Requirement. The CL&P Dispatch Center Revenue Requirement for use during a calendar year shall be based on CL&P's costs for the immediately preceding calendar year.

### I. DEFINITIONS

Capitalized terms not otherwise defined in Section I. of the ISO-NE Transmission, Markets and Services Tariff and as used in this exhibit have the following definitions:

Dispatch Center means CL&P's CONVEX dispatch center.

Dispatch Center Plant shall equal CL&P's year-end gross plant balances used for CL&P's Dispatch Center as recorded in FERC Account Nos. 303, 350-359, and 389-399.

Dispatch Center Depreciation Reserve shall equal CL&P's year-end depreciation reserve balance for Dispatch Center Plant as recorded in FERC Account No. 108.

Dispatch Center Accumulated Deferred Income Taxes shall equal the net of CL&P's year-end deferred tax balances for Dispatch Center Plant as recorded in FERC Account Nos. 281-283 and 190.

## II. CALCULATION OF TOTAL DISPATCH CENTER REVENUE REQUIREMENT

The Dispatch Center Revenue Requirement shall equal the sum of (A) Dispatch Center Return and Associated Income Taxes, (B) Dispatch Center Depreciation Expense, (C) Dispatch Center Amortization of Investment Tax Credits, and (D) Dispatch Center Municipal Tax Expense; provided, that during the period January 1, 2008 through December 31, 2008, the Dispatch Center Revenue Requirement shall equal the product of (i) the number of months (or fractions thereof) remaining in 2007 on and after the date upon which the CONVEX Agreements are permitted to be made effective by FERC, divided by 12 and (ii) the sum of (A) Dispatch Center Return and Associated Income Taxes, (B) Dispatch Center Depreciation Expense, (C) Dispatch Center Amortization of Investment Tax Credits, and (D) Dispatch Center Municipal Tax Expense. "CONVEX Agreements" refers to the agreements between The

Connecticut Light & Power Company and various entities relating to the operation of the Dispatch Center and filed with FERC contemporaneously with the filing of this Exhibit 2.

A. <u>Dispatch Center Return and Associated Income Taxes</u> shall equal the product of the Dispatch Center Investment Base and the Cost of Capital Rate.

- Dispatch Center Investment Base <u>The Dispatch Center Investment Base</u> will be the year-end balances of: (a) Dispatch Center Plant, less (b) Dispatch Center Depreciation Reserve, less (c) Dispatch Center Accumulated Deferred Income Taxes.
- Cost of Capital Rate <u>The Cost of Capital Rate</u> will equal (a) the Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.
- (a) The Weighted Cost of Capital will be calculated based upon CL&P's capital structure at the end of each year and will equal the sum of (i),(ii), and (iii) below.
- The long-term debt component, which equals the product of the year-end balance of CL&P's first mortgage bonds and pollution control notes adjusted for premiums, discounts, debt expense and losses on reacquired debt and the ratio of the long term debt to CL&P's total capital.
- (ii) The preferred stock component, which equals the product of the year-end balance of CL&P's preferred stock adjusted for premiums, discounts and unamortized issue expense and the ratio of the preferred stock to CL&P's total capital.
- (iii) The common equity component, which equals the product of 10.3% and the ratio of the common equity to CL&P's total capital.
- (b and c) Federal and State Income Taxes shall be computed as follows:

A x B x C

where:

A = Dispatch Center Investment Base B = Cost of equity capital (the sum of the preferred stock component and common equity component)

C = TE / (1-TE), where TE is the effective combined federal and state statutory income tax rates in effect at the applicable time.

B. <u>Dispatch Center Depreciation Expense</u> shall equal CL&P's Dispatch Center depreciation expense as recorded in FERC Account No. 403.

C. <u>Dispatch Center Amortization of Investment Tax Credits</u> shall equal CL&P's Dispatch Center amortization of investment tax credits as recorded in FERC Account No. 411.4.

D. <u>Dispatch Center Municipal Tax Expense</u> shall equal CL&P's Dispatch Center municipal tax expense as recorded in FERC Account Nos. 408.1 and 409.1.

# SCHEDULE NU-1 Appendix C GENERATION RATES

The NU Companies' Formula Rate for Generation Scheduling, System Control and Dispatch Service ("Formula Rate") shall be calculated using the Point-to-Point Formula Rate for Transmission Scheduling, System Control, and Dispatch Service in Appendix A of Schedule NU-1.

# SCHEDULE NU-2 FIRM POINT-TO-POINT SERVICE

I. Each month, NUSCO shall bill the Transmission Customer for Long-Term Firm and Short-Term Firm Transmission Service and the Transmission Customer shall be obligated to pay the NU Companies the charges as set forth in this Schedule NU-2, as applicable.

### A. TRANSMISSION CHARGES

### 1. Determination of Transmission Charges

The Transmission Charges will provide for recovery of the costs of the transmission facilities of the NU Companies. The Category A Transmission Charges for each month will equal the sum of the Category A Charges for each monthly (or longer term), weekly or daily transaction during such month. In the event that a Transmission Customer utilizes transmission capacity without a reservation or exceeds its capacity reservation at any Point of Receipt or Point of Delivery, the Transmission Customer **shall** pay for its actual use of such excess capacity in addition to the charges for each monthly, weekly or daily transactions during such month. The charge for such excess use of capacity shall be determined by multiplying the actual hourly use in excess of its capacity reservation times the applicable Category A on-peak or off-peak hourly non-firm rate posted on the NU Companies' OASIS pursuant to Schedule NU-3 including ancillary services provided pursuant to Schedule NU-1 hereto.

The Category A Charge for each monthly (or longer term) transactions will be the product of: (a) the NU Companies' Category A Formula Rate (expressed in \$ per kilowatt-year), divided by twelve (12) months, and (b) the Reserved Capacity set forth for such monthly (or longer term) transaction (expressed in kilowatts).

The Category A Charge for each weekly transaction will be the product of: (a) the NU Companies' Weekly Category A Short-Term Firm Point-To-Point Transmission Rate (expressed in \$ per kilowatt-week), and (b) the Reserved Capacity set forth for such weekly transaction (expressed in kilowatts). The NU Companies' Weekly Category A Rate is the NU Companies' Category A Formula Rate for Firm Point-To-Point Transmission Service divided by fifty-two (52) weeks. The Category A Charge for each daily transaction will be the product of: (a) the NU Companies' Daily Category A Short-Term Firm Point-To-Point Transmission Rate (expressed in \$ per kilowatt-day), and (b) the Reserved Capacity set forth for such daily transaction (expressed in kilowatts). The NU Companies' Daily Category A Rate is the NU Companies' Weekly Category A Rate for Short-Term Firm Point-To-Point Transmission Service divided by five (5) days. The total of the Transmission Customer's charges for daily transactions, under an individual reservation, in a seven (7) day period shall not exceed the charges based on the Weekly Category A Rate and the Transmission Customer's maximum Reserved Capacity in the period.

### 2. <u>NU Companies' Formula Rates</u>

The NU Companies' Formula Rates for Long-Term Firm and Short-Term Firm Point-To-Point Service shall be determined in accordance with the rate formulas specified in Appendix A of this Schedule NU-2.

# 3. <u>Tax Rates and Taxes</u>

The NU Companies' Formula Rates set forth in this schedule in effect during a Service Year shall be based on the local, state, and federal tax rates and taxes in effect during the Service Year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the NU Companies' Formula Rate will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

### 4. <u>Provision re: Exchanges</u>

With respect to Entitlement Transactions or Energy Transactions or other transactions that involve an exchange, each party to such transaction shall be treated as an individual Transmission Customer under this Local Service Schedule. Accordingly, a separate Schedule NU-2 or other applicable charge(s) will be calculated for, and a separate bill will be rendered to, each such individual Transmission Customer.

### 5. <u>Discounts</u>

Three principal requirements apply to discounts for transmission service as follows: (1) any offer of a discount made by the NU Companies must be announced to all Eligible Customers solely by posting on the OASIS, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on the OASIS, and (3) once a discount is negotiated, details must be immediately posted on the OASIS. For any discount agreed upon for service on a path, from point(s) of receipt to point(s) of delivery, the NU Companies must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on the Transmission System.

### 6. <u>Resales</u>

The rates and rules governing charges and discounts in Sections I.A.1 and 5 of this Schedule NU-2 stated above shall not apply to resales of transmission service, compensation for which shall be governed by Schedule 21.

II. In addition to the applicable charges of this Local Service Schedule, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay to NUSCO each month the following additional charges for Long-Term, and Short-Term Firm Point-To-Point Transmission Service provided during such month.

A. Taxes and Fees Charge

B. Regulatory Expenses Charge

C. Other

## A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Long-Term Firm or Short Term Firm Point-To-Point Transmission Service provided under this Local Service Schedule, not specifically provided for in any of the charge or rate provisions under this Local Service Schedule, including any applicable interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for any such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

## B. **<u>REGULATORY EXPENSES CHARGE</u>**

The NU Companies shall have the right to make a Section 205 filing for recovery of regulatory expenses associated with this Local Service Schedule and the Service Agreements.

# C. OTHER

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule NU-2 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE NU-2 Appendix A CATEGORY A RATE FIRM POINT-TO-POINT TRANSMISSION SERVICE

The NU Companies' Category A Formula Rate for Long-Term Firm and Short-Term Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula. Formula Rate<sub>i</sub> =  $(A_i - B_i + C_i - D_i) / E_i$ 

# WHERE:

- i equals the Service Year.
- A is the annual Total Transmission Revenue Requirements (expressed in dollars) as described in Attachment NU-H,
- B is the revenues received (expressed in dollars) from the provision of transmission and other related services, to others as recorded in FERC Accounts 456.1 and 454 to the extent that such transactions are not included in the determination of load (E),<sup>2</sup> minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- C is the transmission payments (expressed in dollars) to the New England System Operator as recorded in FERC Account 565 in accordance with the Tariff.
- D is the sum of the annual revenues received (expressed in dollars) for the costs associated with the Localized Facilities, minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- E is the average NU Companies' Monthly Transmission System Category A Load (expressed in kilowatts).

<sup>&</sup>lt;sup>2</sup> Includes amortization of revenues from point-to-point transmission service provided to Consolidated Edison Energy Massachusetts, Inc. and NRG Energy, Inc. under contracts in which customers paid based on single lump sum payment.

SCHEDULE NU-2

[Reserved]

# SCHEDULE NU-3 NON-FIRM POINT-TO-POINT SERVICE

I. The NU Companies shall bill the Transmission Customer for Non-Firm Point-To-Point Transmission Service, and the Transmission Customer shall be obligated to pay the NU Companies the charges as set forth in this Schedule NU-3 as applicable.

## A. TRANSMISSION CHARGES

#### 1. General

The Transmission Customer shall pay to NUSCO each month the Category A Transmission Charges calculated for all of the Transmission Customer's monthly transactions, weekly transactions, daily transactions and hourly transactions, each as set forth below. In the event that a Transmission Customer utilizes transmission capacity without a reservation or exceeds its capacity reservation at any Point of Receipt or Point of Delivery, the Transmission Customer shall pay for its actual use of such excess capacity in addition to the charges for each monthly, weekly, daily or hourly transactions during such month. The charge for such excess use of capacity shall be determined by multiplying the actual hourly use in excess of its capacity reservation times the applicable Category A on-peak or off-peak hourly non-firm rate posted on the NU Companies' OASIS pursuant to this Schedule NU-3 including ancillary services provided pursuant to Schedule NU-1 hereto.

With respect to any wholesale transactions that involve an exchange, each party to such transaction shall be an individual Transmission Customer under this Local Service Schedule. Accordingly, a Transmission Charge, as applicable, will be calculated for, and a separate bill will be rendered to, each such Transmission Customer.

The Category A Transmission Charge for each month applicable to a monthly transaction shall be determined as the product of: (a) the Category A rate posted on NU's Open Access Same-Time Information System ("OASIS") at the time the service is reserved, not to exceed the NU Companies' Annual Category A Rate for Non Firm Point-To-Point Transmission Service divided by twelve (12) months and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such month (expressed in kilowatts).

The Category A Transmission Charge for each month applicable to weekly transactions shall be the sum of the transmission charges determined for each weekly transaction during such month. The transmission charge for each weekly transaction shall be determined as the product of: (a) the Category A rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Weekly Category A Firm Point-To-Point Transmission Charge Rate (expressed in \$ per kilowatt-week), and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such week (expressed in kilowatts). The NU Companies' Weekly Category A Rate is the NU Companies' Annual Category A Rate for Non-Firm Point-To-Point Transmission Service divided by fifty-two (52) weeks.

The Transmission Charge for each month applicable to daily transactions will be the sum of the transmission charges determined for each daily transaction. The transmission charge for each daily transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Daily Category A Firm Point-To-Point Transmission Charge Rate (expressed in \$ per kilowatt-day), and (b) the Reserved Capacity set forth in the Transmission Customer's applicable Reservation for such day (expressed in kilowatts). The NU Companies' Daily Category A On-Peak Rate is the NU Companies' Weekly Category A Rate for Non-Firm Point-To-Point Transmission Service divided by five (5) days. The NU Companies' Daily Category A Off-Peak Rate is the NU Companies'

Weekly Category A Rate for Non-Firm Point-To-Point Transmission Service divided by seven (7) days. The total of the Transmission Customer's charges for daily transactions, under an individual Reservation, in a seven (7) day period shall not exceed the charges based on the Weekly Category A Rate and the Transmission Customer's maximum Reserved Capacity in the period.

The Transmission Charge for each month applicable to hourly transactions will be the sum of the transmission charges determined for each hourly transaction during such month. The transmission charge for each hour of an hourly Transaction shall be determined as the product of: (a) the rate posted on the NU Companies' OASIS at the time the service is reserved, not to exceed the NU Companies' Daily Category A Firm Point-To-Point Transmission Service Rate divided by sixteen (16) hours (expressed in \$ per kilowatt-hour), and (b) the Reserved Capacity as set forth in the Transmission Customer's applicable Reservation for such hour (expressed in kilowatts). The NU Companies' Hourly Category A On-Peak Rate is equal to the NU Companies' Daily

Category A Rate for Non-Firm Transmission Service divided by sixteen (16) hours. The NU Companies' Hourly Category A Off-Peak Rate is equal to the NU Companies' Daily Category A Rate for Non-Firm Transmission Service divided by twenty-four (24) hours. The total of the Transmission Customer's charges for hourly transactions, under an individual Reservation, in a twenty-four (24) hour period shall not exceed the charges based on the Daily Category A Rate and the Transmission Customer's maximum Reserved Capacity in the period.

# 2. <u>Discounts</u>

Three principal requirements apply to discounts for transmission service as follows: (1) any offer of a discount made by the NU Companies must be announced to all Eligible Customers solely by posting on the OASIS, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on the OASIS, and (3) once a discount is negotiated, details must be immediately posted on the OASIS. For any discount agreed upon for service on a path, from point(s) of receipt to point(s) of delivery, the NU Companies must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on the Transmission System.

### 3. <u>Resales</u>

The rates and rules governing charges and discounts in Sections I.A.1 and 2 of this Schedule NU-3 stated above shall not apply to resales of transmission service, compensation for which shall be governed by Schedule 21.

### 4. <u>Credit to the Transmission Charge</u>

Whenever service provided hereunder is interrupted or curtailed by the NU Companies, the Local Control Center or the New England System Operator, the Transmission Charges to the Transmission Customer calculated pursuant to Section A, of this Schedule NU-3 shall be credited by an amount equal to the sum of the credits calculated for each hour of interruption or curtailment in service. The credit to the Transmission Customer for each such hour of interruption or curtailment shall be calculated as the product of (i) the applicable equivalent hourly charge for hourly, daily, weekly, or monthly transactions, and (ii) the kilowatts of service interruption or curtailment during such hour.

# 5. <u>NU Companies' Annual Formula Rate for Non Firm Point-To-Point Transmission</u> Service

The NU Companies' Annual Formula Rates for Non Firm Point-To-Point Transmission Service shall be expressed in \$ per kilowatt-year and shall be determined in accordance with the rate formulas specified in Appendix A of this Schedule NU-3 ("Formula Rates").

## 6. <u>Tax Rates and Taxes</u>

The Formula Rates set forth in this Schedule NU-3 in effect during a Service Year shall be based on local, state, and federal tax rates and taxes in effect during the Service Year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the Formula Rate will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations.

- II. In addition to the applicable charges of this Local Service Schedule, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay NUSCO each month the following additional charges for Non-firm Point-To-Point Transmission Service provided during such month.
- A. Taxes and Fees Charge
- B. Regulatory Expenses Charge
- C. Other

### A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for Non-Firm Point-To-Point Transmission Service provided under this Local Service Schedule, not specifically provided for in any of the charge or rate provisions under this Local Service Schedule, including any applicable interest charged on any deficiency assessment made by the taxing authority, together with any further tax on such payments, the obligation to make payment for such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

# B. **<u>REGULATORY EXPENSES</u>**

The NU Companies reserve their rights to make a Section 205 filing for recovery of their costs to administer this Local Service Schedule and the Service Agreements.

# C. OTHER

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule NU-3 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE NU-3 Appendix A CATEGORY A RATE FOR NON-FIRM POINT-TO-POINT SERVICE

The NU Companies' Category A Formula Rate for Non-Firm Point-To-Point Transmission Service ("Formula Rate") is an annual rate determined from the following formula.

Formula Rate<sub>i</sub> =  $(A_i - B_i + C_i - D_i) / E_i$ 

## WHERE:

- i equals the Service Year.
- A is the annual Total Transmission Revenue Requirements (expressed in dollars) as described in Attachment NU-H.
- B is the revenues received (expressed in dollars) from the provision of transmission and other related services to others as recorded in FERC Accounts 456.1 and 454 to the extent that such transactions are not included in the determination of load (E),<sup>2</sup> minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- C is the transmission payments (expressed in dollars) to the New England System Operator as recorded in FERC Account 565 in accordance with the Tariff.
- D is the sum of the annual revenues received (expressed in dollars) for the costs associated with the Localized Facilities, minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- E is the average NU Companies' Monthly Transmission System Category A Load (expressed in kilowatts).
- <sup>2</sup> Includes amortization of revenues from point-to-point transmission service provided to Consolidated Edison Energy Massachusetts, Inc. and NRG Energy, Inc. under contracts in which customers paid based on single lump sum payment.

SCHEDULE NU-3[RESERVED]

### **SCHEDULE NU-4**

# CHARGE PROVISIONS FOR LOCAL NETWORK SERVICE

### I. Network Customers will pay the following demand charges for Local Network Service.

### A. **DEMAND CHARGE A**

- Determination of Demand Charge: The Demand Charge will be determined in accordance with Section 16.316.4 of this Local Service Schedule.
- <u>NU Companies' Annual Transmission Revenue Requirements</u>: The annual Transmission Revenue Requirements shall be determined in accordance with the formula specified in Appendix A of this Schedule NU-4 ("Formula Requirements").

### B. **DEMAND CHARGE B**

## 1. Determination of Demand Charge

The Demand Charge will be determined in accordance with Section <del>16.3</del>16.4 of this Local Service Schedule.

2. <u>NU Companies' Annual Transmission Revenue Requirements:</u>

The annual Transmission Revenue Requirements for each Localized Facility of a Designated State or Area shall be determined in accordance with the formula specified in Appendix B of this Schedule NU-4 ("Formula Requirements").

## C. <u>TAX RATES AND TAXES</u>

The Formula Requirements set forth in this Schedule NU-4 in effect during a Service Year shall be based on local, state, and federal tax rates and taxes in effect during the Service Year. If, at any time, additional or new taxes are imposed on the NU Companies or existing taxes are removed, the Formula Requirements will be appropriately modified and filed with the Commission in accordance with Part 35 of the Commission's regulations. II. In addition to the applicable charges of this Local Service Schedule, and as otherwise specified in the Service Agreement, the Transmission Customer shall pay to NUSCO each month the following additional charges for Local Network Service provided during such month.

A. Taxes and Fees Charge

- B. Regulatory Expenses Charge
- C. Other

# A. TAXES AND FEES CHARGE

If any governmental authority requires the payment of any fee or assessment or imposes any form of tax with respect to payments made for service provided under this Local Service Schedule, not specifically provided for in any of the charge or rate provisions under this Local Service Schedule, including any applicable interest charged on any deficiency assessment by the taxing authority, together with any further tax on such payments, the obligation to make payment for any such fee, assessment, or tax shall be borne by the Transmission Customer. The NU Companies will make a separate filing with the Commission for recovery of any such costs in accordance with Part 35 of the Commission's regulations.

### B. **<u>REGULATORY EXPENSES CHARGE</u>**

The NU Companies shall have the right to make a Section 205 filing for recovery of regulatory expenses associated with this Local Service Schedule and the Service Agreements.

# C. OTHER

The NU Companies shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule NU-4 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# SCHEDULE NU-4 Appendix A NETWORK FORMULA REQUIREMENTS FOR CATEGORY A COSTS

The NU Companies' formula requirements for Local Network Service is determined from the following formula.

Formula Requirements<sub>i</sub> =  $A_i - B_i + C_i - D_i$ 

#### WHERE:

- i equals the Service Year.
- A is the annual Total Transmission Revenue Requirements (expressed in dollars) as described in Attachment NU-H.
- B is the revenues received (expressed in dollars) from the provision of transmission and other related services to others as recorded in FERC Accounts 456.1 and 454 to the extent that such transactions are not included in the determination of load,<sup>2</sup> minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- C is the transmission payments to (expressed in dollars) the New England System Operator as recorded in FERC Accounts 565 in accordance with the Tariff.
- D is the sum of the annual revenues received (expressed in dollars) for the costs associated with Localized Facilities, minus any incremental revenues associated with FERC-approved adders for RTO participation and new transmission investment.
- <sup>2</sup> Includes amortization of revenues from point-to-point transmission service provided to Consolidated Edison Energy Massachusetts, Inc. and NRG Energy, Inc. under contracts in which customers paid based on single lump sum payment.

# SCHEDULE NU-4 Appendix B NETWORK FORMULA REQUIREMENTS FOR CATEGORY B COSTS

The NU Companies' formula requirements for Local Network Service and for Eligible Customers taking Regional Network Service under this Tariff in a Designated State or Area of a Localized Facility, is determined from the following formula, and separately determined for each Designated State or Area of a Localized Facility.

Formula Requirements<sub>i</sub> =  $D_i$ 

## WHERE:

- i equals the Service Year.
- D is the annual Localized Transmission Revenue Requirements (expressed in dollars) of the Localized Facilities of the NU Companies for a Designated State or Area of a Localized Facility, as described in Attachment NU-I.

# ATTACHMENT NU-C AVAILABLE TRANSFER CAPABILITY METHODOLOGY

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- 6. Calculation of ATC for the NU Companies' Local Facilities
- 7. Posting of ATC Related Information
- 8. Process Flow Diagram for ATC Calculation

### 1. Introduction

ISO is the regional transmission organization ("RTO"), serving the New England Control Area. ISO is responsible for the development, oversight, and fair administration of New England's wholesale market, management of the bulk electric power system and wholesale markets' planning processes. The ISO serves as the Balancing Authority for the New England Control Area. The New England Control Area is interconnected to three neighboring Balancing Authority Areas ("BAA"): New Brunswick System Operator Area ("NBSO Area"), New York Independent System Operator Area ("NYISO Area"), and Hydro-Quebec TransEnergie Area ("HQTE Area").

As part of its RTO responsibilities, the ISO is registered with the North American Electric Reliability Corporation ("NERC") as several functional model entities that have responsibilities related to the calculation of ATC as defined in the following NERC Standards: MOD-001 – Available Transmission System Capability ("MOD-001"), MOD-004 – Capacity Benefit Margin ("MOD-004"), and MOD-008 – Transmission Reliability Margin Calculation Methodology ("MOD-008"). The extent of those responsibilities is based on various Commission approved transmission operating agreements and the provisions of the ISO New England Operating Documents.

While the ISO is the Transmission Service Provider for Regional Network Service ("Regional Transmission Service") associated with Pool Transmission Facilities, the Participating Transmission Owners ("PTOs") provide local transmission service over Non-Pool Transmission Facilities within the RTO footprint and are responsible for calculating TTC and ATC associated with Local Transmission Service provided under Schedule 21 pursuant to the Transmission Operating Agreement ("TOA"). Pursuant to CFR § 37.6(b)<sup>1</sup> of the FERC Regulations Transmission Provider's are obligated to calculate and post TTC and ATC for each Posted Path. The ISO is not responsible for the calculation of these values.

Pursuant to the terms of the Transmission Operating Agreement executed between the NU Companies as Participating Transmission Owners ("PTOs") and ISO, the NU Companies are Transmission Service Providers and calculate TTC and ATC for certain Local Facilities over which Point-to-Point transmission service is provided under Schedule 21-NU of the ISO Open Access Transmission Tariff ("ISO OATT").

<sup>1</sup> §37.6(b) Posting transfer capability. The available transfer capability on the Transmission Provider's system (ATC) and the total transfer capability (TTC) of that system shall be calculated and posted for each Posted Path as set out in this section.

Posted Path is defined as any control area to control area interconnection; any path for which service is denied, curtailed or interrupted for more than 24 hours in the past 12 months; and any path for which a customer requests to have ATC or TTC posted. For this last category, the posting must continue for 180 days and thereafter until 180 days have elapsed from the most recent request for service over the requested path. For purposes of this definition, an hour includes any part of any hour during which service was denied, curtailed or interrupted (§37.6(b)(1)(i)).

Non-PTF facilities are primarily radial paths that provide transmission service directly to interconnected generators. It is possible, in the future that a particular path may interconnect more nameplate capacity generation than the path's TTC. However, for the NU Companies' Non-PTF modeled by the ISO or the Local Control Center ("LCC"), the ISO or the LCC will only dispatch an amount of generation interconnected to such path so as not to incur a reliability or stability violation on the subject path consistent with ISO's economic, security constrained dispatch methodology.

The NU Companies do not currently have any Posted Paths based on the above definition. However, if the NU Companies do have any Posted Path(s) in the future, the NU Companies will calculate TTC using NERC Standard MOD-029-1 Rated System Path Methodology as outlined below.

#### 1.1 Scope of Document

The scope of this document is limited to those functions performed or utilized by the NU Companies as the Transmission Provider of Schedule 21-NU Local Point-to Point transmission service over Non-PTF pursuant to the PTOs' Transmission Operating Agreement and the ISO OATT:

- Total Transfer Capability (TTC) methodology
- Available Transfer Capability (ATC) methodology
- Existing Transmission Commitment (ETC)
- Use of Rollover Rights (ROR) in the calculation of ETC

As explained in Section 2, TTC and ATC are required to be calculated only for certain non-PTF internal Posted Paths over which Local Point-to-Point transmission service is provided under Schedule 21-NU. TTC and ATC is not calculated by the NU Companies for Local Network Service because ISO employs a market model for economic, security constrained dispatch of generation, and the NU Companies do not require advance reservation for such network service.

#### 2. Transmission Service in the New England Markets

Since the inception of the OATT for New England, the process by which generation located inside New England supplies energy to the bulk electric system has differed from the Commission's pro forma OATT. The fundamental difference is that internal generation is dispatched in an economic, security constrained manner by the ISO rather than utilizing a system of physical rights, advance reservations and point-to-point transmission service. Through this process, internal generation provides offers that are utilized by the ISO in the Real-Time Energy Market dispatch software. This process provides the least-cost dispatch to satisfy Real-Time load on the system.

In addition to offers from generation within New England, entities may submit External Transactions to move energy into the ISO Area, the New England Control Area, out of the New England Control Area, or through the New England Control Area. The Real-Time Energy Market clears these External Transactions based on forecast Locational Marginal Pricing (LMPs) and the transfer capability of the associated external interfaces. With those External Transactions in place, the Real-Time Energy Market dispatches internal generation in an economic, security constrained manner to meet Real-Time load within the region.

This process for submitting External Transactions into the New England Real-Time Energy Market does not require an advance physical reservation for use of the PTF. In the event that the net of the economic External Transactions is greater than the transfer capability of the associated external interface, the External Transactions selected to flow are selected based on the rules specified in the Tariff. For any External Transactions that are confirmed to flow in Real-Time based on the economics of the system, a transmission reservation for RNS and Through or Out Service is created after-the-fact to satisfy the transparency needs of the market.

The process described above is applicable to the PTF within the ISO Area, and non-PTF Local Facilities where utilized for Local Network Service by generation or load. However, the NU Companies own Local Facilities over which an advance transmission service reservation for firm or non-firm transmission service may be required. On those Local Facilities, the market participant may obtain a transmission service reservation from the NU Companies under Schedule 21-NU prior to delivery of energy into the New England Wholesale Market. This document addresses the calculation of ATC and TTC for these non-PTF internal paths.

#### 3. NU Companies Total Transfer Capability (TTC)

The Total Transfer Capability (TTC) is the amount of electric power that can be moved or transferred reliably from one area to another area of the interconnected transmission systems by way of all transmission lines (or paths) between those areas under specified system conditions. TTC for Schedule 21-NU is calculated using NERC Standard MOD-029-1 Rated System Path Methodology and posted on the NU Companies' OASIS site.

The NU Companies will calculate and post TTC on its OASIS site for all non-PTF Posted Paths that are eligible for Point-to-Point transmission service reservations. The TTC on the NU Companies' non-PTF Local Facilities that are eligible for Local Point-to-Point transmission service reservations are relatively static values. The NU Companies thus calculate the TTC for Non-PTF Posted Paths that may require Local Point-to-Point Local Point-to-Point transmission reservations on its OASIS provider page according to NAESB Standards.

#### 4. Capacity Benefit Market (CBM)

CBM is defined as the amount of firm transmission transfer capability set aside by a TSP for use by the Load Serving Entities. The ISO does not set aside any CBM for use by the Load Serving Entities, because of the New England approach to capacity planning requirements in the ISO New England Operating Documents. Load Serving Entities operating within the New England Control Area are required to arrange for their Capacity Requirements prior to the beginning of any given month in accordance with ISO Tariff, Section III.13.7.3.1 (Calculation of Capacity Requirement and Capacity Load Obligation). Load Serving Entities do not utilize CBM to ensure that their capacity needs are met; therefore, CBM is not applicable within the New England market design. Accordingly, for purposes of the NU Companies' ATC calculation and because CBM for the New England Control Area is set to zero (0), the NU Companies utilize a zero (0) CBM value.

## Existing Transmission Commitments, Firm (ETC<sub>F</sub>)

The ETC<sub>F</sub> are those confirmed Firm transmission reservations (PTP<sub>F</sub>) plus any rollover rights for Firm transmission reservations (ROR<sub>F</sub>) that have been exercised. There are no allowances necessary for Native Load forecast commitments (NL<sub>F</sub>), Network Integration Transmission Service (NITS<sub>F</sub>),

grandfathered Transmission Service (GF<sub>F</sub>) and other service(s), contract(s) or agreement(s) (OS<sub>F</sub>) to be considered in the ETC<sub>F</sub> calculation.

#### Existing Transmission Commitments, Non-Firm(ETC<sub>NF</sub>)

The  $(ETC_{NF})$  are those confirmed Non-Firm transmission reservations  $(PTP_{NF})$ . There are no allowances necessary for Non-Firm Network Integration Transmission Service (NITS<sub>NF</sub>), Non-Firm grandfathered Transmission Service (GF<sub>NF</sub>) or other service(s), contract(s) or agreement(s) (OS<sub>NF</sub>).

#### 5. Transmission Reliability Margin (TRM)

TRM is the amount of transmission transfer capability set aside to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as system conditions change. It is used only for external interfaces under the New England market design. The NU Companies do not have any external interfaces, and therefore TRM for the NU Companies' non-PTF facilities is zero.

#### 6. Calculation of ATC for the NU Companies' Local Facilities - General Description:

NERC Standards MOD-001-1 – Available Transmission System Capability and MOD-029-1 – Rated System Path Methodology define the required items to be identified when describing a transmission provider's ATC methodology. As a practical matter, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

Common practice is not to calculate or post firm and non-firm ATC values for the non-PTF assets described above, as ATC is positive and listed as 9999. Transmission customers are not restricted from reserving firm or non-firm transmission service on non-PTF facilities.

As Real-Time approaches, the ISO utilizes the Real-Time energy market rules to determine which of the submitted energy transactions will be scheduled in the coming hour. Basically, the ATC of the non-PTF assets in the New England market is almost always positive. With this simplified version of ATC, there is no detailed algorithm to be described or posted. Thus, for those non-PTF facilities that serve as a path for the NU Companies' Schedule 21-NU Point-to-Point Transmission Customers, the NU Companies have posted the ATC as 9999, consistent with industry practice. ATC on these paths varies depending on

the time of day. However, it is posted with an ATC of "9999" to reflect the fact that there are no restrictions on these paths for commercial transactions.

#### 6.1 Calculation of Schedule 21-NU Firm ATC (ATC<sub>F</sub>)

6.1.1 Calculation of ATC<sub>F</sub> in the Planning Horizon (PH)

For purposes of this Attachment C PH is any period before the Operating Horizon.

Consistent with the NERC definition,  $ATC_F$  is the capability for Firm transmission reservations that remain after allowing for TRM, CBM,  $ETC_F$ , Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM are zero. Firm Transmission Service under Schedule 21-NU that is available in the Planning Horizon (PH) includes: Yearly, Monthly, Weekly, and Daily. Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-NU transmission reservations are not considered in the ATC calculation. Therefore,  $ATC_F$  in the PH is equal to the TTC minus  $ETC_F$ 

6.1.2 Calculation of ATC<sub>F</sub> in the Schedule 21-NU Operating Horizon (OH)

For purposes of this Attachment C OH is noon eastern prevailing time each day. At that time, the OH spans from noon through midnight of the next day for a total of 36 hours. As time progresses, the total hours remaining in the OH decreases until noon the following day when the OH is once again reset to 36 hours.

Consistent with the NERC definition,  $ATC_F$  is the capability for Firm transmission reservations that remain after allowing for  $ETC_F$ , CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM is zero. Daily Firm Transmission Service under Schedule 21-NU is the only firm service offered in the Operating Horizon (OH). Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-NU transmission reservations are not considered in the ATC<sub>F</sub> calculation. Therefore, ATC<sub>F</sub> in the OH is equal to the TTC minus ETC<sub>F</sub>.

**6.1.3** Because Firm Schedule 21-NU transmission service is not offered in the Scheduling Horizon (SH):  $ATC_F$  in the SH is zero.

#### 6.2 Calculation of Schedule 21-NU Non-Firm ATC (ATC<sub>NF</sub>)

6.2.1 Calculation of ATC<sub>NF</sub> in the PH

 $ATC_{NF}$  is the capability for Non-Firm transmission reservations that remain after allowing for ETC<sub>F</sub>, ETC<sub>NF</sub>, scheduled CBM (CBM<sub>S</sub>), unreleased TRM (TRM<sub>U</sub>), Non-Firm Postbacks (Postbacks<sub>NF</sub>) and Non-Firm counterflows (counterflows<sub>NF</sub>).

As discussed above, the TRM and CBM for Schedule 21-NU are zero. Non-Firm ATC available in the PH includes: Monthly, Weekly, Daily and Hourly. TRM  $_{\rm U}$ , Postbacks<sub>NF</sub> and counterflows<sub>NF</sub> of Schedule 21-NU transmission reservations are not considered in this calculation. Therefore, ATC<sub>NF</sub> in the PH is equal to the TTC minus ETC  $_{\rm F}$  and ETC<sub>NF</sub>.

 $6.2.2 \quad \text{Calculation of ATC}_{\text{NF}} \text{ in the OH}$ 

 $\mbox{ATC}_{\mbox{NF}}$  available in the OH includes: Daily and Hourly.

As discussed above TRM and CBM for Schedule 21-NU are zero.  $TRM_U$ , counterflows and  $ETC_{NF}$  are not considered in this calculation. Therefore,  $ATC_{NF}$  in the OH is equal to the TTC minus  $ETC_{F}$ , plus postbacks of PTP<sub>F</sub> in OH as PTP<sub>NF</sub> (Postbacks NF)

#### 6.3 Negative ATC

As stated above, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

As stated above, the NU Companies' non-PTF facilities are primarily radial paths that provide transmission service to directly interconnected generators. It is possible, in the future, that a particular radial path may interconnect more nameplate capacity generation than the path's TTC. However, due to the ISO's security constrained dispatch methodology, the ISO will only dispatch an amount of generation interconnected to such path so as not to incur a reliability or stability violation on the subject path. Therefore, ATC in the PH, OH and SH may become zero, but will not become negative.

## 7. Posting of Schedule 21-NU ATC

## 7.1 Location of ATC Posting

ATC values are posted on the NU Companies' OASIS site.

### 7.2 Updates To ATC

When any of the variables in the ATC equations change, the ATC values are recalculated and immediately posted.

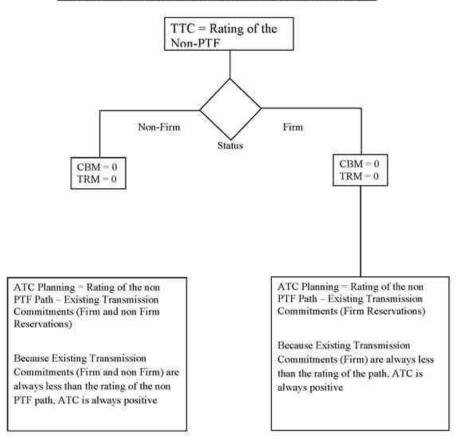
#### 7.3 Coordination of ATC Calculations

Schedule 21-NU non-PTF has no external interfaces. Therefore it is not necessary to coordinate the values.

**7.4 Mathematical Algorithms** A link to the actual mathematical algorithm for the calculation of ATC for the NU Companies non-PTF internal interfaces is located at <u>http://www.transmission-nu.com/business/pdfs/Attachment%206.pdf</u>.

## 8. Process Flow Diagram for ATC

Calculation



## Non-PTF Transmission Path ATC Process Flow Diagram

## ATTACHMENT NU-D PENALTY DISBURSEMENT METHODOLOGY

Late Study Penalties: Penalties paid by the Transmission Provider pursuant to Schedule 21 are referred to as "Late Study Penalties," and therefore subject to distribution to all Transmission Customers that are not affiliated with the Transmission Provider. On the month following the end of each calendar quarter, each Transmission Customer that is not affiliated with the Transmission Provider shall receive, on the relevant monthly invoice, a credit for its share of the Late Study Penalties that were assessed during the applicable calendar quarter. The Transmission Customer's share of the Late Study Penalties (if any) will be determined as follows:

(a) For each quarter, the Transmission Provider will determine: (1) the sum of all Late Study Penalties assessed during the quarter measured in dollars (LSRq), and (2) the sum of all transmission revenue from Transmission Customers that are not affiliated with the Transmission Provider during that quarter, measured in dollars (LSTRq). Where:

- LSRq = Late Study Penalty Revenue in the quarter
- LSTRq = Transmission Revenue from Transmission Customers not affiliated with the Transmission Provider in the quarter

(b) For each quarter, each Transmission Customer that was not affiliated with the Transmission Provider will receive a credit equal to the product of (i) LSRq multiplied by (ii) a fraction derived from dividing the amount of transmission revenue from that Transmission Customer (TC1) during that quarter (measured in dollars), where TC1 is equal to one Transmission Customer, and a denominator equal to LSTRq.

(c) The Transmission Provider shall apply the credit for Late Study Penalties to service that the nonaffiliated Transmission Customer takes from the Transmission Provider pursuant to this Schedule 21-NU. Any remaining credit will be refunded to the Transmission Customer.

## ATTACHMENT NU-E LOCALIZED COSTS RESPONSIBILITY AGREEMENT

This Localized Costs Responsibility Agreement ("LCRA" or "Agreement"), dated as of \_\_\_\_\_\_\_, is entered into by and between the Northeast Utilities Service Company ("NUSCO" or "COMPANY"), acting as agent for [The Connecticut Light and Power Company, Western Massachusetts Electric Company, Public Service Company of New Hampshire], and the "Transmission Customer".

The Transmission Customer is \_\_\_\_\_\_. The Transmission Customer has been determined to be an Eligible Customer taking Regional Network Service under the Tariff whose load **is located in the** Designated State or Area for a **Localized** Facility listed in **Section** 16.3 **of** Schedule 21-NU of the Tariff.

The Transmission Customer agrees to pay its portion of the cost of Localized Facilities in the Designated State or Area in which the Transmission Customer's load is located as provided in the Tariff and in accordance with Commission orders. Billing under this Agreement shall commence on the later of: (1) 0001 hours on \_\_\_\_\_\_, or (2) such other date as permitted by the Commission.

Charges under this Agreement shall terminate on the earlier of: (1) the date on which the costs of the Localized Facilities in the Designated State or Area in which the Transmission Customer's load is located are fully depreciated; or (2) the date upon which the Transmission Customer no longer takes Regional Network Service under the Tariff in the Designated State or Area in which the Transmission Customer's load is located; provided, that the Transmission Customer shall remain responsible for all final payment obligations. In the event that the Transmission Customer sells or assigns, or transfers its load to another entity ("New Transmission Customer"), the Transmission Customer must provide NUSCO with at least ninety (90) calendar days advance written notice of the sale, assignment, or transfer.

The Transmission Customer shall remain liable for the performance of all obligations under this Agreement until a new LCRA has been executed between the New Transmission Customer and NUSCO, or in the case of an unexecuted LCRA, such other date as it has been **permitted to** be made effective by the Commission. No sale or assignment shall **become effective** until the Parties have complied with all Applicable Laws and Regulations required for such sale, assignment, or transfer. Other special provisions (if any)

Any notice or request made to or by any Party regarding this greement shall be made in writing and shall be telecommunicated or delivered either in person, or by prepaid mail (return receipt requested) to the representative of the other Party as indicated below. Such representative and address for notices or requests may be changed from time to time by notice by one Party to the other.

COMPANY:

TRANSMISSION CUSTOMER:

Any exhibits to thisAgreement and the Tariff are incorporated herein and made a part hereof. ThisAgreement may be amended, from time to time, as provided for in Schedule 21-NU of the Tariff.

IN WITNESS WHEREOF, the Parties have caused thisAgreement to be executed by their respective authorized officials as of the date first above written.

NORTHEAST UTILITIES SERVICE COMPANY

By: \_\_\_\_\_\_ Its \_\_\_\_\_

TRANSMISSION CUSTOMER

By:			
Its			

## ATTACHMENT NU-G NETWORK OPERATING AGREEMENT

This Network Operating Agreement is an appendix to Schedule 21-NU (this Local Service Schedule) of the OATT and operates as an implementing agreement for Local Network Service under this Local Service Schedule. This Network Operating Agreement is subject to and in accordance with Part III of this Local Service Schedule. All definitions and other terms and conditions of this Local Service Schedule are incorporated herein by reference.

#### 1.0 Definitions:

#### 1.1 Data Acquisition Equipment

Supervisory control and data acquisition ("SCADA"), remote terminal units ("RTUs") to obtain information from a Party's facilities, telephone equipment, leased telephone circuits, fiber optic circuits, and other communications equipment necessary to transmit data to remote locations, and any other equipment or service necessary to provide for the telemetry and control requirements of this Local Service Schedule.

#### 1.2 Data Link

The direct communications link between the Transmission Customer's energy control center and the NU Companies' designated location(s) that will enable the NU Companies to receive real time telemetry and data from the Transmission Customer.

#### 1.3 Metering Equipment

High accuracy, solid state kW, kVAR, kWh meters, metering cabinets, metering panels, conduits, cabling, high accuracy current transformers and high accuracy potential transformers, which directly or indirectly provide input to meters or transducers, metering recording devices, telephone circuits, signal or pulse dividers, transducers, pulse accumulators, metering sockets, test switch devices, enclosures, conduits, and any other metering, telemetering or communication equipment necessary to implement the provisions of this Local Service Schedule.

#### 1.4 Protective Equipment

Protective relays, relaying panels, relaying cabinets, circuit breakers, conduits, cabling, current transformers, potential transformers, coupling capacitor voltage transformers, wave traps, transfer trip and

fault recorders, which directly or indirectly provide input to relays, fiber optic communication equipment, power line carrier equipment and telephone circuits, and any other protective equipment necessary to implement the protection provision of this Local Service Schedule.

#### 2.0 Term

The term shall be as provided in the Service Agreement consistent with this Local Service Schedule (including, but not limited to, application procedures, commencement of service, and effect of termination).

#### 3.0 Point(s) Of Interconnection

Local Network Service will be provided by the NU Companies at the point(s) of interconnection specified in Appendix \_\_\_\_, as amended from time to time. Each point of interconnection in this listing shall have a unique identifier, meter location, meter number, metered voltage, terms on meter compensation and designation of current or future year of in service.

#### 4.0 Cogeneration And Small Power Production Facilities

If a Qualifying Facility is located or locates in the future on the System of the Transmission Customer, and the owner or operator of such Qualifying Facility sells the output of such Qualifying Facility to an entity other than the Transmission Customer, the delivery of such Qualifying Facility's power shall be subject to and contingent upon transmission arrangements being established with the NU Companies prior to commencement of delivery of any such power and energy.

#### 5.0 Character Of Service

Network Transmission Service at the points of interconnection shall be in the form of single phase or balanced three-phase alternating current at a frequency of sixty (60) hertz. The Transmission Customer shall operate and maintain its electric system in a manner that avoids: (i) the generation of harmonic frequencies exceeding the limits established by the latest revision of IEEE-519; (ii) voltage flicker exceeding the limits established by the latest revision of IEEE-141; (iii) negative sequence currents; (iv) voltage or current fluctuations; (v) frequency variations; or (vi) voltage or power factor levels that could adversely affect the NU Companies' electrical equipment or facilities or those of its customers, and in a manner that complies with all applicable NERC, NPCC, ISO and the NU Companies', operating criteria, rules, regulations, procedures, guidelines and interconnection standards as amended from time to time.

#### 6.0 Continuity Of Service

(a) The NU Companies and the Transmission Customer shall operate and maintain their respective network systems, in accordance with Good Utility Practice, and in a manner that will allow the NU Companies to safely and reliably operate the NU Transmission System in accordance with this Local Service Schedule, so that either Party shall not unduly burden the other Party; provided, however, that notwithstanding any other provision of this Local Service Schedule, the NU Companies shall retain the sole responsibility and authority for all operating decisions that could affect the integrity, reliability and security of the NU Transmission System.

(b) The NU Companies shall exercise reasonable care and Due Diligence to ensure Local Network Service hereunder in accordance with Good Utility Practice; provided, however, that the NU Companies shall not be responsible for any failure to ensure electric power service, nor for interruption, reversal or abnormal voltage of the service, if such failure, interruption, reversal or abnormal voltage is due to a Force Majeure.

#### 7.0 Power Factor

(a) Where Local Network Service provided under this Local Service Schedule is for delivery of power to a load center of the Transmission Customer served from the NU Companies' Transmission System, the Transmission Customer shall maintain load power factor levels, during both on- and off- peak hours, appropriate to meet the operating requirements of the NU Companies, and shall follow the ISO standards and practices, as set forth in the Service Agreement.

(b) Where Local Network Service provided under this Local Service Schedule is for delivery of power from a generating facility connected to the NU Companies' Transmission System, the Transmission Customer shall deliver power at a lagging or leading power factor as set forth in the Service Agreement.

(c) Where Local Network Service provided under this Local Service Schedule is for delivery of power from outside the NU Companies' Transmission System, the obligation to maintain proper sending and receiving end voltages rests with the Transmission Customer, as set forth in the Service Agreement.

(d) In the event that the power factor levels and reactive supply requirements set forth in the Service Agreement are not maintained by the Transmission Customer, the NU Companies shall thereupon have the right to take the appropriate corrective action and to charge the Transmission Customer for the costs thereof. The NU Companies shall have the right, at any time, unilaterally to make a Section 205 filing with the Commission for the recovery of any such costs.

#### 8.0 Metering

(a) The Transmission Customer shall, at its expense, purchase all necessary metering equipment to accurately account for the electric power being transmitted under this Local Service Schedule. The NU Companies may require the installation of telemetering equipment for the purposes of billing, power factor measurements and to allow the NU Companies to maximize economic and reliable operation of their transmission system. Such metering equipment shall meet the specifications and accepted metering practices of the NU Companies and applicable criteria, rules, standards and operating procedures, or such successor rules and standards. At the NU Companies' option, communication metering equipment may be installed in order to transmit meter readings to the NU Companies' designated locations.

(b) Electric power being transmitted under this Local Service Schedule will be measured by meters at all points of interconnection and/or on generating facilities (Network and non-Network Resources) located on and outside the Transmission Customer's system as required by the NU Companies.

(c) The Transmission Customer shall purchase meters capable of time-differentiated (by hour) measurement of the instantaneous flow in kW and net active power flow in kWh and of reactive power flow. All meters shall compensate for applicable line and/or transformer losses in accordance with Good Utility Practice when measurement is made at any location other than the point of interconnection.

(d) The NU Companies reserve the right: (i) to determine metering equipment ownership; (ii) to determine the equipment installation at each point of interconnection; (iii) to require the Transmission Customer to install the equipment -- or -- install the equipment with the Transmission Customer supplying without cost to the NU Companies a suitable place for the installation of such equipment; (iv) to determine other equipment allowed in the metering circuit; (v) to determine metering accuracy requirements; (vi) to determine the responsibilities for operation, maintenance, testing and repair of metering equipment.

(e) The NU Companies shall have access to metering data, including telephone line access, which may reasonably be required to facilitate measurement and billing under this Local Service Schedule. The NU Companies may require the Transmission Customer provide, at its expense, a separate dedicated voice grade telephone circuit for the NU Companies and the Transmission Customer to remotely access each meter. Metering equipment and data shall be accessible at all reasonable hours for purposes of inspection and reading.

(f) All metering equipment shall be tested in accordance with practices of the NU Companies, applicable criteria, rules, standards and operating procedures or upon the request by the NU Companies. If at any time metering equipment fails to register or is determined to be inaccurate, in accordance with the NU Companies' practices and applicable criteria, rules, standards and operating procedures, the Transmission Customer shall make the equipment accurate as soon thereafter as practicable, and the meter readings and rate computation for the period of such inaccuracy, insofar as can reasonably be ascertained, shall be adjusted; provided, however, that no adjustment to charges shall be required for any period exceeding two (2) months prior to the date of the test. Representatives of the NU Companies will be afforded opportunity to witness such tests.

#### 9.0 Network Load

The Transmission Customer shall provide the NU Companies with the actual hourly Network Load for each calendar month by the seventh day of the following calendar month.

#### 10.0 Data Transfer:

(a) The Transmission Customer shall provide timely, accurate real time information to the NU
 Companies in order to facilitate performance of its obligations under this Local Service Schedule.

(b) The selection of real time telemetry and data to be received by the NU Companies and the Transmission Customer shall be necessary for safety, reliability, security, economics, and/or monitoring of real-time conditions that affect the NU Transmission System. This telemetry shall include, but is not limited to, loads, line flows (MW and MVAR), voltages, generator output, and status of substation equipment at any of the Transmission Customer's transmission and generation facilities. To the extent that the NU Companies or the Transmission Customer requires data that are not available from existing equipment, the Transmission Customer shall, at its expense and at locations designated by the NU Companies or the Transmission Customer, install any metering equipment, data acquisition equipment, or

other equipment and software necessary for the telemetry to be received by the NU Companies or the Transmission Customer. The NU Companies shall have the right to inspect equipment and software associated with the data transfer in order to assure conformance with Good Utility Practices.

#### 11.0 Maintenance of Equipment

The Transmission Customer shall, on a regular basis in accordance with practices of the NU Companies, applicable criteria, rules, standards and operating procedures or at the request of the NU Companies, and at its expense, test, calibrate, verify and validate the data link, metering equipment, data acquisition equipment, transmission equipment, protective equipment and other equipment or software used to implement the provisions of this Local Service Schedule. The NU Companies shall have the right to inspect such tests, calibrations, verifications and validations of the data link, metering equipment, data acquisition equipment, transmission equipment, protective equipment and other equipment or software used to implement the provisions of this Local Service Schedule. Upon The NU Companies' request, the Transmission Customer will provide the NU System Companies a copy of the installation, test and calibration records of the data link, metering equipment, data acquisition equipment, protective equipment or software. The NU Companies shall, at the Transmission Customer's expense, have the right to monitor the factory acceptance test, the field acceptance test, and the installation of any metering equipment, data acquisition equipment, transmission equipment and other equipment or software used to implement the provisions of the software equipment or software used to implement.

### 12.0 Notification

(a) The Transmission Customer shall notify and coordinate with the NU Companies prior to the commencement of any work or maintenance by the Transmission Customer, Network Member, or contractors or agents performing on behalf of either or both, which may directly or indirectly have an adverse effect on the Transmission Customer or The NU Companies' data link, or the reliability of the NU Transmission System. All notifications for scheduled outages of the data link, metering equipment, data acquisition equipment, transmission equipment, protective equipment and other equipment or software must meet the requirements of the ISO and the NU Companies.

#### 13.0 Emergency System Operations

(a) The Transmission Customer, at its expense, shall be subject to all applicable emergency operation standards promulgated by NERC, NPCC, ISO and the NU Companies which may include but not limited to underfrequency relaying equipment, load shedding equipment and voltage reduction equipment.

(b) The NU Companies reserve the right to take whatever actions they deem necessary to preserve the integrity of the NU Companies' Transmission System during emergency operating conditions. If the Local Network Service at the points of interconnection is causing harmful physical effects to the NU Transmission System facilities or to its customers (e.g., harmonics, undervoltage, overvoltage, flicker, voltage variations, etc.), the NU Companies shall promptly notify the Transmission Customer and if the Transmission Customer does not take the appropriate corrective actions immediately, the NU Companies shall have the right to interrupt Local Network Service under this Local Service Schedule in order to alleviate the situation and to suspend all or any portion of Local Network Service under this Local Service Schedule until appropriate corrective action is taken.

(c) In the event of any adverse condition or disturbance on the NU Transmission System or on any other system directly or indirectly interconnected with the NU Transmission System, the NU Companies may, as they deem necessary, take actions or inactions that, in the NU Companies' sole judgment, result in the automatic or manual interruption of Local Network Service in order to: (i) limit the extent or damage of the adverse condition or disturbance; (ii) prevent damage to generating or transmission facilities; (iii) expedite restoration of service; or (iv) preserve public safety.

### 14.0 Cost Responsibility

- (a) The Transmission Customer shall be responsible for the costs incurred by the Transmission Customer and the NU Companies to implement the provisions of this Local Service Schedule including, but not limited to, engineering, administrative and general expenses, material and labor expenses associated with the specifications, design, review, approval, purchase, installation, maintenance, modification, repair, operation, replacement, checkouts, testing, upgrading, calibration, removal, and relocation of equipment, or software.
- (b) Additionally, the Transmission Customer shall be responsible for all costs incurred by the Transmission Customer and the NU Companies for on-going operation and maintenance of the metering, telecommunications and safety protection facilities and equipment required to implement the provisions of this Local Service Schedule. Such work shall include, but not

limited to, normal and extraordinary engineering, administrative and general expenses, material, and labor expenses associated with the specifications, design, review, approval, purchase, installation, maintenance, modification, repair, operation, replacement, checkouts, testing, upgrading, calibration, removal, or relocation of equipment required to accommodate service under this Local Service Schedule.

### 15.0 Default

The Transmission Customer's failure to implement the terms and conditions of this Network Operating Agreement will be deemed to be a default under this Local Service Schedule and will result in the NU Companies seeking, consistent with FERC rules and regulations, immediate termination of service under this Local Service Schedule.

#### 16.0 Regulatory Filings

Nothing contained in this Local Service Schedule or any associated Service Agreement, including this Network Operating Agreement, shall be construed as affecting in any way the right of the NU Companies to unilaterally make application to the Commission for a change in any portion of this Network Operating Agreement under Section 205 of the Federal Power Act and pursuant to the Commission's rules and regulations promulgated thereunder.

IN WITNESS WHEREOF, the Parties have caused this Network Operating Agreement to be executed by their respective authorized officials as of the date written.

Date: \_\_\_\_\_

Northeast Utilities	Service Company
by:	
its Vice President	

Tran	smis	sion	Customer

by:			 
its _			

## ATTACHMENT NU-H ANNUAL TRANSMISSION REVENUE REQUIREMENTS

#### Attachment NU-H Methodology:

This formula sets forth the method that the NU Companies' will use to determine their annual Total Transmission Revenue Requirements. The Transmission Revenue Requirements reflect the NU Companies' total cost to own, operate and maintain the transmission facilities used for providing Open Access Transmission Service to transmission customers under this Local Service Schedule. The Transmission Revenue Requirements will be an annual formula rate calculation, effective for an initial term commencing on the effective date established by FERC and ending on May 31 of the following year. The calculation will be based on the previous calendar year's FERC Form 1 data, with an estimate of the NU Companies' current year average plant additions, Construction Work in Progress (CWIP), and the Allowance for Funds Used During Construction (AFUDC) regulatory liability account. Plant additions will be multiplied by a fixed charge carrying cost, and CWIP and the AFUDC regulatory liability account will be multiplied by the Cost of Capital. The revenue requirements will be updated thereafter each June 1 based on actual costs from the Service Year. The true-up information will be based on actual data, in lieu of allocated data if specifically identified in the FERC Form 1. For a capital addition whose cost exceeds \$20 million, the NU Companies will make rate base adjustments to estimates and in the true-up process to represent the estimated and actual in-service dates for the capital addition. Specifically, the NU Companies will adjust for transmission plant, CWIP, AFUDC regulatory liability, accumulated depreciation and accumulated deferred taxes.

#### I. Definitions

Capitalized terms not otherwise defined in the Tariff and as used in this formula have the following definitions:

#### A. Allocation Factors

1. <u>Transmission Wages and Salaries Allocation Factor</u> shall equal the ratio of the NU Companies' Transmission-related direct wages and salaries, including those of affiliated companies, to the NU Companies' total direct wages and salaries, including those of affiliated companies, excluding administrative and general wages and salaries. 2. <u>Plant Allocation Factor</u> shall equal the ratio of the sum of total investment in Transmission Plant and Transmission Related General Plant to Total Plant in Service.

B. Terms

<u>Administrative and General Expense</u> shall equal The NU Companies' expenses as recorded in FERC Account Nos. 920-935, excluding FERC Account Nos. 924, 928 and 930.1.

<u>AFUDC Regulatory Liability</u> shall equal the unamortized balance of the capitalized AFUDC booked on the NU Companies' transmission projects as recorded in FERC Account 254 consistent with Commission orders.

<u>Amortization of Loss on Reacquired Debt</u> shall equal the NU Companies' expenses as recorded in FERC Account No. 428.1.

<u>Amortization of Investment Tax Credits</u> shall equal the NU Companies' credits as recorded in FERC Account No. 411.4.

Depreciation Expense for Transmission Plant shall equal The NU Companies' transmission expense as recorded in FERC Account No. 403.

Dispatch Center means CL&P's CONVEX dispatch center.

<u>Dispatch Center Plant</u> shall equal CL&P's gross plant balance for the Dispatch Center as recorded in FERC Account Nos. 350-359 and 389-399.

<u>Dispatch Center Depreciation Expense</u> shall equal the Dispatch Center depreciation expense as recorded in FERC Account No. 403.

Dispatch Center Amortization of Investment Tax Credits shall equal the Dispatch Center amortization of investment tax credits as recorded in FERC Account No. 411.4.

Dispatch Center Accumulated Deferred Income Taxes shall equal the net of the NU Companies' Dispatch Center deferred tax balance as recorded in FERC Account Nos. 281-283 and the NU Companies' Dispatch Center deferred tax balance as recorded in FERC Account No. 190.

<u>Dispatch Center Municipal Tax Expense</u> shall equal the Dispatch Center municipal tax expense as recorded in FERC Account Nos. 408.1 and 409.1.

<u>General Plant</u> shall equal the NU Companies' gross plant balance as recorded in FERC Account Nos. 389-399, less the Dispatch Center general plant.

<u>General Plant Depreciation Expense</u> shall equal the NU Companies' general plant expenses as recorded in FERC Account No. 403.

<u>General Plant Depreciation Reserve</u> shall equal the NU Companies' general plant reserve balance as recorded in FERC Account No. 108 less the portion of such reserve for the Dispatch Center.

<u>Other Regulatory Assets/Liabilities</u> – FAS 106 shall equal the net of the NU Companies' FAS 106 balance as recorded in FERC Account No. 182.3 and any FAS 106 balance as recorded in the NU Companies' FERC Account No. 254.

<u>Other Regulatory Assets/Liabilities</u> – FAS 109 shall equal the net of the NU Companies' FAS 109 balance in FERC Account No. 182.3 and any FAS 109 balance as recorded in the NU Companies' FERC Account No. 254.

<u>Payroll Taxes</u> shall equal those payroll expenses as recorded in the NU Companies' FERC Account Nos. 408.1 and 409.1.

Plant Held for Future Use shall equal the NU Companies' balance in FERC Account No. 105.

Prepayments shall equal the NU Companies' prepayment balance as recorded in FERC Account No. 165.

Property Insurance shall equal the NU Companies' expenses as recorded in FERC Account No. 924.

<u>Total Accumulated Deferred Income Taxes</u> shall equal the net of the NU Companies' deferred tax balance as recorded in FERC Account Nos. 281-283 and the NU Companies' deferred tax balance as recorded in FERC Account No. 190.

<u>Total Loss on Reacquired Debt</u> shall equal the NU Companies' expenses as recorded in FERC Account 189.

<u>Total Municipal Tax Expense</u> shall equal the NU Companies' expenses as recorded in FERC Account Nos. 408.1, 409.1.

<u>Total Plant in Service</u> shall equal the NU Companies' total gross plant balance as recorded in FERC Account Nos. 301-399.

<u>Total Transmission Depreciation Reserve</u> shall equal the NU Companies' Transmission reserve balance as recorded in FERC Account 108 less the portion of such reserve for the Dispatch Center.

<u>Transmission Operation and Maintenance Expense</u> shall equal the NU Companies' expenses as recorded in FERC Account Nos. 560, 561.5 – 561.8, 562-564 and 566-576.5 and shall exclude all HQ HVDC expenses booked to accounts 560 through 576.5 and expenses already included in Transmission Support Expense, as described in Section I below, that are included in FERC Account Nos. 560-576.5.

<u>Transmission Plant</u> shall equal the NU Companies' gross plant balance as recorded in FERC Account Nos. 350-359, less Dispatch Center transmission plant.

<u>Transmission Plant Materials and Supplies</u> shall equal the NU Companies' balance as assigned to transmission, as recorded in FERC Account 154.

<u>Transmission Related Construction Work in Progress</u> shall equal the NU Companies' investment in Transmission-related projects as recorded in FERC Account 107 consistent with commission orders.

II. Calculation of Transmission Revenue Requirements

The Transmission Revenue Requirement shall equal the sum of the NU Companies' (A) Return and Associated Income Taxes, (B) Transmission Depreciation Expense, (C) Transmission Related Amortization of Loss on Reacquired Debt, (D) Transmission Related Amortization of Investment Tax Credits, (E) Transmission Related Municipal Tax Expense, (F) Transmission Related Payroll Tax Expense, (G) Transmission Operation and Maintenance Expense, (H) Transmission Related Administrative and General Expense (I) Transmission Support Expense, and(J) Transmission Related Taxes and Fees Charge.

A. <u>Return and Associated Income Taxes</u> shall equal the product of the Transmission Investment Base and the Cost of Capital Rate.

#### 1. Transmission Investment Base

The Transmission Investment Base will be the average balances of (a) Transmission Plant, plus (b) Transmission Related General Plant, plus (c) Transmission Plant Held for Future Use, plus (d) Transmission Related Construction Work in Progress, less (e) Transmission Related Depreciation Reserve, less (f) Transmission Related Accumulated Deferred Taxes, plus (g) Transmission Related Loss on Reacquired Debt, plus (h) Other Regulatory Assets/Liabilities, less (i) AFUDC Regulatory Liability, plus (j) Transmission Prepayments, plus (k) Transmission Materials and Supplies, plus (l) Transmission Related Cash Working Capital.

- (a) <u>Transmission Plant</u> will equal the balance of the NU Companies' investment in Transmission Plant.
- (b) <u>Transmission Related General Plant</u> shall equal the NU Companies' balance of investment in General Plant multiplied by the Transmission Wages and Salaries Allocation Factor.
- (c) <u>Transmission Plant Held for Future Use</u> shall equal the balance of Transmission Plant Held for Future Use.
- (d) <u>Transmission Related Construction Work in Progress</u> shall equal the portion of the NU Companies' investment in Transmission-related projects as recorded in FERC Account 107 consistent with Commission orders.
- (e) <u>Transmission Related Depreciation Reserve</u> shall equal the balance of Total Transmission Depreciation Reserve, plus the balance of Transmission Related General Plant Depreciation Reserve. Transmission Related General Plant Depreciation Reserve shall

equal the product of General Plant Depreciation Reserve and the Transmission Wages and Salaries Allocation Factor.

- (f) <u>Transmission Accumulated Deferred Taxes</u> shall equal the NU Companies' electric balance of Total Accumulated Deferred Income Taxes multiplied by the Plant Allocation Factor, less the transmission and general plant components of Dispatch Center Accumulated Deferred Income Taxes.
- (g) <u>Transmission Related Loss on Reacquired Debt</u> shall equal the NU Companies' electric balance of Total Loss on Reacquired Debt multiplied by the Plant Allocation Factor.
- (h) <u>Other Regulatory Assets/Liabilities</u> shall equal the NU Companies' electric balance of any deferred rate recovery of FAS 106 expense multiplied by the Transmission Wages and Salaries Allocation Factor, plus the NU Companies' electric balance of FAS 109 multiplied by the Plant Allocation Factor.
- AFUDC Regulatory Liability shall equal the unamortized balance of the capitalized AFUDC booked on the NU Companies' transmission projects as recorded in FERC Account 254 consistent with Commission orders.
- (j) <u>Transmission Prepayments</u> shall equal the NU Companies' electric balance of Prepayments multiplied by the Transmission Wages and Salaries Allocation Factor.
- (k) <u>Transmission</u> Materials and Supplies shall equal the NU Companies' electric balance of Transmission Plant Materials and Supplies.
- <u>Transmission Related Cash Working Capital shall be a 12.5% allowance (45 days/360 days) of Transmission Operation and Maintenance Expense and Transmission Related Administrative and General Expense.</u>

2. Cost of Capital Rate

The Cost of Capital Rate will equal (a) the NU Companies' Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.

- (a) <u>The Weighted Cost of Capital</u> will be calculated based upon the capital structure at the end of each year and will equal the sum of:
- (i) <u>the long term debt component</u>, which equals the product of the actual weighted average embedded cost to maturity of the NU Companies' long-term debt then outstanding and the ratio that long-term debt is to the NU Companies' total capital.
- (ii) <u>the preferred stock component</u>, which equals the product of the actual weighted average embedded cost to maturity of the NU Companies' preferred stock then outstanding and the ratio that preferred stock is to the NU Companies' total capital.
- (iii) <u>the return on equity component</u>, shall equal the product of Northeast Utilities' return on equity ("ROE") of 10.57% and the ratio that common equity is to Northeast Utilities' total capital.
- (b) Federal Income Tax shall equal

#### [(A+[(C+B)/D]x (FT)] divided by (1-FT)

where FT is the Federal Income Tax Rate and A is the sum of the preferred stock component and the return on equity component, as determined in Sections II.A.2.(a)(ii) and (iii) above, B is Transmission Related Amortization of Investment Tax Credits, as determined in Section II.D., below, C is the Equity AFUDC component of Transmission Depreciation Expense, as defined in Section II.B., and D is Transmission Investment Base, as Determined in II.A.1., above.

(c) State Income Tax shall equal

[A+[(C+B)/D] + Federal Income Tax)x(ST)] divided by (1-ST)

where ST is the State Income Tax Rate, A is the sum of the preferred stock component and return on equity component determined in Sections II.A.2.(a)(ii) and (iii) above, B is the Amortization of Investment Tax Credits as determined in Section II.D. below, C is the equity AFUDC component of Transmission Depreciation Expense, as defined in Section II.B., D is the Transmission Investment Base, as determined in II.A.1., above and Federal Income Tax is the rate determined in Section II.A.2.(b) above.

B. <u>Transmission Depreciation Expense</u> shall equal the sum of Depreciation Expense for Transmission Plant, plus an allocation of General Plant Deprecation Expense calculated by multiplying General Plant Depreciation Expense by the Transmission Wages and Salaries Allocation Factor, less the amortization of AFUDC Regulatory Credit as recorded in Account 407.4, less the transmission plant and general plant components of Dispatch Center Depreciation Expense.

C. <u>Transmission Related Amortization of Loss on Reacquired Debt</u> shall equal the NU Companies' electric Amortization of Loss on Reacquired Debt multiplied by the Plant Allocation Factor.

D. <u>Transmission Related Amortization of Investment Tax Credits</u> shall equal the NU Companies' electric Amortization of Investment Tax Credits multiplied by the Plant Allocation Factor less the transmission plant and general plant components of Dispatch Center Amortization of Investment Tax Credits.

E. <u>Transmission Related Municipal Tax Expense</u> shall equal the NU Companies' electric Total Municipal Tax Expense multiplied by the Plant Allocation Factor, less the transmission plant and general plant components of Dispatch Center Municipal Tax Expense.

F. <u>Transmission Related Payroll Tax Expense</u> shall equal the NU Companies' electric Payroll Tax expense, multiplied by the Transmission Wages and Salaries Allocation Factor.

G. <u>Transmission Operation and Maintenance Expense</u> shall equal Transmission Operation and Maintenance Expenses.

H. <u>Transmission Related Administrative and General Expenses</u> shall equal the sum of (1) the NU Companies' Administrative and General Expenses multiplied by the Transmission Wages and Salaries Allocation Factor, (2) Property Insurance multiplied by the Transmission Plant Allocation Factor, (3) Expenses included in Account 928 related to FERC Assessments multiplied by the Plant Allocation Factor, plus any other Federal and State transmission related expenses or assessments in Account 928 plus specific transmission related expenses included in Account 930.1 and, (4) specific transmission related public education expenses included in Account 426.54.

I. <u>Transmission Support Expense</u> shall equal the expense paid by the NU Companies' for transmission support.

J. <u>Transmission Related Taxes and Fees Charge</u> shall include any fee or assessment imposed by any governmental authority on service provided under this Local Service Schedule that is not specifically identified under any other section of this Local Service Schedule.

## ATTACHMENT NU-I ANNUAL LOCALIZED TRANSMISSION REVENUE REQUIREMENT

#### Attachment NU-I Methodology

This formula sets forth the method that the NU Companies will use to determine their annual total revenue requirements for each Localized Facility ("Localized Transmission Revenue Requirement"). Subsequent references in this formula to "Localized Facility" and "Localized Transmission Revenue Requirement" refer to the Localized Facility and Localized Facility Revenue Requirement for each individual Localized Transmission Project. Each Localized Facility is identified in Section 16.3.

The Localized Transmission Revenue Requirement will be calculated for an initial term for a Localized Facility commencing on the date of the New England System Operator's Schedule 12C cost allocation determination for the Localized Facility and ending on the May 31<sup>st</sup> following the date approved by the Commission for including the costs of the Localized Facilities in this Attachment NU-I ("Initial Term"), and continuing thereafter for successive 12 month periods commencing each June 1st ("Rate Year"). The Localized Transmission Revenue Requirement for the Initial Term for a Localized Facility will be calculated based on the estimated cost of the Localized Facilities for such period, and will be charged to customers in equal monthly installments beginning on the date permitted by the Commission, and continuing through the end of the Initial Term. The Localized Transmission Revenue Requirement for the appropriate calendar year by June 30th of the succeeding year(s) based on actual costs for the Initial Term.

The Localized Transmission Revenue Requirement for a Localized Transmission Project for a Rate Year commencing after the Initial Term (and for succeeding Rate Years) will be an annual calculation based on the previous calendar year's Localized Transmission Revenue Requirements, plus the forecasted revenue

requirements of Localized Facilities to be placed in service in the upcoming Rate Year. Each June 30th, the Localized Transmission Revenue Requirement in effect during the portion of the Rate Year that occurred in the previous calendar year will be trued-up based on actual costs from such previous calendar year.

The true-up information will be based on actual data, in lieu of allocated data if specifically identified in the FERC Form 1, or based on allocated data if such specific information is not identified. For a capital addition whose cost exceeds \$20 million, the NU Companies will make rate base adjustments to estimates and in the true-up process to represent the estimated and actual in-service dates for the capital addition. Specifically, the NU Companies will adjust for transmission plant, accumulated depreciation and accumulated deferred taxes.

The Localized Transmission Revenue Requirement for the NU Companies that is based on data for calendar year 2004 or later shall include a Localized Incremental Return and Associated Income Taxes on the NU Companies' Localized PTF transmission plant investments placed in-service on or after January 1, 2004 (such investments referred to herein as "Localized Post-2003 PTF Investment"). The Localized Incremental Return and Associated Income Taxes for Localized Post-2003 Investment shall incorporate an incentive ROE adder of 100 basis points for plant investments placed in service by December 31, 2008 or as otherwise permitted in Docket Nos. ER04-157 et al. for any projects included in the Regional System Plan ("RSP"), and shall incorporate any incentive ROE adder approved by the FERC under Order No. 679 for other plant investments. The total ROE for any project, including any authorized ROE incentives for Post-2003 PTF Investment and any other incentive ROE approved by FERC under Order No. 679 shall be capped by the top of the applicable zone of reasonableness determined by FERC for the relevant period. The data used in determining the NU Companies' Localized Incremental Return and Associated Taxes for Localized Post-2003 Investment shall be based on actual data in lieu of allocated data if specifically identified in the NU Companies' accounting records.

#### I. Definitions

Capitalized terms not otherwise defined in the Tariff and as used in this formula have the following definitions:

#### A. Allocation Factors

1. <u>Localized Transmission Allocation Factor</u> shall equal the ratio of Localized Transmission Plant in Service to total investment in Transmission Plant.

2. <u>Total Localized Plant Allocation Factor</u> shall equal the ratio of Localized Transmission Plant in Service to Total Plant in Service.

3. <u>Transmission Wages and Salaries Allocation Factor</u> shall equal the ratio of the NU Companies' Transmission-related direct wages and salaries, including those of affiliated companies, to the NU Companies' total direct wages and salaries, including those of affiliated companies, and excluding administrative and general wages and salaries.

B. Terms

<u>Administrative and General Expense</u> shall equal the NU Companies' expenses as recorded in FERC Account Nos. 920-935, excluding FERC Account Nos. 924, 928 and 930.1.

<u>Amortization of Loss on Reacquired Debt</u> shall equal the NU Companies' expenses as recorded in FERC Account No. 428.1.

<u>Amortization of Investment Tax Credits</u> shall equal the NU Companies' expenses as recorded in FERC Account No. 411.4.

<u>Depreciation Expense for Localized Transmission Plant</u> shall equal the NU Companies' Localized Facilities expenses as recorded in FERC Account No. 403.

Dispatch Center means CL&P's CONVEX dispatch center.

<u>Dispatch Center Plant</u> shall equal CL&P's gross plant balance for the Dispatch Center as recorded in FERC Account Nos. 350-359 and 389-399.

<u>General Plant</u> shall equal the NU Companies' gross plant balance as recorded in FERC Account Nos. 389-399 less Dispatch Center general plant.

<u>General Plant Depreciation Expense</u> shall equal the NU Companies' general plant expenses as recorded in FERC Account No. 403 less the portion of such expense for the Dispatch Center.

<u>General Plant Depreciation Reserve</u> shall equal the NU Companies' general plant reserve balance as recorded in FERC Account No. 108 less the portion of such reserve for the Dispatch Center.

<u>Payroll Taxes</u> shall equal those payroll expenses as recorded in NU Companies' FERC Account Nos. 408.1 and 409.1.

Prepayments shall equal the NU Companies' prepayment balance as recorded in FERC Account No. 165.

Property Insurance shall equal the NU Companies' expenses as recorded in FERC Account No. 924.

<u>Total Accumulated Deferred Income Taxes</u> shall equal the net of the NU Companies' deferred tax balance as recorded in FERC Account Nos. 281-283 and NU Companies' deferred tax balance as recorded in FERC Account No. 190.

<u>Total Loss on Reacquired Debt</u> shall equal the NU Companies' expenses as recorded in FERC Account 189.

<u>Total Municipal Tax Expense</u> shall equal the NU Companies' expenses as recorded in FERC Account Nos. 408.1, 409.1.

Localized Transmission Plant in Service shall equal the NU Companies' Localized Facilities gross plant balance as recorded in FERC Account Nos. 350-359.

Localized Transmission Plant Held for Future Use shall equal the NU Companies' Localized Facilities balance as recorded in FERC Account 105.

Localized Transmission Depreciation Reserve shall equal the NU Companies' Localized Facilities reserve balance as recorded in FERC Account 108.

<u>Transmission Operation and Maintenance Expense</u> shall equal NU Companies' expenses as recorded in FERC Account Nos. 560, 561.5 – 561.8, 562-564 and 566-576.5 and shall exclude all HQ HVDC expenses booked to accounts 560 through 576.5 and expenses already included in Transmission Support Expense, as described in Section I below, which are included in FERC Account Nos. 560-576.5.

<u>Transmission Plant</u> shall equal the NU Companies' gross plant balance as recorded in FERC Account Nos. 350-359.

<u>Transmission Plant Materials and Supplies</u> shall equal the NU Companies' balance as assigned to transmission, as recorded in FERC Account 154.

<u>Total Plant in Service</u> shall equal the NU Companies' total gross plant balance as recorded in FERC Account Nos. 301-399.

II. Calculation of Localized Transmission Revenue Requirements

The Localized Transmission Revenue Requirements shall equal the sum of the NU Companies' (A) Localized Return and Associated Income Taxes (including the Incremental Return and Associated Income Taxes for Post-2003 PTF Investment), (B) Localized Transmission Depreciation Expense, (C) Localized Transmission Related Amortization of Loss on Reacquired Debt, (D) Localized Transmission Related Amortization of Investment Tax Credits, (E) Localized Transmission Related Municipal Tax Expense, (F) Localized Transmission Related Payroll Tax Expense, (G) Localized Transmission Operation and Maintenance Expense, (H) Localized Transmission Related Administrative and General Expense , (I) Localized Transmission Support Expense, and (J) Localized Transmission Related Taxes and Fees Charge. The Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment for the NU Companies shall be calculated using the investment base components specifically identified in Section A.1 of the formula below. A. <u>Localized Return and Associated Income Taxes</u> shall equal the product of the Localized Transmission Investment Base and the Cost of Capital Rate. To calculate the Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment, Localized Transmission Plant will only include Sections II.A.1.(a), (c), and (d), in the manner indicated.

#### 1. Localized Transmission Investment Base

The Localized Transmission Investment Base will be the average balances of (a) Localized Transmission Plant, plus (b) Localized Transmission Plant Held for Future Use less (c) Localized Transmission Related Depreciation Reserve, less (d) Localized Transmission Related Accumulated Deferred Taxes, plus (e) Localized Transmission Related Loss of Reacquired Debt, plus (f) Localized Transmission Prepayments, plus (g) Localized Transmission Materials and Supplies, plus (h) Localized Transmission Related Cash Working Capital.

(a) <u>Localized Transmission Plant</u> will equal the balance of (1) the NU Companies' investment in Localized Transmission Plant plus, (2) the NU Companies' balance of investment in General Plant multiplied by the Transmission Wages and Salaries Allocation Factor, further multiplied by the Localized Transmission Allocation Factor. In order to calculate the Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment, Localized Post-2003 PTF Transmission Plant shall be separately identified.

(b) <u>Localized Transmission Plant Held for Future Use</u> shall equal the NU Companies' balance of Localized Transmission Plant Held for Future Use.

(c) Localized Transmission Related Depreciation Reserve shall equal the balance of Localized Transmission Depreciation Reserve plus the balance of Localized Transmission Related General Plant Depreciation Reserve. Localized Transmission Related General Plant Depreciation Reserve shall equal the product of General Plant Depreciation Reserve and the Transmission Wages and Salaries Allocation Factor, further multiplied by the Localized Transmission Allocation Factor. In order to calculate the Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment, Localized Transmission Related Depreciation Reserve associated with Localized Post-2003 PTF Investment shall equal the NU Companies' balance of Localized Transmission Depreciation Reserve. (d) Localized Transmission Related Accumulated Deferred Taxes shall equal the NU Companies' electric balance of Total Accumulated Deferred Income Taxes, multiplied by the Total Localized Plant Allocation Factor. To calculate the Localized Incremental Return and Associated Income Taxes for Localized Post-2003 PTF Investment, Localized Transmission Related Accumulated Deferred Taxes associated with Localized Post-2003 PTF Investment shall equal the NU Companies' electric balance of Total Accumulated Deferred Income Taxes multiplied by the Total Localized Plant Allocation Factor.

(e) <u>Localized Related Loss on Reacquired Debt</u> shall equal the NU Companies' electric balance of Total Loss on Reacquired Debt multiplied by the Total Localized Plant Allocation Factor.

(f) <u>Localized Transmission Prepayments</u> shall equal the NU Companies' electric balance of Prepayments multiplied by the Transmission Wages and Salaries Allocation Factor and further multiplied by the Localized Transmission Allocation Factor.

(g) <u>Localized Transmission Materials and Supplies</u> shall equal the NU Companies' electric balance of Transmission Plant Materials and Supplies multiplied by the Localized Transmission Allocation Factor.

(h) <u>Localized Transmission Related Cash Working Capital</u> shall be a 12.5% allowance (45 days/360 days) of (i) Localized Transmission Operation and Maintenance Expense, plus (ii) Localized Administrative and General Expense.

2. Cost of Capital Rate

The Cost of Capital Rate will equal (a) the NU Companies' Weighted Cost of Capital, plus (b) Federal Income Tax plus (c) State Income Tax.

(a) <u>The Weighted Cost of Capital</u> will be calculated based upon the average capital structure and will equal the sum of:

(i) <u>the long term debt component</u>, which equals the product of the actual weighted average embedded cost to maturity of the NU Companies' long-term debt then outstanding and the ratio that long-term debt is to the NU Companies' total capital. (ii) <u>the preferred stock component</u>, which equals the product of the actual weighted average embedded cost to maturity of the NU Companies' preferred stock then outstanding and the ratio that preferred stock is to the NU Companies' total capital.

(iii) the return on equity component shall equal the product of the NU Companies' return on equity ("ROE") of 11.07% and the ratio that common equity is to the NU Companies' total capital. In order to calculate the Localized Incremental Return and Associated Taxes for Post-2003 PTF Investment, the Localized Incremental Return on Equity shall be the product of (1) the NU Companies' incremental return on equity of 1% for transmission plant investments associated with projects included in the RSP and placed in service by December 31, 2008 or otherwise permitted in Docket Nos. ER04-157 et al., and (2) any ROE incentive adder approved by the FERC under Order No. 679 for other transmission plant investments, provided that the total ROE for any project, including any such ROE incentives, shall be capped by the top of the applicable zone of reasonableness determined by FERC for the relevant period; and (3) the ratio of that common equity to total capital.<sup>1</sup>

# (b) <u>Federal Income Tax</u> shall equal

# [(A+[(C+B)/D]) x (FT)] divided by (1-FT)

where FT is the Federal Income Tax Rate and A is the sum of the preferred stock component and the return on equity component, as determined in Sections II.A.2.(a)(ii) and (iii) above, B is Localized Transmission Related Amortization of Investment Tax Credits, as determined in Section II.D., below, C is the Equity AFUDC component of Localized Transmission Depreciation Expense, as defined in Section II.B., and D is Localized Transmission Investment Base, as Determined in II.A.1., above.

<sup>1</sup> FERC Form-730 contains a list of transmission projects for which FERC has granted incentives under Order No. 679.

(c) <u>State Income Tax</u> Shall equal:

[(A+[(C+B)/D] + Federal Income Tax) x (ST)] divided by (1-ST)

where ST is the State Income Tax Rate, A is the sum of the preferred stock component and return on equity component determined in Sections II.A.2.(a)(ii) and (iii) above, B is the

Localized Transmission Related Amortization of Investment Tax Credits as determined in Section II.D. below, C is the equity AFUDC component of Localized Transmission Depreciation Expense, as defined in Section II.B., D is the Localized Transmission Investment Base, as determined in II.A.1. above and Federal Income Tax is the rate determined in Section II.A.2.(b) above.

B. <u>Localized Transmission Depreciation Expense</u> shall equal the sum of Depreciation Expense for Localized Transmission Plant, plus an allocation of General Plant Deprecation Expense calculated by multiplying General Plant Depreciation Expense by the Transmission Wages and Salaries Allocation Factor and further multiplied by the Localized Transmission Allocation Factor.

C. <u>Localized Transmission Related Amortization of Loss on Reacquired Debt</u> shall equal the NU Companies' electric Amortization of Loss on Reacquired Debt multiplied by the Total Localized Plant Allocation Factor.

D. <u>Localized Transmission Related Amortization of Investment Tax Credits</u> shall equal the NU Companies' electric Amortization of Investment Tax Credits multiplied by the Total Localized Plant Allocation Factor.

E. <u>Localized Transmission Related Municipal Tax Expense</u> shall equal the NU Companies' Total Municipal Tax Expense multiplied by the Total Localized Plant Allocation Factor.

F. <u>Localized Transmission Related Payroll Tax Expense</u> shall equal the NU Companies' electric Payroll Taxes expense, multiplied by the Transmission Wages and Salaries Allocation Factor, and further multiplied by the Localized Transmission Allocation Factor.

G. <u>Localized Transmission Operation and Maintenance Expense</u> shall equal the NU Companies' Transmission Operation and Maintenance Expense multiplied by the Localized Transmission Allocation Factor.

H. Localized Transmission Related Administrative and General Expense shall equal the sum of (1)
 the NU Companies' Administrative and General Expense multiplied by the Transmission Wages and
 Salaries Allocation Factor and further multiplied by the Localized Transmission Allocation Factor, (2)
 Property Insurance multiplied by the Total Localized Plant Allocation Factor, (3) Expenses included in
 Account 928 related to FERC Assessments multiplied by the Total Localized Plant Allocation Factor, (4)
 Federal and State transmission related expenses or assessments in Account 928 multiplied by the
 Localized Transmission Allocation Factor, (5) specific transmission related expenses included in
 Account No. 930.1, multiplied by the Localized Transmission Allocation Factor, and (6) specific
 Localized Facility related public education expenses included in Account 426.54.

I. <u>Transmission Support Expense</u> shall equal the expense paid by the NU Companies' for transmission support for Localized Facilities.

J. <u>Transmission Related Taxes and Fees Charge</u> shall include any fee or assessment imposed by any governmental authority on transmission service provided under this Local Service Schedule that is not specifically identified under any other section of this Local Service Schedule, multiplied by the Localized Transmission Allocation Factor.

# SCHEDULE 21-NU ATTACHMENT NU-L Creditworthiness Procedures

# 1. General Information

All customers taking any service under Schedule 21-NU, the Local Service Schedule ("LSS"), and the associated schedules of The Connecticut Light and Power Company, Western Massachusetts Electric Company, and Public Service Company of New Hampshire (the "NU Companies") must meet the terms of this Attachment NU-L.

### 2. Establishing Creditworthiness

a) Each customer's creditworthiness must be established before receiving transmission services from the NU Companies. A customer will be evaluated at the time that its application for transmission service is provided to the NU Companies based on the creditworthiness information required under this Attachment NU-L. The NU Companies shall conduct a credit review of each Transmission Customer not less than annually or upon reasonable request by the Transmission Customer.

**b**) The NU Companies will review the customer's creditworthiness information for completeness and will notify the customer if additional information is required.

c) Upon completion of a creditworthiness evaluation of a customer, the NU Companies will forward a written evaluation to the customer if they determine that Financial Assurance must be provided.

#### 3. Financial Information

Customers requesting transmission service must submit if available the following:

a) All current rating agency reports of the customer from Standard and Poor's ("S&P"), Moody's Investors Service ("Moody's"), and/or Fitch Ratings ("Fitch").

**b**) A Management Discussion and Analysis ("MD&A") along with audited financial statements provided by an independent registered public accounting firm or a registered

independent auditor for the three (3) most recent fiscal years, or the period of the customer's existence, if shorter than three (3) years.

### 4. Creditworthiness – Qualification for Unsecured Credit

a) A customer may receive unsecured credit from the NU Companies equivalent to three (3) months of the transmission charges. The customer must meet at least one of the following criteria:

- (i) If rated, the customer's lowest rating from the three rating agencies on its senior unsecured long-term debt; or if the customer does not have such a rating, then one rating level below the rating then assigned to the customer's corporate credit rating, as follows:
- 1. a Standard and Poor's or Fitch rating of at least BBB, or
- 2. a Moody's rating of least Baa2.
- (ii) If un-rated or if rated below BBB/Baa2, as described in 4(a)(i) above, the customer must meet all of the following creditworthiness criteria for the three (3) most recent fiscal years:
- A Capitalization Ratio (Debt divided by the sum of shareholders' equity and Debt) of no more than 60 percent Debt, where "Debt" is defined as the sum of all long-term and short-term debt, preferred securities and capital leases. Each of which is recorded in accordance with generally accepted accounting principles;
- 2. Earnings before interest, taxes, depreciation and amortization ("EBITDA") in the most recent fiscal quarter divided by interest expense (ratio of EBITDA-to-interest expense of at least three (3) times); and
- 3. Audited Financial Statements with an unqualified auditor opinion.

**b**) If the customer relies on the creditworthiness of a parent company, the parent company must satisfy the ratings criteria in Section 4(a) above, and must provide to the NU Companies a

written guarantee that it will be unconditionally responsible for all financial obligations associated with the customer's receipt of transmission service from the NU Companies.

c) If the customer or the customer's parent company do not qualify for unsecured credit under Sections 4(a) or (b) above, the customer can still qualify for unsecured credit equivalent to three (3) months of transmission service charges, if:

- the customer has, on a rolling basis, 12 consecutive months of payments to the NU Companies with no missed, late or defaults in payment; or
- (ii) the customer has an executed long-term contract for the sale of the full output (energy and capacity) of its generating unit and either has executed a corresponding service transmission service agreement under Schedule 21-NU for the transmission of that output or the execution of such agreement is pending the customer's demonstration of creditworthiness.

# 5. Financial Assurance

If the customer does not meet the applicable requirements for unsecured credit set out in Section 4 then the customer must either:

a) pay in advance an amount equal to the lesser of the total charge for transmission service not less than five (5) days in advance of the commencement of service, in which case the NU Companies will pay to the customer interest on the amounts not yet due to the NU Companies, computed in accordance with 18 C.F.R. §35.19(a)(2)(iii) of the Commission's Regulations; or

**b**) obtain Financial Assurance in the form of a letter of credit or a parent guarantee equal to the equivalent of three (3) months of transmission service charges prior to receiving service.

(i) The letter of credit must be one or more irrevocable, transferable standby letters of credit issued by a United States commercial bank or a United States branch of a foreign bank provided that such customer is not an affiliate of such bank. The issuing bank must have a credit rating of at least A2 from Moody's or an A rating from S&P or Fitch, or an equivalent credit rating by another nationally recognized rating service reasonably acceptable to the NU Companies, provided that such bank shall have assets totaling not

less than ten billion dollars (\$10,000,000,000). All costs of the letter of credit shall be borne by the applicant for such letter of credit. In the event of an inconsistency in the ratings by Moody's, S&P, or Fitch, a "split rating", the lowest credit rating shall apply.

(ii) If the credit rating of a bank or other financial institution issuing a letter of credit to a customer falls below the levels specified in Section 5(b)(i) above, the customer shall have three (3) business days to obtain a suitable letter of credit from another bank or other financial institution that meets the specified levels unless the NU Companies agree in writing to extend such period.

#### 6. Notifications

Each customer must inform the NU Companies in writing within three (3) business days of any material change in its or its letter of credit issuer's financial condition, and if the customer qualifies under Section 4(b), that of its parent company. A material change in financial condition may include, without limitation, the following:

- a) change in ownership by way of a merger, acquisition, or substantial sale of assets;
- **b**) downgrade by a recognized major financial rating agency;
- c) placement on credit watch with negative implications by a major financial rating agency;
- d) a bankruptcy filing by the customer or parent;
- e) any action requiring the filing of a SEC Form 8-K;
- f) declaration of or acknowledgement of insolvency;
- g) report of a significant quarterly loss or decline in earnings;
- **h**) resignation of key officer(s); or
- i) issuance of a regulatory order and/or the filing of a lawsuit that could materially adversely impact current or future financial results.

#### 7. Ongoing Financial Review

Each customer is required to submit to the NU Companies annually or when issued, as applicable:

- a) current rating agency reports;
- audited financial statements from an independent registered public accounting firm or a registered independent auditor; and
- c) SEC Forms 10-K and 8-K, promptly upon their filing.

#### 8. Change in Creditworthiness Status

A customer who has been extended unsecured credit pursuant to Section 4, must comply with the terms of Financial Assurance in Section 5, if one or more of the following conditions apply:

- a) the customer no longer meets the applicable criteria for unsecured credit in Section 4;
- b) the customer exceeds the amount of unsecured credit extended by the NU Companies, in which case Financial Assurance equal to the amount of exceeded unsecured credit must be provided within five (5) business days; or
- c) the customer has missed two or more payments for any of the transmission services provided by the NU Companies in the last twelve (12) months.

#### 9. Procedures for Changes in Credit Levels and Collateral Requirements

- a) The NU Companies shall issue notice to a customer of any changes to the approved credit levels and/or collateral requirements within five (5) business days after (1) receiving notification of any material changes in financial condition under Section 6 above; (2) receiving the information required for the customer's ongoing financial review listed in Section 7 above; or (3) the occurrence of any of the events leading to a change in creditworthiness requirements listed in Section 8 above.
- b) A customer may submit a written request that the NU Companies provide an explanation of the reasons for the changes in credit levels and/or collateral requirements within five (5) business days after receiving notification of the changes. The NU Companies will provide a written response within five (5) business days after receiving such a request.

#### 10. Contesting Creditworthiness Determinations

A customer may contest the NU Companies' determination of its creditworthiness by submitting a written request for re-evaluation within 20 calendar days of being notified of the creditworthiness determination. The request should provide information supporting the basis for a re-evaluation of the customer's creditworthiness. The NU Companies will review the request and respond within 20 calendar days of receipt.

#### 11. Process for Changing Credit Requirements

- a) In the event the NU Companies plan to revise the Schedule 21-NU requirements for credit levels or collateral requirements described in this Attachment NU-L, they will make a filing under Section 205 of the Federal Power Act.
- b) The NU Companies shall provide written notification to ISO-NE and stakeholders of any filing described above, at least 30 days in advance of such filing.
- c) Filing notifications shall include a detailed description of the filing, including a redlined document containing revised changes(s) to this Attachment NU-L.
- d) The NU Companies shall consult with interested stakeholders upon request.
- Following Commission acceptance of such filing and upon the effective date, the NU
   Companies shall revise their Attachment NU-L an updated version of Schedule 21-NU
   shall be posed to the ISO-NE web site.
- f) When the NU Companies change their credit requirements for service under Schedule 21-NU, the customer is responsible for forwarding updated financial information to the NU Companies. The customer must indicate whether the change affects its ability to meet the requirements of Attachment NU-L. In cases where the customer's credit status has changed, the customer must take the necessary steps to comply with the revised credit requirements of Attachment NU-L by the effective date of the change.

#### 12. Suspension of Service

The NU Companies may immediately suspend service (with notification to the Commission) to a customer, and may initiate proceedings with the Commission to terminate service, if the customer does not meet the terms described in Sections 4 through 8 at any time during the term of service or if the customer's payment obligations to the NU Companies exceed the amount of unsecured or secured credit to which it is entitled under this Attachment NU-L. A customer is not obligated to pay for transmission service that is not provided as a result of a suspension of service.

# **SCHEDULE 21 - UES**

UNITIL ENERGY SYSTEMS, INC. LOCAL SERVICE SCHEDULE

#### SCHEDULE 21-UES

#### Unitil Energy Systems, Inc. Local Service Schedule

#### I. COMMON SERVICE PROVISIONS

Unitil Energy Systems, Inc. ("UES") is a participant in the New England Control Area and has agreed to provide transmission and ancillary services over PTF pursuant to the Tariff. The services provided under this Schedule 21-UES apply only to Non-PTF, except in the case of service to Network Customers that have all or part of their Network Load directly connected to the PTF in the Local Network. These Network Customers shall pay for Local Network Service pursuant to Attachment H to this Schedule 21-UES. Provisions of this Schedule 21-UES shall have priority over any conflicting provisions in the Tariff.

On December 1, 2014, in Docket No. OA14\_\_\_\_, UES requested confirmation of waiver of the following:

- 1. Sections 35.28, 37.5(b), 38.2(a)(1) (7) 38.2(a)(8), 38.2(a)(9) and 38.2(a)(11) of the Commission's Regulations;,
- The FERC Standards for Business Practices and Communications Protocols for Public Utilitiesadopted in Order No. 676, Standards for Business Practices and Communications Protocols for Public Utilities, Order No. 676, III FERC Stats. & Regs., Regs. Preambles 31,216 (2006), as revised in Orders No. 676 C, Standards for Business Practices and Communication Protocols for Public Utilities, 73 Fed. Reg. 43,848 (July 29, 2008), FERC Stats. & Regs, ¶ 31,274 (July 21, 2008));-
- Waiver of the standards incorporated by reference in Order No. 676 E, Standards for Business-Practices and Communication Protocols for Public Utilities, FERC Stats. & Regs ¶ 31,299 (Nov. 24, 2009) and-
- Waiver of all standards incorporated by reference in Order No. 676 H, Standards for Business-Practices and Communication Protocols for Public Utilities, FERC Stats. & Regs ¶ 61,205 (Sept.-18, 2014).-

These standards were developed by the North American Energy Standards Board and incorporated by reference through the addition of Part 38 and Sections 35.28 and 37.5(b) of the Commission's Regulations pursuant to Docket No. RM05-5-000. Upon issuance of a final Commission order on this request for-waiver, UES will modify this schedule to reflect the Commission's determination and the appropriate-

# docket number.

1

Definitions

**1.0 Annual Transmission Costs**: The total annual cost of the Local Network for purposes of Local Network Service shall be the amount specified in Attachment H until amended by UES or modified by the Commission.

**1.1 Curtailment**: A reduction in firm or non-firm transmission service in response to a transmission capacity shortage as a result of system reliability conditions.

**1.2 Load Ratio Share**: Ratio of a Transmission Customer's Network Load to UES's total load computed in accordance with Sections II.10 and II.10(a) of this Schedule under Sections Supplementing Schedule 21 of the OATT and calculated on a rolling twelve month basis.

**1.3.1** Local Network: The transmission facilities owned, controlled, or operated by UES that are used to provide transmission service under Schedule 21 of the OATT.

**1.4** Local Network Service (LNS): The transmission service provided under Schedule 21 of the OATT and this Schedule.

1.5 Network Load: The load that a Network Customer designates for Local Network Service under Schedule 21 of the OATT. The Network Customer's Network Load shall include all load served by the output of any Network Resources designated by the Network Customer. A Network Customer may elect to designate less than its total load as Network Load but may not designate only part of the load at a discrete Point of Delivery. Where a Eligible Customer has elected not to designate a particular load at discrete points of delivery as Network Load, the Eligible Customer is responsible for making separate arrangements under Schedule 21 of the OATT for any Local Point-To-Point Service that may be necessary for such non-designated load.

**1.6** Network Upgrades: Modifications or additions to transmission-related facilities that are integrated with and support the UES's overall Local Network for the general benefit of all users of such Local Network.

1.7 Parties: UES and the Transmission Customer receiving service under this Schedule and

#### the OATT.

### SECTIONS SUPPLEMENTING THE BODY OF THE TARIFF

#### Preamble

The following provisions supplement the provisions of the Tariff. Provisions of this Schedule 21-UES shall have priority over any conflicting provisions in the Tariff. The section numbers of this Schedule 21-UES correspond to or are consecutive to the section numbers in the body of the Tariff that are affected by the additional provisions herein.

#### Sections Supplementing Section I: General Terms and Conditions

**1.7 Creditworthiness**: For the purpose of determining the ability of the Transmission Customer to meet its obligations related to service hereunder, UES may require reasonable credit review procedures in accordance with Attachment L of Schedule 21-UES.

#### Sections Supplementing Section II of the Tariff: Open Access Transmission Tariff (OATT)

# II.A. COMMON SERVICE PROVISIONS

#### II.4 Ancillary Services

Ancillary Services are needed with transmission service to maintain reliability within and among the Control Areas affected by the transmission service. UES is required to provide (or offer to arrange with the ISO as discussed below), and the Transmission Customer is required to purchase, Local Scheduling, System Control and Dispatch Service. The following Ancillary Services are available pursuant to Section II.4 of the Tariff only to the Transmission Customer serving load within the New England Control Area (i) Reactive Supply and Voltage Control Service, (iii) Regulation and Frequency Response, (iii) Energy Imbalance, (iv) Ten-Minute Spinning Reserve Service, (v) Ten-Minute Non-Spinning Reserve Service and (vi) Thirty-Minute Operating Reserve Service.

#### II.8 Billing and Invoicing; Accounting

**8.2 Invoicing**: Within a reasonable time after the first day of each month, UES shall submit an invoice to the Transmission Customer for the charges for all services furnished

under the OATT during the preceding month. The invoice shall be paid by the Transmission Customer within twenty (20) days of receipt. All payments shall be made in immediately available funds payable to UES, or by wire transfer to a bank named by the UES.

**8.4 Customer Default**: In the event the Transmission Customer fails, for any reason other than a billing dispute as described below, to make payment to UES on or before the due date as described above, and such failure of payment is not corrected within thirty (30) calendar days after UES notifies the Transmission

Customer to cure such failure, a default by the Transmission Customer shall be deemed to exist. Upon the occurrence of a default, UES may initiate a proceeding with the Commission to terminate service but shall not terminate service until the Commission so approves any such request. In the event of a billing dispute between UES and the Transmission Customer, UES will continue to provide service under the Service Agreement as long as the Transmission Customer (i) continues to make all payments not in dispute, and (ii) pays into an independent escrow account the portion of the invoice in dispute, pending

resolution of such dispute. If the Transmission Customer fails to meet these two requirements for continuation of service, then UES may provide notice to the Transmission Customer of its intention to suspend service in sixty (60) days, in accordance with Commission policy.

### II.10.2 Stranded Cost Recovery

UES may seek to recover stranded costs from the Transmission Customer pursuant to this OATT in accordance with the terms, conditions and procedures set forth in FERC Order No. 888. However, UES must separately file any specific proposed stranded cost charge under Section 205 of the Federal Power Act.

#### SECTIONS SUPPLEMENTING SCHEDULE 21 OF THE OATT

# I. Local Point-to-Point Service Over the Local Network Owned by UES

#### Preamble

In addition to the provisions set forth in Schedule 21 of the OATT, the provisions of this Schedule 21-UES shall govern Local Point-To-Point transactions using the Local Network owned by UES. Provisions of this Schedule 21-UES shall have priority over any conflicting provisions in the Tariff. The section numbers of this Schedule 21-UES correspond to or are consecutive to the sections of Schedule 21 of the OATT that are affected by the additional provisions herein.

To the extent not otherwise covered in the OATT, the then-current ISO New England Operating Documents, or the TOA, or the rules adopted thereunder, whenever UES implements least-cost redispatch procedures in response to a transmission constraint, UES and the Transmission Customer(s) taking Local Point-To-Point Service will each bear a proportionate share of the total redispatch cost.

## 3 Service Availability

**b) Determination of Available Transfer Capability (ATC)**: A description of UES's specific methodology for assessing ATC is contained in Attachment C of this Schedule. In the event sufficient transfer capability may not exist to accommodate a service request, UES will respond by performing a System Impact Study.

**g) Real Power Losses:** Real power losses are associated with all transmission service. UES is not obligated to provide real power losses. The Transmission Customer is responsible for replacing losses associated with all transmission service as calculated by UES. The applicable real power loss factors tabulated below will be applied to metered loads and Reserved Capacity amounts to account for losses on UES's system. The applicable real power loss factors are as follows:

Firm Local Point-to-Point Service = 0.53% at 34.5 kV subtransmission. Non-firm Local Point-to-Point Service = 0.53% at 34.5 kV subtransmission

#### 6) Procedures for Arranging Non-Firm Local Point-To-Point Service

**f) Determination of Available Transfer Capability**: Following receipt of a tendered schedule UES will make a determination on a non-discriminatory basis of ATC pursuant to Attachment C of this Schedule. Such determination shall be made as soon as reasonably practicable after receipt (during UES's normal business hours of 8:00 a.m. to 4:30 p.m., Monday to Friday), but not later than the following time periods for the following terms of service (i) thirty (30) minutes for hourly service, (ii) thirty (30) minutes for daily service, (iii) four (4) hours for weekly service, and (iv) two (2) days for monthly service.

#### 11 Sale or Assignment of Local Point-to-Point Service

c) Information on Assignment or Transfer of Service: UES currently has waiver from the obligations of FERC Order No. 889 to maintain an OASIS. In the future, upon implementation of any UES OASIS site, resellers may use UES's OASIS site to post transmission capacity available for resale.

#### II. Local Network Service using Non-PTF Owned by UES

#### Preamble

In addition to the provisions set forth in Schedule 21 of the OATT, the provisions of this Schedule 21-UES shall govern Local Network Service using Non-PTF owned by UES. Provisions of this Schedule 21-UES shall have priority over any conflicting provision in the Tariff. The section numbers of this Schedule 21-UES correspond to the sections of Schedule 21 of the OATT that are affected by the additional provisions herein.

Local Network Service allows the Network Customer to integrate, economically dispatch, and regulate its current and planned Network Resources to serve its Network Load in a manner comparable to that in which UES utilizes its Non-PTF to serve its Native Load Customers. Local Network Service also may be used by the Network Customer to deliver economy energy purchases to its Network Load from non-designated resources on an as-available basis without additional charge. Transmission service for sales to non-designated loads will be provided pursuant to the applicable terms and conditions of Schedule 21 of the OATT.

#### 2) Availability of Local Network Service

f) Real Power Losses: The Network Customer is responsible for replacing losses associated with all transmission service as calculated by UES. The applicable real power loss factors tabulated below will be applied to metered loads and Reserved Capacity amounts to account for losses on UES's system. The applicable real power loss factors are as follows:

Local Network Service = 0.53% at 34.5 kV subtransmission.

# 8) Load Shedding and Curtailments

a) **Procedures**: Prior to the Service Commencement Date, UES and the Network Customer shall establish Load Shedding and Curtailment procedures pursuant to Section II.20 of the Tariff, with the objective of responding to contingencies on the Local Network. The Parties will implement such programs during any period when the ISO, the Local Control Center or UES determines that a system contingency exists and such procedures are necessary to alleviate such contingency. UES will notify all affected Network Customers in a timely manner of any scheduled Curtailment.

b) Transmission Constraints: During any period when UES determines that a transmission constraint exists on the Local Network, and such constraint may impair the reliability of UES's system, UES will take whatever actions, consistent with then-current ISO New England Operating Documents or the TOA, and the rules adopted thereunder, and with Good Utility Practice, that are reasonably necessary to maintain the reliability of UES's system. To the extent ISO determines that the reliability of the ISO New England transmission system can be maintained by redispatching resources, UES will initiate procedures pursuant to the OATT, the then-current ISO New England Operating Documents, or the TOA, and the rules adopted thereunder to redispatch all Network Resources and UES's own resources on a least-cost basis without regard to the ownership of such resources. Any redispatch under this section may not unduly discriminate between UES's use of the Local Network on behalf of its Native Load Customers and any Network Customer's use of the Local Network to serve its designated Network Load.

c) Cost Responsibility for Relieving Transmission Constraints: To the extent not otherwise covered in the OATT, the then-current ISO New England Operating Documents, or the TOA, or the rules adopted thereunder, whenever UES implements least-cost redispatch procedures in response to a transmission constraint, UES and the Network Customer(s) will each bear a proportionate share of the total redispatch cost based on their respective Load Ratio Shares.

d) **Curtailments of Scheduled Deliveries**: If a transmission constraint on UES's Local Network cannot be relieved through the implementation of least-cost redispatch procedures and UES determines that it is necessary to Curtail scheduled deliveries, the Parties shall Curtail such schedules in accordance with Section II.22 of the Tariff.

e) Allocation of Curtailments: The ISO, the Local Control Center or UES shall, on a nondiscriminatory basis, Curtail the transaction(s) that effectively relieve the constraint. However, to the extent practicable and consistent with Good Utility Practice, any Curtailment will be shared by UES and Network Customers in proportion to their respective Load Ratio Shares. Neither the ISO, the Local Control Center nor UES shall direct the Network Customer to Curtail schedules to an extent greater than either would Curtail UES's schedules under similar circumstances.

f) Load Shedding: To the extent that a system contingency exists on UES's Local Network and the ISO, the Local Control Center or UES determines that it is necessary for UES and the Network Customers to shed load, the Parties shall shed load in accordance with previously established procedures in accordance with Section II.22 of the Tariff, the then-current ISO New England Operating Documents, or the TOA, and the rules adopted thereunder.

g) System Reliability: Notwithstanding any other provisions of this Schedule, UES reserves the right, consistent with Good Utility Practice and on a not unduly discriminatory basis, to Curtail Local Network Service without liability on the part of UES for the purpose of making necessary adjustments to, changes in, or repairs on UES's lines, substations, and facilities, and in cases where the continuance of Local Network Service would endanger persons or property. In the event of any adverse conditions or disturbances on UES's Local Network or on any other system(s) directly or indirectly interconnected with UES's Local Network, UES, consistent with Good Utility Practice, also may Curtail Local Network Service in order to (i) limit the extent or damage of the adverse condition(s) or disturbance(s), (ii) prevent damage to generating or transmission facilities, or (iii) expedite restoration of service. UES will give the Network Customer as much advance notice as is practicable in the event of such Curtailment. Any Curtailment of Local Network Service will be not unduly discriminatory relative to UES's use of its Local Network on behalf of its Native Load Customers. UES shall specify the rate treatment and all related terms and conditions applicable in the event that the Network Customer fails to respond to established Load Shedding and Curtailment procedures.

# 9) Rates and Charges

In addition to the above sections that correspond to sections in Schedule 21 of the OATT, the following additional provision shall apply to Local Network Service over UES's Local Network.

a) Monthly Demand Charge: The Network Customer shall pay a Monthly Demand Charge which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of UES's Annual Transmission Revenue Requirement as specified in Attachment H to this Schedule 21-UES.

10) Determination of Network Customer's Local Monthly Network Load: The Network Customer's local monthly Network Load is its hourly load (including its designated Network Load not physically interconnected with UES under Section II.5(c) of Schedule 21 of the OATT) coincident with UES's Monthly Local Network Peak. Monthly revenue requirements not otherwise paid for through charges to Eligible Customers for Local Point-to-Point Service will be allocated among UES's Network Customers receiving service under the tariff on the basis of their loads during the hour in the month in which the total connected load to the local network is at its maximum, without any adjustment for credits for generation.

In addition to the above sections that correspond to sections in Schedule 21 of the OATT, the following three provisions shall apply to Local Network Service over UES's local network.

**10a) Determination of UES's Monthly Local Network Load**: UES's monthly Local Network Load is UES's Monthly Local Network Peak minus the coincident peak usage of all firm Local Point-To-Point Service customers pursuant to Schedule 21 of the OATT plus the Reserved Capacity of all firm Local Point-To-Point Service customers.

**10b) Recovery of PTF Transmission Revenue Requirements**: The portion of UES's annual transmission revenue requirements with respect to PTF which is not recovered through the distribution of revenues from Regional Network Service or Local Point-to-Point Service shall be recovered from Eligible Customers taking Regional Network Service or Local Point-to-Point Service pursuant to Section II.13 of the Tariff.

#### Local Scheduling, System Control and Dispatch Service

This service is required to schedule the movement of power through, out of, within, or into UES's Local Network Control Area. Local Scheduling, System Control and Dispatch Service is to be provided directly by UES and the ISO. The Transmission Customer must purchase this service from UES. The charges for UES's Local Scheduling, System Control and Dispatch Service are to be based on the rates set forth below. To the extent that the ISO performs this service for UES, charges to the Transmission Customer are to reflect only a pass-through of the costs charged to UES by the ISO.

Each firm Local Point-To-Point Service Customer under this Tariff will be charged for Local Scheduling, System Control and Dispatch Services for the total Reserved Capacity specified in each reservation for firm Local Point-To-Point Service made under the Tariff at the rates set forth in Appendix A of this Schedule 1.

Each Network Customer under this Tariff will be charged a monthly Local Scheduling, System Control and Dispatch Service Demand Charge, which shall be determined by multiplying its Load Ratio Share times one twelfth (1/12) of the Formula Requirements specified in Appendix B of this Schedule 1. Each Transmission Customer with generation within the ISO's Control Area shall be required also to provide for Scheduling, System Control and Dispatch Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting with the ISO for these services on an unbundled basis. UES will make available Generation Scheduling, System Control and Dispatch Service at the rates set forth in Appendix C of this Schedule 1.

Each Transmission Customer with generation located outside of the ISO Control Area shall be required to provide for Scheduling, System Control and Dispatching Service for that generation. It is anticipated that the Transmission Customer will obtain these services by contracting for these services from the provider of these services within the Control Area where the generation is located. UES shall have the right, at any time, unilaterally to file for a change in any of the provisions of this Schedule 1 in accordance with Section 205 of the Federal Power Act and the Commission's implementing regulations.

# Appendix A

# Determination Of UES's Local Network Point-To-Point Formula Rate For Local Scheduling, System Control and Dispatch Service

UES's Formula Rate for Point-To-Point Local Scheduling, System Control and Dispatch Service ("Formula Rate") is an annual rate determined from the following formula.

FORMULA RATE<sub>i</sub> = 
$$A_{i-1} - B_{i-1}$$
  
 $\cdots$   $C_{i-1}$ 

WHERE:

- i equals the calendar year during which service is being rendered ("Service Year").
- A<sub>i-1</sub> is the Annual Control Center Expenses (expressed in dollars) of UES for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to this Appendix A of Schedule 1.
- B<sub>i-1</sub> is the actual local scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual local scheduling and dispatch revenues shall be those recorded on the books of UES in FERC Account No. 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.
- C<sub>i-1</sub> is the single annual coincident peak transmission and distribution load (expressed in kilowatts) of UES for the calendar year prior to the Service Year, as reported in FERC Form No.

   1.

Schedule 1 Appendix A Exhibit 1

# **Determination Of Annual Control Center Expenses**

The rate formula for determination of the annual control center expenses revenue requirements for UES is determined as follows:

A. <u>ANNUAL CONTROL CENTER EXPENSES</u> = Sum of UES's (Account 556 System Control and Load Dispatching Expense) + (Account 557 Other Expense) X .50\* for the calendar year prior to the Service Year.

\*This factor reflects allocation to the transmission function of a portion (50 percent) of the costs recorded in Accounts 556 and 557 associated with dispatching transmission and generating facilities. This 50 percent allocation of control center costs is based on two functions performed by the control center (i) control of generation and (ii) control of transmission.

#### Appendix B

# Determination Of UES's Network Formula Requirements For Local Scheduling, System Control And Dispatch Service

UES's formula requirements for Network Local Scheduling, System Control and Dispatch Service is determined from the following formula.

 $Formula \ Requirements_i = A_{i-1} - B_{i-1}$ 

WHERE:

• i equals the calendar year during which service is being rendered ("Service Year").

• A<sub>i-1</sub> is the Annual Control Center Expenses (expressed in dollars) of UES for the calendar year prior to the Service Year. The Annual Control Center Expenses are determined pursuant to the formula specified in Exhibit 1 to Appendix A of Schedule 1.

•  $B_{i-1}$  is the actual local scheduling, system control and dispatch revenues (expressed in dollars) provided from the provision of transmission services to others. The actual local scheduling, system control and dispatch revenues shall be those recorded on the books of UES in FERC Account No. 456 pertaining to Transmission of Electricity for Others and such other applicable FERC Account for the calendar year prior to the Service Year.

# Appendix C

Determination Of UES's Formula Rate For Generation Scheduling, System Control And Dispatch Service

UES's Formula Rate for Generation Scheduling, System Control and Dispatch Service ("Formula Rate") shall be calculated using the Formula Rate for Point-to-Point Local Scheduling, System Control and Dispatch Service in Appendix A of Schedule 21 - UES.

# Long-Term Firm Local and Short-Term Firm Local Point-to-Point Service

The Transmission Customer shall compensate UES each month for firm Reserved Capacity at the sum of the applicable charges set forth below:

- Yearly delivery: one-twelfth of the demand charge of
   N/A /KW of firm Reserved Capacity per year.
- 2) Monthly delivery: \$ N/A /KW of firm Reserved Capacity per month.
- 3) Weekly delivery: \$ N/A /KW of firm Reserved Capacity per week.

4) **Daily delivery**: \$ N/A /KW of firm Reserved Capacity per day.

The total demand charge in any week, pursuant to a reservation for Daily delivery, shall not exceed the rate specified in section (3) above times the highest amount in kilowatts of firm Reserved Capacity in any day during such week.

5) **Discounts**: Three principal requirements apply to discounts for transmission service as follows (1) any offer of a discount made by UES must be announced to all Eligible Customers solely by posting on Unitil.com, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on Unitil.com, and (3) once a discount is negotiated, details must be immediately posted on Unitil.com. For any discount agreed upon for service on a path, from point(s) of receipt to point(s) of delivery, UES must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on UES's Local Network.

6) **Resales:** The rates and rules governing charges and discounts stated above shall not apply to resales of transmission service, compensation for which shall be governed by section I.11 (a) of Schedule 21 of the OATT.

#### Non-Firm Local Point-To-Point Service\*

The Transmission Customer shall compensate UES for non-firm Local Point-To-Point Service up to the sum of the applicable charges set forth below:

1) Monthly delivery: \$ N/A /KW of Reserved Capacity per month.

2) Weekly delivery: \$ N/A /KW of Reserved Capacity per week.

# 3) Daily delivery: \$ N/A /KW of Reserved Capacity per day.

The total demand charge in any week, pursuant to a reservation for Daily delivery, shall not exceed the rate specified in section (2) above times the highest amount in kilowatts of Reserved Capacity in any day during such week.

4) **Hourly delivery**: The basic charge shall be that agreed upon by the Parties at the time this service is reserved and in no event shall exceed \$ N/A /MWH. The total demand charge in any day, pursuant to a reservation for Hourly delivery, shall not exceed the rate specified in section (3) above times the highest amount in kilowatts of Reserved Capacity in any hour during such day. In addition, the total demand charge in any week, pursuant to a reservation for Hourly or Daily delivery, shall not exceed the rate specified in section (2) above times the highest amount in kilowatts of Reserved Capacity in any hour during such week.

5) **Discounts**: Three principal requirements apply to discounts for transmission service as follows (1) any offer of a discount made by UES must be announced to all Eligible Customers solely by posting on Unitil.com, (2) any customer-initiated requests for discounts (including requests for use by one's wholesale merchant or an Affiliate's use) must occur solely by posting on Unitil.com, and (3) once a discount is negotiated, details must be immediately posted on Unitil.com. For any discount agreed upon for service on a path, from point(s) of receipt to point(s) of delivery, UES must offer the same discounted transmission service rate for the same time period to all Eligible Customers on all unconstrained transmission paths that go to the same point(s) of delivery on UES's Local Network.

6) **Resales:** The rates and rules governing charges and discounts stated above shall not apply to resales of transmission service, compensation for which shall be governed by section I.11 (a) of

Schedule 21 of the OATT.

\* Rates reflect a 25% discount off the firm Point-To-Point rates

# DISTRIBUTION ADDER UNDER TARIFF

In the case where distribution facilities of UES are employed in providing service under Schedule 21 of the OATT, the Transmission Customer shall compensate UES for the use of such facilities. In addition to the charges contained in this Tariff, the compensation for such distribution facilities will be determined on a case-by-case basis.

All such charges shall be subject to appropriate regulatory approval.

# ATTACHMENT C

Methodology To Assess Available Transfer Capability

#### 1. Introduction

ISO is the regional transmission organization (RTO) for the New England Control Area. The New England Control Area includes the transmission system located in the states of Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island, and Vermont, but does not include the transmission system in northern Maine (i.e., Aroostook and parts of Penobscot and Washington Counties) that is radially connected to New Brunswick and administered by the Northern Maine Independent System Administrator. The New England Control Area is comprised of PTF, non-PTF, OTF, MTF, and is interconnected to three neighboring Balancing Authority Areas ("BAA") with various interface types.

As part of its RTO responsibilities, the ISO is registered with the North American Electric Reliability Corporation ("NERC") as several functional model entities that have responsibilities related to the calculation of ATC as defined in the following NERS Standards: MOD-001 – Available Transmission System Capability ("MOD-001"). MOD-004 – Capacity Benefit Margin ("MOD-004"), and MOD-008 – Transmission Reliability Margin Calculation Methodology ("MOD-008"). The extent of those responsibilities is based on various Commission approved transmission operating agreements and the provisions of the ISO New England Operating Documents.

While the ISO is the Transmission Service Provider for regional transmission service ("Regional Transmission Service") associated with Pool Transmission Facilities, the Participating Transmission Owners ("PTOs") provide local transmission service over Non-Pool Transmission Facilities within the RTOP footprint and are responsible for calculating TTC and ATC associated with Local Transmission Service provided under Schedule 21 pursuant to the Transmission Operating Agreement ("TOA"). Pursuant to CFR § 37.6(b)<sup>10</sup> of the FERC Regulations, Transmission Provider's are obligated to calculate and post TTC and ATC for each Posted Path. The ISO is not responsible for the calculation of these values.

Posted Path is defined as any control area to control area interconnection; any path for which service is

<sup>10</sup> Section \$37.6(b) Posting transfer capability. The available transfer capability on the Transmission Provider's system (ATC) and the total transfer capability (TTC) of that system shall be calculated and posted for each Posted 10 2 Path as set out in this section.

denied, curtailed or interrupted for more than 24 hours in the past 12 months; and any path for which a customer requests to have ATC or TTC posted. For this last category, the posting must continue for 180 days and thereafter until 180 days have elapsed from the most recent request for service over the requested path. For purposes of this definition, an hour includes any part of any hour during which service was denied, curtailed or interrupted.<sup>11</sup>

UES does not currently have any Posted Paths based on the above definition. However, to the extent that UES does in the future have a Posted Path, UES will calculate TTC using the NERC Standard MOD-029 – Rated System Path Methodology ("MOD-029") as outlined below.

# 1.1 Scope of Document

The scope of this document is limited to those functions performed by UES as the Transmission Service Provider of Schedule 21-UES Point-to Point transmission service over Local Facilities pursuant to the PTOs' Transmission Operating Agreement and the ISO OATT:

- Methodology for calculating Total Transfer Capability (TTC)
- Methodology for calculating Available Transfer Capability (ATC)
- Existing Transmission Commitment (ETC)
- Use of Transmission Reliability Margin (TRM)
- Use of Capacity Benefit Margin (CBM)
- Use of Rollover Rights (ROR) in the calculation of ETC

TTC and ATC are required to be calculated only for certain non-PTF internal Posted Paths over which Point-to-Point transmission service is provided under Schedule 21-UES. TTC and ATC is not calculated by UES for Local Network Service because ISO employs a market model for economic, security constrained dispatch of generation, and UES does not require advance reservation for such network service.

# 2. Transmission Service in the New England Markets

Section § 37.6(b)(1)(i).

Since the inception of the OATT for New England, the process by which generation located inside New England supplies energy to the bulk electric system has differed from the Commission pro forma OATT. The fundamental difference is that internal generation is dispatched in an economic, security constrained manner by the ISO rather than utilizing a system of physical rights, advance reservations and point-to-point transmission service. Through this process, internal generation provides offers that are utilized by the ISO in the Real-Time Energy Market dispatch software. This process provides the least-cost dispatch to satisfy Real-Time load on the system.

In addition to offers from generation within New England, entities may submit External Transactions to move energy into the New England Control Area, out of the New England Control Area or through the New England Control Area. The New England Real-Time Energy Market clears these External Transactions based on forecast Locational Marginal Pricing (LMPs) and the transfer capability of the associated external interfaces. With those External Transactions in place, the Real-Time Energy Market dispatches internal generation in an economic, security constrained manner to meet Real-Time load within the region.

The process for submitting External Transactions into the Real-Time Energy Market does not require an advance physical reservation for use of the PTF. In the event that the net of the economic External Transactions is greater than the transfer capability of the associated external interface, the External Transactions selected to flow are selected based on the rules specified in the tariff. For any External Transactions that are confirmed to flow in Real-Time based on the economics of the system, a transmission reservation for RNS or Through or Out Service is created after-the-fact to satisfy the transparency needs of the market.

The process described above is applicable to the PTF within the ISO Area, and non-PTF Local Facilities where utilized for Local Network Service by generation or load. However, UES owns Local Facilities over which an advance transmission service reservation for firm or non-firm transmission service may be required. On those Local Facilities, the market participant may obtain a transmission service reservation from UES under Schedule 21-UES prior to delivery of energy into the Real-Time Energy Market.<sup>12</sup> This document addresses the calculation of ATC and TTC for these non-PTF internal paths.

#### 3. Schedule 21-UES Total Transfer Capability (TTC)

The TTC on UES' non-PTF Local Facilities that require Point-to-Point transmission service reservations

<sup>12</sup> See n - 2, 3 and 6, supra.

are relatively static values and are calculated using the NERC Standard MOD-029 – Rated System Path Methodology. TTC is the amount of electric power that can be moved or transferred reliably from one area to another area of the interconnected transmission systems by way of all transmission lines (or paths) between those areas under specified system conditions. UES calculates TTC according to this definition applying the process as described below.

#### 3.1 Guidelines and Principles

When estimating TTC, UES will apply the following, as amended and/or adopted from time to time

- Good Utility Practice
- NERC criteria and guidelines
- ISO New England criteria, rules and reliability standards
- Northeast Power Coordinating Council (NPCC) criteria and guidelines
- Unitil Energy Systems, Inc. guides

# 3.2 Transmission System Model Representation

UES will estimate TTC using transmission system load flow models developed for UES' system. The models may include representations of other neighboring systems. UES will use system models that it deems appropriate for study of the request for firm transmission service. Additional system models and operating conditions, including assumptions specific to a particular analysis, may be developed for conditions not available in the library of load flow cases. The system models may be modified, if necessary, to include additional system information on load, transfers and configuration, as it becomes available.

#### 3.3 Contingency Analysis

UES will perform, if necessary, power flow and transient stability analysis to ensure that the interface's physical limits will not be violated for credible system contingencies per NERC, NPCC and ISO reliability criteria. TTC, based on contingency analysis, is the incremental transfer capability of the transmission system following the loss of the most critical element while maintaining thermal, and stability performance of the system within acceptable regional practices and consistent with guidelines of Item 3.1 of this Attachment.

#### 3.4 Posting TTCs

When necessary, UES will estimate TTC as outlined above and post on its website.

#### 4. Capacity Benefit Margin (CBM)

CBM is defined as the amount of firm transmission transfer capability set aside by a TSP for use by the Load Serving Entities. The ISO does not set aside any CBM for use by the Load Serving Entities, because of the New England approach to capacity planning requirements in the ISO New England Operating Documents. Load Serving Entities operating within the New England Control Area are required to arrange for their Capacity Requirements prior to the beginning of any given month in accordance with ISO Tariff, Section III.13.7.3.1 (Calculation of Capacity Requirement and Capacity Load Obligation). Load Serving Entities do not utilize CBM to ensure that their capacity needs are met; therefore, CBM is not applicable within the New England Control Area is set to zero (0).

#### Existing Transmission Commitments, Firm (ETC<sub>F</sub>)

The ETC<sub>F</sub> are those confirmed firm transmission reservations (PTP<sub>F</sub>) plus any rollover rights for firm transmission reservations (ROR<sub>F</sub>) that have been exercised. There are no allowances necessary for Native Load forecast commitments (NL<sub>F</sub>), Network Integration Transmission Service (NITS<sub>F</sub>), grandfathered Transmission Service (GF<sub>F</sub>) and other service(s), contract(s) or agreement(s) (OS<sub>F</sub>) to be considered in the ETC<sub>F</sub> calculation.

#### Existing Transmission Commitments, Non-Firm(ETC<sub>NF</sub>)

The ( $ETC_{NF}$ ) are those confirmed non-firm transmission reservations ( $PTP_{NF}$ ). There are no allowances necessary for non-firm Network Integration Transmission Service ( $NITS_{NF}$ ), non-firm grandfathered Transmission Service ( $GF_{NF}$ ) or other service(s), contract(s) or agreement(s) ( $OS_{NF}$ ).

#### 5. Transmission Reliability Margin (TRM)

TRM is the amount of transmission transfer capability set aside to provide reasonable assurance that the interconnected transmission network will be secure. TRM accounts for the inherent uncertainty in system conditions and the need for operating flexibility to ensure reliable system operation as system conditions change. It is used only for external interfaces under the New England market design. UES, under Schedule 21, does not have any external interfaces, and therefore, TRM for UES' non-PTF facilities is zero.

#### 6. Calculation of ATC for UES' Local Facilities

#### **General Description**

This section defines the ATC calculations performed by UES for its non-PTF internal interfaces. Consistent with the NERC definition, the equation for Available Transfer Capability is: ATC = (TTC - CBM - TRM - Existing Transmission Commitments + Postbacks + counterflows). As discussed above, the CBM and TRM for the PTF interfaces for which UES calculates ATC are zero (0). As consistent with the ISO calculation, the equations for firm and non-firm Available Transfer Capability are:

Firm ATC = (TTC – CBM – TRM – firm ETC) Non-firm ATC = (TTC – CBM – TRM – firm and non-firm ETC).<sup>13</sup>

As discussed above, the TRM and CBM for UES's non-PTF paths are zero. The purpose of the Existing Transmission Commitments ("ETC") component of the ATC equation is for FG&E to reduce the amount of ATC by the amount of existing firm transmission commitments that are not otherwise included in CBM or TRM. There is no requirement to purchase transmission service in advance of flowing energy in Real-Time, and there is no MW amount set aside by FG&E on any interface. One such example is point-to-point service commitments sharing common transmission paths would be combined through system modeling to calculate the net existing transmission capacity (ETC) impact. This ETC value is then used in the ATC calculation shown above. Therefore there are no Existing Transmission Commitments to be applied in the ATC equation. For this reason, ETC equals zero (0) for the purposes of ATC calculation. Because Postbacks and counterflows are related to ETC and ETC is zero (0), both Postbacks and counterflows also are equal to zero (0).

As described in Section 2, under Schedule 21-UES, UES requires the purchase of transmission service in advance of delivery of energy to the New England Wholesale Market over certain non-PTF paths, and those existing transmission commitments would be applied to the ATC equation for the specific posted path. As a practical matter, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

Entities submit their bids and offers to move energy into, out of and through the Energy Market through External Transactions. As Real-Time approaches, the ISO determines which of the submitted External

<sup>13</sup> Existing Transmission Commitments ("ETC")

Transactions will be scheduled in the coming hour in accordance with the rules set forth in the ISO New England Operating Documents. Basically, the ATC of the non-PTF assets in the New England market is almost always positive. The ATC is equal to the amount of External Transactions that the ISO will schedule on an interface for the designated hour. With this simplified version of ATC, there is no detailed algorithm to be described or posted other than: ATC equals TTC. Thus, for those non-PTF facilities that serve as a path for the UES' Schedule 21-UES Point-to-Point Transmission Customers, UES would post the ATC as 9999, consistent with industry practice. ATC on these paths varies depending on the time of day. However, it would be posted with an ATC of "9999" to reflect the fact that there are no restrictions on these paths for commercial transactions.

#### 6.1 Calculation of Schedule 21-UES Firm ATC (ATC<sub>F</sub>)

6.1.1 Calculation of ATC<sub>F</sub> in the Planning Horizon (PH)

For purposes of this Attachment C, PH is any period before the Operating Horizon.

Consistent with the NERC definition,  $ATC_F$  is the capability for firm transmission reservations that remain after allowing for TRM, CBM,  $ETC_F$ , Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM are zero. Firm Transmission Service under Schedule 21-UES that is available in the Planning Horizon (PH) includes: Yearly, Monthly, Weekly, and Daily. Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-UES transmission reservations are not considered in the ATC calculation. Therefore,  $ATC_F$  in the PH is equal to the TTC minus  $ETC_F$ 

6.1.2 Calculation of ATC<sub>F</sub> in the Schedule 21-UES Operating Horizon (OH)

For purposes of this Attachment C, OH is noon eastern prevailing time each day. At that time, the OH spans from noon through midnight of the next day for a total of 36 hours. As time progresses the total hours remaining in the OH decreases until noon the following day when the OH is once again reset to 36 hours.

Consistent with the NERC definition,  $ATC_F$  is the capability for firm transmission reservations that remain after allowing for  $ETC_F$ , CBM, TRM, Postbacks<sub>F</sub> and counterflows<sub>F</sub>.

As discussed above, TRM and CBM is zero. Daily firm Transmission Service under Schedule 21-UES is the only firm service offered in the Operating Horizon (OH). Postbacks<sub>F</sub> and counterflows<sub>F</sub> of Schedule 21-UES transmission reservations are not considered in the  $ATC_F$  calculation. Therefore,  $ATC_F$  in the OH is equal to the TTC minus ETC<sub>F</sub>.

**6.1.3** Because firm Schedule 21-UES transmission service is not offered in the Scheduling Horizon (SH):  $ATC_F$  in the SH is zero.

## 6.2 Calculation of Schedule 21-UES Non-Firm ATC (ATC<sub>NF</sub>)

6.2.1 Calculation of ATC<sub>NF</sub> in the PH

 $\text{ATC}_{NF}$  is the capability for non-firm transmission reservations that remain after allowing for ETC <sub>F</sub>, ETC<sub>NF</sub>, scheduled CBM (CBM<sub>S</sub>), unreleased TRM (TRM<sub>U</sub>), non-firm Postbacks (Postbacks<sub>NF</sub>) and non-firm counterflows (counterflows<sub>NF</sub>).

As discussed above, the TRM and CBM for Schedule 21-UES are zero. Non-firm ATC available in the PH includes: Monthly, Weekly, Daily and Hourly. TRM  $_{\rm U}$ , Postbacks<sub>NF</sub> and counterflows<sub>NF</sub> of Schedule 21-UES transmission reservations are not considered in this calculation. Therefore, ATC<sub>NF</sub> in the PH is equal to the TTC minus ETC<sub>F</sub> and ETC<sub>NF</sub>.

 $6.2.2 \quad \text{Calculation of ATC}_{\text{NF}} \text{ in the OH}$ 

ATC<sub>NF</sub> available in the OH includes: Daily and Hourly.

As discussed above TRM and CBM for Schedule 21-UES are zero.  $TRM_U$ , counterflows and  $ETC_{NF}$  are not considered in this calculation. Therefore,  $ATC_{NF}$  in the OH is equal to the TTC minus  $ETC_{F}$  plus postbacks of  $PTP_F$  in OH as  $PTP_{NF}$  (Postbacks  $_{NF}$ ).

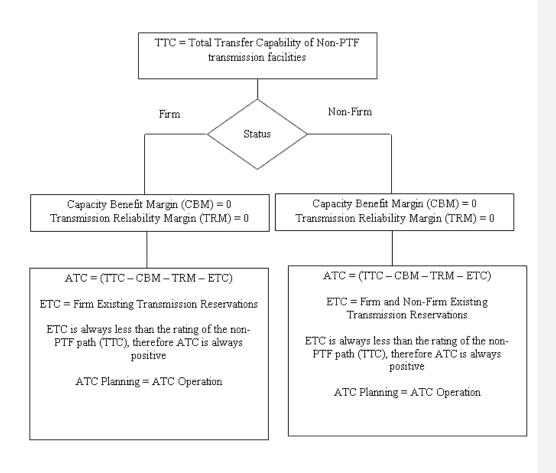
6.3 Negative ATC

As stated above, the ratings of the radial transmission paths are always higher than the transmission requirements of the Transmission Customers connected to that path. As such, transmission services over these posted paths are considered to be always available.

As stated above, UES' non-PTF facilities are primarily radial paths that provide transmission service to directly interconnected generators. It is possible, in the future, that a particular radial path may interconnect more nameplate capacity generation than the path's TTC. However, due to the ISO's security constrained dispatch methodology, the ISO will only dispatch an amount of generation interconnected to such path so as not to incur a reliability or stability violation on the subject path. Therefore, ATC in the PH, OH and SH may become zero, but will not become negative.

## ATC Process Flow Diagram for Non-PTF Interfaces

The process flow diagram illustrates the steps through which ATC is calculated both on an operating and planning horizon.



## 7. Posting of Schedule 21-UES ATC

### 7.1 Location of ATC Posting.

When necessary, UES will estimate ATC values for these internal paths as outlined above and post on its website, <u>http://www.unitil.net/nepool/nh/pdf/atc\_cbm\_ttc\_trm\_ues.pdf</u>.

## 7.2 Updates To ATC

When any of the variables in the ATC equations change, the ATC values are recalculated and immediately posted.

## 7.3 Coordination of ATC Calculations

Schedule 21-UES non-PTF has no external interfaces. Therefore it is not necessary to coordinate the values.

### 7.4 Mathematical Algorithms

A link to the actual mathematical algorithm for the calculation of ATC for UES' non-PTF internal interfaces is located at <u>http://www.unitil.com/sites/default/files/pdfs/ues\_atc\_algorithms\_3\_11.pdf</u>.

## ATTACHMENT D

#### Methodology for Completing a System Impact Study

UES will perform System Impact Studies for the purpose of determining the feasibility of integrating Network Load and Network Resources into UES's Local Network under Schedule 21 of the OATT, or for the purpose of determining the feasibility of providing Local Point-To-Point Service under this Tariff. All System Impact Studies will be completed using the same method employed by UES to integrate into UES's Local Network (i) generation resources owned or acquired to serve its Native Load Customers, and (ii) its Native Load Customers' load. Specifically, System Impact Studies will be performed by applying the applicable criteria, rules, standards and operating procedures. In addition to applying the aforementioned applicable criteria, rules, standards and operating procedures , to determine the feasibility of providing service to Network Load and/or Local Point-To-Point Service, System Impact Studies will also be performed by applying Unitil Service Corp.'s "Electric System Planning Guide."

# ATTACHMENT E

# Index Of Local Point-To-Point Service Customers

Customer

Date of Service Agreement

## ATTACHMENT H

# Annual Transmission Revenue Requirement For Local Network Service

- 1. The Annual Transmission Revenue Requirement for purposes of the Local Network Service shall be \$ N/A.
- 2. The amount in (1) shall be effective until amended by UES or modified by the Commission.
- 3. If UES receives a distribution pursuant to Section II.13 of the Tariff from ISO out of revenues paid for Through or Out Service or for In Service (as defined in the OATT), the amounts received shall reduce its local network service revenue requirements.
- 4. Any rate developed hereunder shall employ a cost of equity of 10.57%.

# ATTACHMENT I

# Index Of Local Network Service Customers

Customer

Date of Service Agreement

Unitil Energy Systems, Inc. December 1, 2002

# Attachment L Creditworthiness Policy

#### 1. Introduction

This guide establishes creditworthiness standards for transmission service and/or interconnection service customers ("Customers") entering into new or amended service agreements with Unitil Energy Systems, Inc. ("UES") under the ISO New England Open Access Transmission Tariff ("ISO-NE OATT").<sup>14</sup> In accordance with the Federal Energy Regulatory Commission's Policy Statement on Credit-Related Issues for Electric OATT Transmission Providers, Independent System Operators and Regional Transmission Organizations ("Policy Statement"), this Creditworthiness Policy is intended to make UES's credit-related practices more transparent and comprehensive. The following describes UES credit review procedures and the types of security that are acceptable to UES to protect against the risk of non-payment.

#### 2. Creditworthiness

UES will evaluate the creditworthiness of Customers entering into new or amended transmission or interconnection service agreements with UES in order to assess a Customer's credit risk relative to the exposure of "Total Outstanding Obligation" as defined in Section 2.1 below, created by the transaction or transactions that UES has with the Customer. For purposes of determining the ability of a Customer to meet its obligations, UES may require the Customer to submit financial information for the credit review, including credit ratings, credit reports and audited financial statements for the last five years, including audited quarterly reports for the prior two years, if available. Further, the Customer will be expected to provide calculations of the following: Current Total Capitalization Ratio, Including Short-Term Debt; Tangible Net Worth for a period within sixty days of a Customer's request; Earnings Before Interest, Taxes, Depreciation and Amortization for twelve of the last fifteen consecutive months; and additional calculations and other information deemed necessary for the evaluation credit. In completing its evaluation, UES may consider other factors including but not limited to past billing history or the characteristics of service being requested.

#### 2.1 Total Outstanding Obligation

The Customer's Total Outstanding Obligation to UES will be the sum total of the following components:

<sup>14</sup> See ISO New England Inc., ISO New England Inc. Transmission, Markets and Services Tariff, Section II. This policy is applicable to transmission or interconnection service agreements established from time-to-time under Schedules 21 - UES of the ISO-NE OATT and to individually negotiated agreements for similar transmission or interconnection services.

2.1.1 If the Customer is making payments to UES for ongoing expenses (including, but not limited to, O&M expenses related to interconnections or other monthly charges such as monthly transmission charges under Schedule 21 - UES) the Customer will be required to provide security pursuant to Section 2.2 below, for four months' worth of the Customer's average payment obligation for such charges.

2.1.2 In accordance with the provisions of the ISO-NE OATT, a Customer will pay a Contribution in Aid of Construction ("CIAC") or transfer ownership of facilities to UES for transmission or interconnection facilities that are to be constructed on behalf of a Customer at the Customer's sole expense. If UES determines in good faith that the receipt of CIAC payments or property from the Customer are non-taxable, UES will require a form of security from the customer pursuant to Section 2.2 below for the amount of the potential tax liability to UES that would occur if such facilities were deemed taxable.

2.1.3 In accordance with the provisions of Schedule 21 – UES to the ISO-NE OATT, a Customer will pay a formula rate over time for return of and on the cost of capital incurred by UES on behalf of a Customer at the Customer's sole expense. The Customer will also be required to provide security pursuant to Section 2.2 below, for the unamortized balance of plant in service reserved for the sole use of the Customer.

## 2.2 Creditworthiness Requirements

A Customer will be considered creditworthy upon satisfying at least one of the following conditions or a combination of those conditions at the time that the customer enters into a transmission or interconnection service agreement and for so long as the Customer maintains satisfaction of at least one of these conditions for any outstanding obligations thereunder:

2.2.1 The Customer maintains a minimum credit rating from Standard & Poor's Long-term Issuer Credit Rating of BBB- or better or Moody's Investors Service Long-term Issuer Credit Rating of Baa3 or better so long as the Customer's Total Outstanding Obligation plus any other unsecured obligations with UES does not exceed the Credit Limits discussed in Section 4 below. When UES reviews a Customer's rating from two or more rating agencies and a split rating is present, the lower debt rating will apply. In the event that the Customer has no rating from either Standard & Poor's or Moody's Investors Service, a rating from Fitch may also be used with

acceptable ratings equivalent to those from either Standard and Poor's or Moody's Investors Service. If unrated, the Customer's financial statements will be reviewed to determine an equivalent rating based on the Customer's unsecured credit limits and/or financial statements.

If, at any time, the Customer's rating falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify UES within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to UES, as described in this Section 2.2.

2.2.2 The Customer provides and maintains in effect during the term of and until full and final payment and performance of the service agreement an unconditional and irrevocable standby letter of credit for the Total Outstanding Obligation in the form and substance and issued by a bank reasonably acceptable to UES. A draft, acceptable form letter of credit is attached. Any such bank must satisfy the creditworthiness criteria described in 2.2.1 above.

If, at any time, the bank's rating falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify UES within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to UES, as described in this Section 2.2.

2.2.3 If the Customer's parent or an affiliate company satisfies the creditworthiness criteria described in 2.2.1 above and, subject to the Credit Limits stated in Section 4 below, such company submits to UES and maintains in effect a letter of guaranty reasonably acceptable to UES as to amount, form and substance for the term of and until full and final payment and performance of the service agreement.

If, at any time, the credit rating of the Customer's parent or affiliate providing the guaranty falls below investment grade (BBB- from Standard and Poor's and/or Baa3 from Moody's or equivalent ratings from Fitch), the Customer will be required to (i) notify UES within 10 days and, (ii) within 30 days, provide another form of security reasonably acceptable to UES, as described in this Section 2.

2.2.4 The Customer makes an advance payment to UES in immediately available funds for the Total Outstanding Obligation.

#### 3. Customer Costs Requiring Prepayment

In accordance with the provisions of the ISO-NE OATT, a Customer will pay a Contribution in Aid of Construction ("CIAC") for transmission or interconnection facilities to be constructed by UES on behalf of a Customer at the Customer's sole expense. The Customer will have the option to (i) prepay the CIAC in immediately available funds to UES, or (ii) make periodic CIAC progress payments, as defined in the Customer's service agreement, to prepay in increments capital costs scheduled to be incurred by UES. If UES determines in good faith that such payments or property transfers made by the Customer should be reported as income subject to taxation, the Customer shall also prepay all costs associated with the cost consequences of the current tax liability imposed on UES by those facilities (the "Tax Gross- up").

#### 4. Determination of Credit Limits

UES reserves the right to limit the total amount of unsecured credit extended to a Customer under 2.2.1 and 2.2.3 above such that the sum of all unsecured credit that such Customer has with UES, including the Total Outstanding Obligation, shall not exceed the Credit Limits defined below. Such limitations are based on an assessment of the Customer's or its Guarantor's credit rating and the net worth of the Customer's or its Guarantor's assets.

Standard and Poor's (or Equivalent) Rating	Unsecured Credit Limit as Percent of Customer's or Guarantor's Tangible Net Worth
A and above	1.00%
A-	0.50%
BBB+	0.30%
BBB	0.20%
BBB-	0.10%

Once UES has evaluated or reevaluated and determined the maximum Credit limits for each Customer, it will inform the prospective Customer of the amount of such credit limits. A customer may request in writing a reevaluation of the maximum Credit limits, within 14 days from the date that they were informed by UES of such limits. Justification for such a reevaluation should be contained in the request. All requests for reevaluation must be submitted directly to the UES Contract Administrator.

From time to time, principally due to unknown factors such as changing market, economic, banking or other financial conditions, but not solely limited to these factors, UES may find it necessary to modify or amend its creditworthiness policies and guidelines after a 15 day notice period and require that present and future Transmission Customers fulfill any additional conditions contained in the modified Creditworthiness Guide. Transmission Customers will have 30 days after the notice period to cure any deficiency.

## FORM LETTER OF CREDIT

Bank

(address)

# IRREVOCABLE STANDBY LETTER OF CREDIT

DATE: \_\_\_\_\_

AMOUNT U.S. \$\_\_\_\_\_

## FOR INTERNAL IDENTIFICATION PURPOSES ONLY

Our Number:

Beneficiary:

Applicant:

Attn: At the request of:

\_\_\_\_\_

Ref:\_\_\_\_\_

LADIES AND GENTLEMEN:

WE HEREBY ESTABLISH THIS IRREVOCABLE, AND UNCONDITIONAL, EXCEPT AS STATED HEREIN, LETTER OF CREDIT NUMBER \_\_\_\_\_\_ (LETTER OF CREDIT), BY ORDER OF, FOR THE ACCOUNT OF, AND ON BEHALF OF [CUSTOMER NAME] (ACCOUNT PARTY) IN FAVOR OF UNITIL ENERGY SYSTEMS, INC. (BENEFICIARY) FOR DRAWINGS, IN ONE OF MORE DRAFTS, UP TO AN AGGREGATE AMOUNT NOT EXCEEDING U.S. \$\_\_\_\_\_\_ EFFECTIVE IMMEDIATELY. THE TERM 'BENEFICIARY' INCLUDES ANY SUCCESSOR OF THE NAMED BENEFICIARY.

THIS LETTER OF CREDIT CANNOT BE AMENDED, MODIFIED OR REVOKED WITHOUT THE PRIOR WRITTEN CONSENT OF BOTH THE BANK AND THE BENEFICIARY. THE BENEFICIARY SHALL NOT BE DEEMED TO HAVE WAIVED ANY RIGHTS UNDER THIS LETTER OF CREDIT, UNLESS AN OFFICER OF THE BENEFICIARY SHALL HAVE SIGNED A WRITTEN WAIVER EXPRESSLY REFERENCING THE RIGHT TO BE WAIVED. NO SUCH WAIVER SHALL BE EFFECTIVE AS TO ANY TRANSACTION THAT OCCURS SUBSEQUENT TO THE DATE OF THE WAIVER, NOT AS TO ANY CONTINUANCE OF A BREACH AFTER THE WAIVER.

WE HEREBY UNDERTAKE TO PROMPTLY HONOR YOUR DRAFT(S) DRAWN ON US, INDICATING OUR LETTER OF CREDIT NUMBER \_\_\_\_\_\_ IS ISSUED, PRESENTABLE AND PAYABLE AND WE GUARANTY TO THE DRAWERS, ENDORSERS, AND BONA FIDE HOLDERS OF THIS LETTER OF CREDIT, THAT DRAFTS UNDER AND IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT WILL BE HONORED. THIS LETTER OF CREDIT MAY NOT BE TRANSFERRED OR ASSIGNED BY US.

SUBJECT TO THE EXPRESS TERMS AND CONDITIONS HEREIN, FUNDS UNDER THIS LETTER OF CREDIT ARE AVAILABLE TO YOU BY PRESENTATION AT OUR OFFICES LOCATED AT [\_\_\_\_\_] OF BENEFICIARY'S DRAWING CERTIFICATE ISSUED SUBSTANTIALLY IN THE FORM OF ANNEX 1 ATTACHED HERETO AND WHICH FORMS AN INTEGRAL PART HEREOF, DULY COMPLETED AND PURPORTEDLY BEARING THE ORIGINAL SIGNATURE OF AN OFFICER OF THE BENEFICIARY. PRRESENTATION OF ANY DRAWING CERTIFICATE UNDER THIS LETTER OF CREDIT MAY BE MADE IN PERSON TO US OR MAY BE SENT TO US BY TELEX TO [\_\_\_\_] OR BY FACSIMILE TRANSMISSION TO FACSIMILE TELEPHONE NUMBER [\_\_\_\_\_].

ALL COMMISSIONS AND CHARGES WILL BE BORNE BY THE ACCOUNT PARTY. IF DOCUMENTS, IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT, ARE RECEIVED BEFORE 10:00 AM (EASTERN TIME) ON A BUSINESS DAY, PAYMENT WILL BE EFFECTED ON OR BEFORE 5:00 PM (EASTERN TIME) ON THE NEXT BUSINESS DAY. IF DOCUMENTS, IN COMPLIANCE WITH THE TERMS OF THIS LETTER OF CREDIT ARE RECEIVED AFTER 10:00 AM ON A BUSINESS DAY, PAYMENT WILL BE EFFECTED ON OR BEFORE 5:00 PM ON THE SECOND BUSINESS DAY FOLLOWING SUCH DATE OF RECEIPT.

EXCEPT AS EXPRESSLY STATED HEREIN, THIS UNDERTAKING IS NOT SUBJECT TO ANY AGREEMENT, CONDITION OR QUALIFICATION. THIS LETTER OF CREDIT DOES NOT INCORPORATE, AND SHALL NOT BE DEEMED MODIFIED OR AMENDED BY REFERENCE TO ANY DOCUMENT, INSTRUMENT OR AGREEMENT (A) THAT IS REFERRED TO HEREIN (EXCEPT FOR THE UNIFORM CUSTOMS, AS DEFINED BELOW), OR (B) IN WHICH THIS LETTER OF CREDIT IS REFERRED TO OR TO WHICH THIS LETTER OF CREDIT RELATES.

OUR OBLIGATION UNDER THIS LETTER OF CREDIT SHALL BE OUR INDIVIDUAL OBLIGATION AND IS IN NO WAY CONTINGENT UPON THE REIMBURSEMENT WITH RESPECT THERETO, OR UPON OUR ABILITY TO PERFECT ANY LIEN, SECURITY INTEREST OR ANY OTHER REIMBURSEMENT.

THIS LETTER OF CREDIT EXPIRES WITH OUR CLOSE OF BUSINESS ON [364 days from effective date]; HOWEVER, IT IS A CONDITION OF THIS LETTER OF CREDIT THAT IT SHALL BE DEEMED AUTOMATICALLY EXTENDED WITHOUT AMENDMENT FOR 364 DAYS FROM THE PRESENT OR ANY FUTURE EXPIRATION DATE HEREOF, UNLESS AT LEAST SIXTY (60) DAYS BEFORE ANY SUCH EXPIRATION DATE WE NOTIFY YOU BY REGISTERED MAIL ADDRESSED TO: [address of beneficiary, ATTN: \_\_\_\_\_], THAT WE ELECT NOT TO RENEW THIS LETTER FOR SUCH ADDITIONAL PERIOD.

THIS LETTER OF CREDIT IS SUBJECT TO THE UNIFORM CUSTOMS AND PRACTICE FOR DOCUMENTARY CREDITS (1993 REVISION) INTERNATIONAL CHAMBER OF COMMERCE, PUBLICATION NO. 500. IF THIS LETTER OF CREDIT EXPIRES DURING THE INTERRUPTION OF BUSINESS AS DESCRIBED IN ARTICLE 17 THEREOF WE HEREBY SPECIFICALLY AGREE

TO EFFECT PAYMENT IF THE LETTER OF CREDIT IS DRAWN AGAINST WITHIN 30 DAYS AFTER THE RESUMPTION OF BUSINESS.

# ANNEX 1 TO [BANKNAME] IRREVOCABLE LETTER OF CREDIT NO.

[INSERT DATE] [BANK NAME] [ATTENTION] [BANK ADDRESS 1] [BANK ADDRESS 2]

LADIES AND GENTLEMEN:

THE UNDERSIGNED \_\_\_\_\_\_, A DULY ELECTED AND ACTING OFFICER OF UNITIL ENERGY SYSTEMS, INC. (THE "BENEFICIARY"), HEREBY CERTIFIES TO [INSERT BANK NAME] (THE "BANK"), WITH REFERENCE TO IRREVOCABLE LETTER OF CREDIT NO. \_\_\_\_\_ DATED \_\_\_\_\_, ISSUED BY THE BANK IN FAVOR OF THE BENEFICIARY (THE "LETTER OF CREDIT"), AS FOLLOWS AS OF THE DATE THEREOF:

1. THE BENEFICIARY IS A PARTY TO THAT CERTAIN [INTERCONNECTION AGREEMENT], EFFECTIVE \_\_\_\_\_, BETWEEN THE BENEFICIARY AND [CUSTOMER NAME] (THE "AGREEMENT").

2. BENEFICIARY IS MAKING A DRAWING UNDER THE LETTER OF CREDIT IN THE AMOUNT OF \$\_\_\_\_\_ BECAUSE [CHECK APPLICABLE PROVISION]:

[\_\_\_\_] (A) THERE CURRENTLY EXIST ONE OR MORE UNPAID AMOUNTS WHICH [CUSTOMER NAME] IS OBLIGATED TO PAY PURSUANT TO THE TERMS OF THE AGREEMENT.

[\_\_\_\_] (B) THE BENEFICIARY HAS RECEIVED NOTICE FROM THE BANK OF ITS INTENTION NOT TO RENEW THE LETTER OF CREDIT BEYOND THE CURRENT EXPIRATION DATE AND [CUSTOMER NAME] HAS FAILED, PRIOR TO THE CLOSE OF BUSINESS ON

\_\_\_\_\_ [INSERT DATE WHICH IS NOT MORE THAN THIRTY (30) DAYS BEFORE THE PRESENT EXPIRATION DATE], TO DELIVER TO BENEFICIARY A REPLACEMENT LETTER OF CREDIT SATISFYING THE REQUIREMENTS OF THE AGREEMENT. 4. FUNDS PAID PURSUANT TO THE PROVISIONS OF THE LETTER OF CREDIT SHALL BE WIRE TRANSFERRED TO THE BENEFICIARY IN ACCORDANCE WITH THE FOLLOWING INSTRUCTIONS:

UNLESS OTHERWISE PROVIDED HEREIN, CAPITALIZED TERMS WHICH ARE USED AND NOT DEFINED HEREIN SHALL HAVE THE MEANING GIVEN EACH SUCH TERM IN THE LETTER OF CREDIT.

IN WITNESS WHEREOF, THIS CERTIFICATE HAS BEEN DULY EXECUTED AND DELIVERED ON BEHALF OF THE BENEFICIARY BY ITS DULY ELECTED AND ACTING OFFICER AS OF THIS \_\_\_\_\_ DAY OF \_\_\_\_\_.

BENEFICIARY: UNITIL ENERGY SYSTEMS, INC.

NAME:

TITLE: