

# RTO West Transmission Pricing WG

## Working Document

8/20/00

### 1.1 Principles and Objectives of Transmission Pricing WG

- Contract for use and control of transmission facilities
- Compensate the Owners of the facilities for use and control
- Provide a consistent and unbiased usage of the facilities by all parties.
- Develop a pricing structure that minimizes cost shifts among companies and end users
- Develop transmission facilities access fees that are not pancaked and in the absence of congestion, paying a Transmission Access Rate will provide an eligible user with transmission access anywhere within RTO West.

### 1.2 Issues Assigned to Transmission Pricing WG By RRG

The WG was initiated in May 2000 and it was requested to address a list of issues. Below is the original list of issues and the status of the WG on the issue.

- **Recovery of Fixed Transmission Cost**
  - Recommendation and Open Issues
- **Transmission Losses**
  - CM WG is addressing this issue
- **Price Reciprocity and Other Seams Issues**
  - Export Recommendation
- **Transmission Planning – Pricing Mechanism**
  - Joint subgroup working with Planning and CM WGs
- **RTO tariffs**
  - Support as required by Legal
- **Firm Transmission Rights (FTRs)**
  - Support the Legal and Congestion Management WGs as required
    - **Honoring, Converting and Suspension of Existing Transmission Contracts**
  - Support the Legal and Congestion Management WGs as required

### 1.3 Additional Direction to Transmission Pricing WG

During the WG's data collection, analysis and debate, the RRG has provided direction to converge the WG toward a recommendation. Two such directions have been given:

June 28 RRG Meeting – Directed to WG to utilize Company Rate as the beginning rate. The concept was the Company Rates provided the minimum shift in rates among PTOs and Customers.

Area, RTO Wide, etc. rate designs were eliminated from the WG's starting state but remained as viable options as the rate migrated to the ultimate end state. The WG was working through various end state options when an "option 6 proposal" was given during the August 3 RRG Meeting to the WG for evaluation.

August 3 Option 6 Proposal - The direction from the RRG was to set aside the "end-state" proposals being worked and evaluate the Option 6 Proposal that covered a number of open issues including end state, facilities and export. The latest annotated Option 6 Proposal is located in the attachments portion of this document.

## 2.0 Transmission Access Rate

### 2.1 Company Rate

- Transmission Access Rate (Referred as Company Rate for remaining discussion) = Company Rate + Portion of RTO uplift
- Company Rate is Load Based
- License plate rate of the company that provides transmission service to the customer (i.e., the company the customer pays for transmission service)
- Each PTO may file its own Company Rate billing determinant, some will use 12CP and other can use 1CP
- RTO Uplift is addressed in section 5.0 of this document

### 2.2 Duration

- Company Rate is fixed for X years, after which RTO revisits rate design
  - *Open Issue – How long is X?*

## 3.0 Transfer Payment

To understand the nature of transfer payments, the WG initiated the collection of data in June 2000. After the June 29 RRG direction to focus on Company Rates, the WG data collection was redirected to collect “paid to” and “received from” information that would establish the basis for the discussion of Transfer Payments.

Data collection request was sent to PTO and interested parties in joining as members of the RTO. To date most entities have provided data and the data providing entities are now trying to reconcile or true up the data. A working copy of the spreadsheet is provided with the understanding it is representative of the magnitude of payments in each category of “paid to” and “received from”. Also please note, due to the short time to collect, approximations may have been made. It is recommended the exact numbers be firmed up after the contract review has been completed that will define which contracts are to be suspended. Initial meeting on the contract review is being held on 8/21/00.

### 3.1 Components

RTO West proposes to adopt load based access charges to recover the fixed costs of the transmission system. In addition, the access charges will be Company Rates, designed to avoid cost shifts among the Participating Transmission Owners. Currently, PTOs in RTO West do a significant amount of business over each other's transmission systems.

Basic principle: Each Company currently uses its own transmission and the transmission systems of other PTOs to serve its loads in a reliable and economic fashion. This includes transmitting remote resources to its loads, making system purchases, making economy purchases, replacing resources out for maintenance other reasons, etc. In many cases a single transaction may serve multiple such purposes. After RTO formation, each PTO will use the combined RTO system for the same purposes. Therefore, in order to avoid cost shifts, all the transmission costs being currently paid to serve each PTO's loads should be determined and used to form the basis of the Company rates. While usage patterns in the future will inevitably change, it is pure speculation whether a particular PTO will make more or less use of other PTOs' systems. Therefore, short of leaving the current pancaked rates in place, there is no good way to reflect such changes in usage patterns in company rate calculations.

For example, transfer charges between companies are needed in order to replace current wheeling contracts. In addition, the current transmission purchaser receives FTRs to equivalent to its wheeling rights.

The following are the components of the transfer payments.

### 3.1.1 Long term Contracts

Long-term contracts consist of (a) wheeling to export, (b) wheeling between RTO members, and (c) long-term bundled power sale with imputed transmission access fees. Each type of long-term contract is covered below.

#### A. Long term Contracts (Wheeling to Export) Transfer Payment

Recommendation:

For the duration of Long Term Contracts that would have been active, a transfer payment (and corresponding FTRs) is made to compensate the party for the suspension of the contract. As the duration period of the contract expires (case where there is no rollover or the roll over clauses end), the transfer payment and corresponding FTRs would cease. In the "option 6" proposal the revenue lost from this transfer payment would be offset by the sale of FTRs on released transfer capacity used by the former contract.

#### B. Long term Wheeling (PTO to PTO member) Transfer Payment

Long-term wheeling contracts are associated with (1) wheeling to load and (2) wheeling across the system. All active long-term wheeling contracts have a completion date (some with rollover rights) and associated allocation of FTRs while the contract is active. The WG's strawpositions are:

(1) Wheeling to Load

There is general agreement that if the wheeling agreement is needed by purchaser to serve their loads, then the transfer payment and FTR allocation should continue. An example would be a long-term firm wheeling agreement to wheel a company's remote resources to its loads.

Recommendation: Continue the transfer payment for all long-term firm wheeling agreements to load and after the contract expires the load will retain its FTRs allocation.

(2) Wheeling across the system

There is not general agreement on transfer payments for wheeling across a PTO's system.

Alternative 1: Continue the transfer charge after the contract expires and continue the prior FTR allocation (last part is inconsistent with direction of CM WG but necessary to offset the effects of the transfer payment).

Failure to do this would cause a cost shift, because the PTO providing transmission service would lose the revenue associated with the transfer payment, increasing its company rate and the costs paid by loads paying its company rate. Of course, the PTO would regain the FTRs, if any, associated with the expiring wheeling contract. However, it would be a huge coincidence revenues derived from the sale of these FTRs matched the lost transfer payment.

This alternative also has the advantage of not requiring the PTOs or the RTO to determine the use of the expiring contract and whether the purchaser would be "transmission sufficient" without it. Such a transmission sufficiency determination would be fraught with issues and assumptions.

Alternative 2: Continue the transfer charge after the contract expires only if the receiving PTO is transmission dependent on the providing PTO. The answer as to transfer charges may be obvious from a review of the particular contract.

Recommendation: Address this issue after the contracts are reviewed. Initial meeting planned for 8/21/00.

Open issue – should FTRs be associated with a transfer payment, TXPR WG says yes, CM WG says no.

### C. Long-term Bundled Power Sale with Imputed Transmission Access Fees

Unlike wheeling agreements, bundled power sales contracts between PTOs need not be replaced by transfer payments and FTRs, at least for the period that the quantity of the sale does not change. The contract is not suspended and the seller can functionalize the revenues between power and transmission, using the transmission related revenues to reduce its Company rate.

Alternative 1<sup>1</sup>: As a bundled power sale between PTOs ramps down or expires, the transmission component of that sale should be replaced with a transfer payment and FTRs, as with a long term wheeling agreement.

As with wheeling agreements, this is the only treatment consistent with load based access charges and the goal of no cost shifts, and it does not require any determination of transmission sufficiency of the purchaser without the bundled sale.

Alternative 2<sup>2</sup>: Long term bundled contracts are agreements between the merchant and the transmission business units of a PTO. Upon termination of long-term power sales, should a transfer charge be paid by the purchaser of power to the seller of power, to recover so-called "imputed" transmission costs allocated by the seller's transmission function to the seller's power function in connection with such bundled sale?

No, unless the power seller can demonstrate that without an RTO, upon expiration of the power sale, the purchaser would have needed to purchase replacement transmission services from the original seller of the power.

The guiding principle in answering this question is that during the Company Rate period, we should establish transfer charges that reflect as closely as feasible the payments that the various participating transmission owners would make to each other if there were no RTO. In other words, we should seek to avoid cost shifts as a result of creating the RTO. Today, various transmission owners sell power from system to system to each other. The power is sold at a delivered price, reflecting the market price at the delivery point.

Absent an RTO, at the end of the term of such power sale, the purchaser either would or would not purchase more power from the original power seller, depending on the price offered. If the power were purchased from any other entity, the original power seller would not be receiving any transmission payment from the former purchaser. Therefore, the original seller is not entitled to an RTO transfer charge for such transmission upon expiration of its power sale.

The one exception exists if the purchaser needed to use the original seller's transmission system, regardless of whether the original seller or a replacement seller made the power sale. In such case, without an RTO the original seller would continue to receive transmission revenues after the term of its power contract, and thus if the transfer payment is to be comparable to the pre-RTO payments, an imputed transmission charge is appropriate.

One argument I have heard for imposing a transfer charge for "imputed" transmission upon expiration of bundled power sales is ease of administration: That is, by imputing costs to all bundled sales without analysis, the process of setting transfer charges is made easier. Because of the fact that sales of power to load often goes through many intermediary power marketers, attempting to compute such imputed costs actually would be very difficult. More important, however, no transmission owner could justify potentially paying millions of dollars in unjustified transfer charges upon the expiration of bundled power contracts, merely in order to avoid a couple of hours of analysis.

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<sup>1</sup> Position Paper by Dennis Metcalf is provided in the attachments

<sup>2</sup> Position paper by Marcus Woods is provided in the attachments

### 3.1.2 Short-term Firm and Non-Firm

Short-term contracts consist of (a) wheeling to export or wheeling between RTO members, and (b) short-term bundled power sale with imputed transmission access fees. Each type of short-term contract is covered below.

Since Order 888/889 the usage of short-term contracts has increased. Revenues or expenses from these contracts provide an offset to the revenue requirements factored into existing company rates.

#### **A. Short-term Firm and Non-Firm**

Recommendation: The PTOs shall pay as components of their annual transfer payments, amounts comparable to their typical payments for short-term firm and for non-firm service, both within the RTO area and for exports. To the extent FTR revenues for non-exempt FTRs are available to each PTO receiving such transfer payment component, such non-exempt (unencumbered) FTR revenues will be applied first to reduce or eliminate the transfer payments associated with such historic short-term firm and non-firm service

Open issues:

- Duration of the Transfer Payment
- Need to resolve the IPPs (sometimes labeled as the Montana Problem) issue before a short-term transfer payments can be finalized – see briefing paper located in the attachments.
- Is there a need to investigate non – load based assess or uplift charges as an alternative revenue stream to offset transfer payments?
  - See Montana Briefing paper for alternates proposed but not addressed by the WG
  - Evaluate Puget / Sierra Power / NP non firm proposal for FTR uplift on non-exempt or unencumbered FTRs (proposal distributed but not addressed by WG)

#### **B. Short-Term and Non Firm Imputed Transmission component of Power Contracts**

When power is sold, and priced at the point of delivery to the recipient system, bundled into that price is, arguably, a contribution to the cost of the seller's transmission system. In fact, FERC requires that when a utility sells power at wholesale from within its system to another system, its transmission function should charge its merchant function for transmission service at its tariff rate to deliver the power from internal sources to the company boundary. This has been viewed (e.g. in the IndeGO model) as a transmission cost carried by the buyer of the power, because it was presumed that the seller recovered the cost in the bundled price. It has been proposed that to mitigate cost shifting this cost responsibility should continue to attach to the buyer of the power by imputing a transfer payment in the company rates reflecting the historical level of contribution.

The point at issue is whether it is appropriate to require transfer payments for internal transmission costs bundled into short-term firm and non-firm (STNF) power sales. Please reference the position paper by Chuck Durick included in the attachments.

### 3.2 Constancy of Transfer Payment

The document entitled Bullet Points on Resolution of RTO Pricing Issues (option 6) states that "During the Company Rate period (i.e. 10 years), the transfer charges will remain constant (*over the 10 year period*), except that any transfer charges tied to a specific FTR shall expire at such time as the related FTR's expire. Other exceptions to a constant transfer charge may be appropriate on a case by case basis." (*Parenthetical added*)

The company rate is based on the individual companies' revenue requirements less transfer payments. Transfer payments are payments from one PTO to another PTO to reflect the existing cost of wheeling across their respective transmission systems. Transfer payments are subtracted for the company rate in order to minimize cost shifts. If transfer payments were not included in the calculation of the company rate, then those utilities that have large wheeling revenues would have higher rates under the RTO than they have at present.

Three approaches to transfer payments have been discussed by the pricing group:

1. Assume constant transfer payments over the company rate period
2. Allow transfer payments to change to reflect explicit price changes provided for in existing contracts
3. Allow transfer payments to change to reflect increases in company transmission rates over the company rate period

Briefing paper by Geoff Carr is provided in the attachments

#### **4.0 Facilities Inclusion in RTO**

Company Rate avoids the need for a uniform facilities decision as it relates to fixed assets cost recovery.

##### Recommendation:

- o Facilities that must be included in the RTO are those needed to:
  - o Support main grid transfer capability
  - o Support Order 2000 functions
- o Additional Facilities that are not required but may be included
- o Other facilities accepted in Company Rate, PTO may change decision in the future
- o When Company Rate ends, RTO, PTOs and others will need to revisit issue of facilities inclusion, and PTOs will need to make a FERC filing regarding allocation of costs and resulting decisions on included facilities.

#### **5.0 RTO Uplift Allocation**

The WG started the discussion on the allocation method for the RTO uplift. The uplift contains components such as:

- a. RTO facilities, staffing and related expenses.
- b. Cost of congestion cost that is socialized
- c. Curtailment for outages

The following alternatives were identified and the WG plans to evaluate and make a recommendation.

1. 12 CP Company Load divided by total RTO 12 CP Load
2. Actual Monthly Company Load divided by the RTO Monthly Load (CM Cost allocation)
3. Trailing 12 months company load divided by RTO trailing 12 months load
4. Pro rata total uplift cost divided by total MWH schedule
5. Pro rata total uplift cost divided by the total number of FTRs (Unencumbered FTRs or all FTRs)

#### **6.0 Implementation Provisions within Company Rates**

This section addresses questions that have arisen during the RRG or WG meetings.

##### **6.1 Island Transmission Access Rate**

IndeGO proposal had a concept called the "Island Rate" transmission access rate. This rate was for Utilities embedded with the RTO system that were not part of the RTO and periodically need to buy or sell power. Island systems typically have the necessary generation to cover their customers' loads.

### **Recommendation:**

Island Rate is not required

All PTOs who encompass islands or serve islands need to have company rate that includes a partial transmission requirements service (i.e., handled similar to existing OATT, but converted to RTO service)

*Open Lower Level Questions that need to be addressed:*

- *How do you create a partial TCA to permit a non-PTO to turn over some transmission facilities to the RTO?*
- *If a facility is necessary for RTO operation, but not owned by a PTO, then how do you handle this facility?*

## **6.2 Export Fixed Cost Recovery**

### **Recommendation:**

- The PTOs, and all other entities currently receiving or having a reservation for firm export transmission service, shall pay transfer payment amounts equivalent to the currently-applicable charges for such firm service, in exchange for FTRs equivalent to their current firm rights. Such transfer payments shall continue for the applicable FTR allocation periods.
- The PTOs shall pay as components of their annual transfer payments, amounts comparable to their typical payments for short-term firm and for non-firm service, both within the RTO area and for exports. To the extent FTR revenues for non-exempt FTRs are available to each PTO receiving such transfer payment component, such non-exempt FTR revenues will be applied first to reduce or eliminate the transfer payments associated with such historic short-term firm and non-firm service.
- The RTO shall auction export FTRs, but shall impose no volumetric export charge.
- Revenues from the auction of export FTRs shall be credited against the Company Rates of the PTOs whose systems create the flowpath capacity, in the same manner as finally agreed for the auctioning of other FTRs.

The WG, prior to the “option 6” proposal, had a smaller group interested in pursuing a volumetric charge for exports. This debate was placed on hold as long as “option 6” is being evaluated.

## **6.3 GTA**

- GTA customers shall pay the Company Rate of the PTO now serving such GTA customer. For example, GTA preference customers of BPA shall pay the BPA Company Rate.
  - *Open Issues: What happens when GTA expires? (Whose Company Rate, how to handle Transfer Payment, who gets FTRs on intermediate system, etc.)*

## **6.4 Question on Application of Company Rate**

Several questions arose during the presentation on “option 6” at the RRG and within the WG. Each question is raised below with the recommendation or note defining it is still open.

- **What is the applicable Company Rate when Load takes service from 2 or More PTOs**

*Remains an Open Issue*

**What is Company Rate for a New Load and how is Load Growth covered?**

Recommendation:

- o New load pays the Company Rate of the PTO (i.e., company the customer pays for transmission service)
- o Load growth - load continues to pay the Company Rate of the company that provides transmission service to the customer (i.e., the company the customer pays for transmission service) (Cost allocation associated with providing facilities for load growth is covered by Transmission Planning WG.

**What is the Company Rate for new Utility that was a Load and can a Load switch PTOs and get a different Company Rate?**

Recommendation:

New utility would pay the PTO company rate that is providing transmission service.

Permit the switch and use the Company Rate of the new PTO. The RTO does not care if a load switches transmission service supplier as long as all processes required to switch have been followed.

The WG re-evaluated its position after the previously RRG Meeting and recommends the position above. In the reconsideration, the effect on Company rate is insignificant, companies are customer focused with emphasis on retaining customers, and the costs are typically high to make the switch.

## **7.0 Transmission Losses**

Open issue: Congestion Management Work Group is addressing Transmission Losses

End of Document

## **Attachments**

**RTO West**  
**Pricing Structure**  
**RRG Pricing Proposal “Option 6”<sup>3</sup>**  
**Version 4**  
**As of August 9, 2000**

1. Transition from Company Rates to RTO end state rates:
  - Company Rates will remain in effect for a fixed period of time (such as ten years), at which time the entire rate design may be revisited and potentially may be changed by the RTO.
  - Observation: PTO rate proceedings will determine what a PTO’s loads will pay for RTO service.
    - Issue: How long will Company Rates remain in effect?
    - Issue: Some parties still concerned about jump ball.
    - Issue: What is the design of the RTO uplift and how will it be treated?
  - During the Company Rate period, the cost of all transmission replacements will remain in each PTO’s Company Rates.
  - During the Company Rate period, the transfer payments will remain constant, except that any transfer payments tied to specific FTRs shall expire at such time as the related FTRs expire. Other exceptions to a constant transfer payment may be appropriate on a case-by-case basis.
    - Issue: How to handle FTRs as underlying contracts expire: e.g., will the initial holder have a right to FTRs in perpetuity or will the duration of its right be coextensive with the term of the underlying contract; will transfer payments change? [Input needed from Congestion Management Work Group]
    - What does “constant” mean? [Input needed from Pricing Work Group]
      - If the underlying costs of the service being provided change over time, should that alter the cost-based streams of transfer payments that are intended to be netted out?
      - Should changing costs be handled through a different mechanism than transfer payments?
      - Issue: How will O&M be treated?
      - How should contract expiration and conversion be handled?
  - During the Company Rate period, transmission upgrades and new transmission facilities constructed by a PTO will remain in the Company Rate of the PTO owning such facilities, except on the request of a sponsoring PTO, the RTO may determine that all or a portion of the costs of such facilities shall be allocated to other PTOs proportional to the relative benefit the RTO finds the loads of such other PTOs receive from the upgrades or new facilities.
  - Observation: This approach does not impact the ability of a PTO to directly assign the costs of facilities and the RTO will not be involved in such decisions.
  - Observation: A process will be developed to address the allocation of benefits and costs. [Input needed from Planning Work Group]
    - Issue: Allocation of benefits and costs (who decides, methodology), including consideration of whether the costs of non-transmission solutions should also be allocated to PTOs proportional to the relative benefit to their loads [Input needed from Planning Work Group, Congestion Management Work Group]
    - Issue: Treatment of FTRs (for example, will parties be allocated FTRs or revenues from auctions to purchase FTRs) [Input from Congestion Management Work Group]
    - Issue: Interconnections (standards, who pays for necessary upgrades, and whether negative impacts to transfer capability should be mitigated by interconnecting party) [Input from Planning Work Group]
    - Issue: Will current line extension policies be carried forward? YES

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<sup>3</sup> Bonneville, Idaho Power, and PacifiCorp originally authored this proposal. It was discussed with the RRG on August 3 and, while the RRG has not agreed to this as the final approach, they have instructed the Pricing Work Group to focus their efforts on resolving the related pricing issues. This version (Version 4) sets out issues identified by the RRG and the Pricing Work Group. Where work group input is needed, the document identifies the responsible work group (if a work group is not identified, the issue will be resolved by the RRG).

- GTA customers shall pay the Company Rate of the PTO now serving such GTA customer. For example, GTA preference customers of BPA shall pay the BPA Company Rate.
  - Issue: Not all parties agree that the current treatment of GTAs should be preserved indefinitely
- The cost of new transmission facilities constructed to relieve transmission system congestion shall not be included in the Company Rates.
  - Issue: Are there instances where it would be appropriate to include these costs in Company Rates, for example, if the RTO decides to clear congestion on a non-commercial path (no congestion market) through expansion? [Input from joint Pricing, Planning, and Congestion Management Work Groups on Market-Driven Expansion Mechanism]

**2. Transmission facilities that may be included as RTO facilities in the Transmission Control Agreement (and in Company Rates during the Company Rate period):**

- Each PTO must include as RTO Facilities all transmission facilities that FERC finds are needed to support the RTO's transfer capabilities and the Order 2000 RTO functions.
- Observation: Individual PTOs will decide what facilities are required for this purpose. If a party disagrees with a PTO's decision, they can challenge such decision at the time the RTO/PTO files with FERC.
  - Issue: Does Order 2000 require a PTO to turn over all of its transmission facilities to the RTO, or only those transmission facilities that FERC finds are needed to support the RTO's transfer capabilities and Order 2000 functions?
  - Issue: What transmission facilities are needed to support the RTO's transfer capability and Order 2000 functions?
  - Issue: Treatment of non-jurisdictional PTOs -- will the same "facilities inclusion standards" apply? (Should non-jurisdictional PTOs have greater discretion with respect to deciding whether to transfer transmission facilities to the RTO?)
- In addition, each PTO also may include, and at any time may remove, any other transmission facilities that meet RTO standards and that FERC does not require, but will allow, to be included as RTO facilities.
  - Issue: Role of RTO in decision to remove facilities (some parties believe that the RTO should be an active participant)
- The right to add or remove such additional transmission facilities shall continue through the term of the Transmission Control Agreement, subject to the FERC's right to change from time to time its definition of the facilities that must be included as RTO Facilities.
- If the RTO at or after the end of the Company Rate period elects to change the RTO rate design, (i) any affected party may argue what the proper allocation of specific facility costs should be and (ii) any PTO may add or remove as RTO Facilities, any transmission facilities that the FERC allows but does not require be included as RTO facilities.
- Regardless of the decision as to which transmission facilities shall be included as RTO facilities, payment of the full transfer payment shall assure continuation by the RTO of service provided by PTOs to loads of other PTOs pursuant to pre-RTO transmission agreements (such as GTAs), including service over facilities not included as RTO facilities, if any.
  - Issue: Some parties believe this issue is not limited to GTAs and that continuation of service should be assured to all customers (including future customers)

**3. Treatment of RTO exports:**

- The PTOs, and all other entities currently receiving or having a reservation for firm export transmission service, shall pay transfer payment amounts equivalent to the currently-applicable charges for such firm service, in exchange for FTRs equivalent to their current firm rights. Such transfer payments shall continue for the applicable FTR allocation periods.
  - Issue: How is money from "other entities" collected? Other entities include marketers, IPPs, and utilities that are not affiliated with PTOs. [Input needed from Pricing Work Group]
  - Issue: Does this rule apply to firm service over paths within the RTO to reach an export point as well as firm service to reach a third party within the RTO? [Input needed from Pricing Work Group]
- The PTOs shall pay as components of their annual transfer payments, amounts comparable to their typical payments for short-term firm and for non-firm service, both within the RTO area and for exports. To the extent FTR revenues for non-exempt FTRs are available to each PTO receiving such transfer payment component,

such non-exempt FTR revenues will be applied first to reduce or eliminate the transfer payments associated with such historic short-term firm and non-firm service.

- Issue: What is the duration of the transfer payments of short term and non-firm transactions? [Input needed from Pricing Work Group]
- Issue: What is the basis for determining the (stipulated) short-term firm and non-firm revenues: historical? With or without adjustments. [Input needed from Pricing Work Group]
  - The RTO shall auction export FTRs, but shall impose no volumetric export charge.
  - Revenues from the auction of export FTRs shall be credited against the Company Rates of the PTOs whose systems create the flowpath capacity, in the same manner as finally agreed for the auctioning of other FTRs.
- Issue: What FTRs are associated with exports and how are they distributed to the PTOs? [Input needed from Congestion Management Work Group]
- A number of parties expressed a need for further evaluation of the export component of this proposal

4. Major unresolved follow-on issues:

- How should imputed transmission costs bundled into firm and non-firm power sales be allocated?
  - Issue: Does “allocate” include two steps – (1) determining costs and then (2) allocating costs? [Input needed from Pricing Work Group]
  - Issue: What happens if the parties to the sales agreement prefer different methods of allocation? [Input needed from Pricing Work Group]
- How should lost revenues from third party short-term firm and non-firm wheeling be handled?
  - Issue: How will revenues from FTRs be collected and distributed? [Input needed from Pricing Work Group]
- Can BPA eliminate the need for an Island rate, by providing for net load service in its Company Rate? Do other PTOs need a similar net load service?
- Logistics of Company Rate [Input needed from Pricing Work Group]:
  - Definition
  - What Company Rate does new load pay?
  - What Company Rate does a new utility that was previously a load pay?
  - What Company Rate does existing load with multiple transmission providers’ pay?
  - Can existing load bypass its current transmission provider to obtain a lower company rate? (Painting loads)
  - Treatment of losses
- Treatment of Cost Shifts Between Transmission Customers (many parties believe that the “no cost shift” principle underlying this proposal should be extended to eliminating/minimizing cost shifts between transmission customers as well as between PTOs.)

## **Imputed Transfer Payments For Short Term Firm and Non-Firm Bundled Power Sales (by C. Durick)**

### ***Definition***

When power is sold, and priced at the point of delivery to the recipient system, bundled into that price is, arguably, a contribution to the cost of the seller's transmission system. In fact, FERC requires that when a utility sells power at wholesale from within its system to another system, its transmission function should charge its merchant function for transmission service at its tariff rate to deliver the power from internal sources to the company boundary. This has been viewed (e.g. in the IndeGO model) as a transmission cost carried by the buyer of the power, because it was presumed that the seller recovered the cost in the bundled price. It has been proposed that to mitigate cost shifting this cost responsibility should continue to attach to the buyer of the power by imputing a transfer payment in the company rates reflecting the historical level of contribution.

### ***Dispute***

The point at issue is whether it is appropriate to require transfer payments for internal transmission costs bundled into short-term firm and non-firm (STNF) power sales. Long-term sales do not seem to have the same controversy and a transfer payment is anticipated. The two positions on STNF sales are:

Yes – Impute a transfer payment that represents the transmission contribution related to a typical historical level of STNF bundled power sales. This should be done to the extent that the payment can be tracked through to the load ultimately consuming the power. Similar to non-firm wheeling transfer payments, this payment would be offset with non-exempt FTR auction revenue. There would be no transfer charge to marketers who are not PTOs or whose purchases cannot be tracked to load.

No – We should not attempt to impute any transfer payment from STNF bundled power sales.

### ***Arguments for Imputing Transfer Payment***

Today, a contribution to the embedded cost of the transmitting system is collected even on short-term transactions. Regardless of economic efficiency, FERC requires it. This is a cost that the buyers of power have always been carrying in their bundled price payments. The parties selling power would not be doing so at a price that fails to recover their costs.

In the absence of an RTO this short-term collection of embedded costs would continue. However, the RTO model of recovering embedded cost through a load based access charge eliminates any transmission payment based on short-term transactions (in the absence of congestion). It therefore produces a cost shift to the sellers if that responsibility is totally removed from the buyers.

For some utilities a significant amount of money may be in play.

There is no reason to expect the volume of power purchases to decline in future. In some cases present STNF levels may reflect long term situations of supply sufficiency or price differential that will certainly compel continuation of purchases in some form or another. If anything, the volume of these short-term transactions is more likely to rise than to fall. This represents a continuing reliance on the transmission systems of traditionally selling utilities. Equity says that a transfer payment should be imposed to compensate for this reliance.

### ***Arguments for Not Imputing Transfer Payment***

The notion that a short-term buyer of power is somehow paying the seller's transmission cost is an unsound economic premise. Transmission costs are essentially fixed. Short-term sellers of power are today selling at market prices, not cost based prices. They will sell whenever their short term incremental costs are covered, often at prices that fail to fully recover their fixed costs such as owned transmission.

For equity to be served by a transfer payment requires the assumption that the post RTO price of STNF power will drop by an amount approximating the payment. If the price of power does not drop, then cost will have shifted from buyer to seller. This is because the buyer is making a transfer payment to the seller based on historical usage, but is still paying the same price for the power. Since this power price was presumed to be making a payment for transmission, the buyer is now paying for transmission twice. There is no reason to expect future power prices to go down because of dropping today's requirement to make internal payments for short-term transmission use. This transmission hitch is trivial compared to the other forces that will be pushing future power prices around. Short-term and non-firm transactions by their very essence lack a commitment to make long-term payments. The parties engaged in such transactions did so specifically to avoid a long-term commitment and it would be unreasonable to suddenly create such a commitment where none was intended.

Failing to charge power marketers whose purchases cannot be tracked to specific loads unduly discriminates against utilities and their affiliates. A utility merchant who has been buying power and reselling it at wholesale (just like any other marketer) would pay a transfer charge, but the unaffiliated marketer doing the same thing escapes. Two parties conducting essentially identical transactions are treated differently. The “leakage” effect of failing to charge unaffiliated marketers is very high and will create a substantial inequity. For example, over half of the Idaho Power sales for resale were to marketers or others who could not be tied to northwest loads.

The amount of power being resold at wholesale is extremely high. The volume and complexity of the STNF transactions would make it virtually impossible to determine how much power an integrated utility was buying on behalf of its native load needs versus what it was buying simply as a reselling merchant.

### ***Continuing Work***

In case it is decided that a transfer payment should be imputed on the basis of historical STNF power sales, some parties are working on various ways to try to track sales to load and calculate payments. In one approach, power-scheduling data is being looked at to see if the ultimate destination can be identified. In another approach, the net import/export energy balance of the PTO’s is being looked at as an indicator of a consistent reliance on power from other systems regardless of how many intermediaries were in between.

## TREATMENT OF LONG TERM CONTRACTS AND BUNDLED POWER SALES

By Dennis Metcalf

RTO West proposes to adopt load based access charges to recover the fixed costs of the transmission system. In addition, the access charges will be Company Rates, designed to avoid cost shifts among the Participating Transmission Owners. Currently, PTOs in RTO West do a significant amount of business over each other's transmission systems.

Basic principle: Each company currently uses its own transmission and the transmission systems of other PTOs to serve its loads in a reliable and economic fashion. This includes transmitting remote resources to its loads, making system purchases, making economy purchases, replacing resources out for maintenance other reasons, etc. In many cases a single transaction may serve multiple such purposes. After RTO formation, each PTO will use the combined RTO system for the same purposes. Therefore, in order to avoid cost shifts, all the transmission costs being currently paid to serve each PTO's loads should be determined and used to form the basis of the Company rates. While usage patterns in the future will inevitably change, it is pure speculation whether a particular PTO will make more or less use of other PTOs' systems. Therefore, short of leaving the current pancaked rates in place, there is no good way to reflect such changes in usage patterns in company rate calculations.

For example, transfer charges between companies are needed in order to replace current wheeling contracts. In addition, the current transmission purchaser receives FTRs to equivalent to its wheeling rights.

Issue: Should the transfer payments and FTR allocation for long term wheeling agreements continue beyond the term of the current agreement?

There is general agreement that if the wheeling agreement is needed by purchaser to serve their loads, then the transfer payment and FTR allocation should continue. An example would be a long term firm wheeling agreement to wheel a company's remote resources to its loads. However, there is not general agreement about how to treat an agreement that is not needed to serve the company's loads. An example could be a system purchase from a third entity of finite duration that expires during the term of Company Rates.

Proposal: Continue the transfer charge and FTR allocation for all long term firm wheeling agreements.

Failure to do this would cause a cost shift, because the PTO providing transmission service would lose the revenue associated with the transfer payment, increasing its company rate and the costs paid by loads paying its company rate. Of course, the PTO would regain the FTRs, if any, associated with the expiring wheeling contract. However, it would be a huge coincidence revenues derived from the sale of these FTRs matched the lost transfer payment.

This alternative also has the advantage of not requiring the PTOs or the RTO to determine the use of the expiring contract and whether the purchaser would be "transmission sufficient" without it. Such a transmission sufficiency determination would be fraught with issues and assumptions.

**Issue: How should ramp downs or expiration of long term bundled power sales contracts be treated.** Unlike wheeling agreements, bundled power sales contracts between PTOs need not be replaced by transfer payments and FTRs, at least for the period that the quantity of the sale does not change. The contract is not suspended and the seller can functionalize the revenues between power and transmission, using the transmission related revenues to reduce its Company rate.

Proposal: As a bundled power sale between PTOs ramps down or expires, the transmission component of that sale should be replaced with a transfer payment and FTRs, as with a long term wheeling agreement.

As with wheeling agreements, this is the only treatment consistent with load based access charges and the goal of no cost shifts, and it does not require any determination of transmission sufficiency of the purchaser without the bundled sale.

Dennis Metcalf  
8/17/00

## Marcus Wood Proposal on Method to Handle Imputed Transmission Access Transfer Payment

- Q. Upon termination of long-term power sales, should a transfer charge be paid by the purchaser of power to the seller of power, to recover so-called "imputed" transmission costs allocated by the seller's transmission function to the seller's power function in connection with such bundled sale?
- A. No, unless the power seller can demonstrate that without an RTO, upon expiration of the power sale, the purchaser would have needed to purchase replacement transmission services from the original seller of the power.

The guiding principle in answering this question is that during the Company Rate period, we should establish transfer charges that reflect as closely as feasible the payments that the various participating transmission owners would make to each other if there were no RTO. In other words, we should seek to avoid cost shifts as a result of creating the RTO. Today, various transmission owners sell power from system to system to each other. The power is sold at a delivered price, reflecting the market price at the delivery point.

Absent an RTO, at the end of the term of such power sale, the purchaser either would or would not purchase more power from the original power seller, depending on the price offered. If the power were purchased from any other entity, the original power seller would not be receive any transmission payment from the former purchaser. Therefore, the original seller is not entitled to an RTO transfer charge for such transmission upon expiration of its power sale.

The one exception exists if the purchaser needed to use the original seller's transmission system, regardless of whether the original seller or a replacement seller made the power sale. In such case, without an RTO the original seller would continue to receive transmission revenues after the term of its power contract, and thus if the transfer payment is to be comparable to the pre-RTO payments, an imputed transmission charge is appropriate.

One argument I have heard for imposing a transfer charge for "imputed" transmission upon expiration of bundled power sales is ease of administration: That is, by imputing costs to all bundled sales without analysis, the process of setting transfer charges is made easier. Because of the fact that sales of power to load often goes through many intermediary power marketers, attempting to compute such imputed costs actually would be very difficult. More important, however, no transmission owner could justify potentially paying millions of dollars in unjustified transfer charges upon the expiration of bundled power contracts, merely in order to avoid a couple of hours of analysis.

Transfer Payments, Constant or subject to change?  
(GC, NRU, 8/20/00)

The document entitled Bullet Points on Resolution of RTO Pricing Issues (option 6) states that "During the Company Rate period (i.e. 10 years), the transfer charges will remain constant (over the 10 year period), except that any transfer charges tied to a specific FTR shall expire at such time as the related FTR's expire. Other exceptions to a constant transfer charge may be appropriate on a case by case basis."  
(Parentheticals added)

The company rate is based on the individual companies' revenue requirements less transfer payments. Transfer payments are payments from one PTO to another PTO to reflect the existing cost of wheeling across their respective transmission systems. Transfer payments are subtracted for the company rate in order to minimize cost shifts. If transfer payments were not included in the calculation of the company rate, then those utilities that have large wheeling revenues would have higher rates under the RTO than they have at present.

Three approaches to transfer payments have been discussed by the pricing group:

4. Assume constant transfer payments over the company rate period
5. Allow transfer payments to change to reflect explicit price changes provided for in existing contracts
6. Allow transfer payments to change to reflect increases in company transmission rates over the company rate period

Arguments for and against each option

2. Assume constant transfer payments over the company rate period (note: Does "constant" mean "constant nominal"? Would another alternative be "constant real", using a stipulated rate of inflation?)

Arguments for:

- Simplicity
- No need to follow each company's rate cases

Arguments against

- Company revenue requirements and rates will change over the 10 year period, and the constant transfer payments won't reflect this
- Since this proposal locks in transfer charges for 10 years and since the company rate is the revenue requirement less the transfer charges, the increased costs of the existing system will be borne by the non-transfer load paying the company rate.
- Even if companies pledge to have no rate increases over the 10 year period, these increased costs will fall on customers at the end of the period, due to delayed maintenance.
- Some transfer payments are based on contracts that expire during the ten-year period, and it does not seem reasonable to lock future payment streams into what would be automatic extensions of existing contracts, when there is a parallel discussion over what "PECs" really mean.

3. Allow transfer payments to change to reflect explicit price changes provided for in existing contracts

Arguments for:

- Simplicity
- No need to intervene and participate in each company's rate cases
- Accuracy in terms of reflecting reasonable expectations about future conditions

Arguments against

- Company revenue requirements will change over the 10 year period, **in addition to those explicitly described in the contract**, and transfer payments won't reflect this
  - Since this proposal locks in transfer charges for 10 years and since the company rate is the revenue requirement less the transfer charges, the increased or decreased unit costs of the existing system will be borne in part by, or will flow to the benefit of the non-transfer load paying the company rate. Under Option 2, this is less of a problem than under Option 1.
  - Even if companies pledge to have no rate increases **except for those explicitly described in the contract**, over the 10 year period, these increased costs will fall on customers at the end of the period, due to delayed maintenance
4. Allow transfer payments to change to reflect increases in company transmission rates or revenue requirements over the company rate period. These allowed for changes would be as a result of FERC or other regulatory body approved rate changes.

Arguments for:

- Transfer charges and company rates will better reflect the then-current costs of the PTO over the company rate period
- Those customers facing the non-transfer costs of the utility will not have to bear all the costs, and will not receive all of the benefits, of utility revenue requirement increases or decreases
- Better reflects what would have happened absent the RTO

Arguments against

- Need to intervene and participate in PTO transmission rate cases and track rate changes over time

Transfer Payments:  
The "Montana Problem" -- A Large Cost Shift Potential  
Dependent On IPP/Marketer Treatment

**Problem Description**

The current method for determining each PTO's Company Rate includes the addition or subtraction from the PTO's revenue requirement, the net transfer payments between it and other PTOs. The transfer payments are determined by the transactions that have occurred between the parties. The philosophy is that if PTO A's transmission system is utilized to serve the load of PTO B, PTO A will receive a transfer payment from PTO B. This works when the parties involved are both PTOs and merchants, and transmission systems utilized and loads served are easily distinguished. The method does fail, however, when the generation owners within a system are no longer affiliated with the PTO, but are IPPs/Marketers.

During the Transmission Pricing WG discussions, it has been recognized that long term (LT) and short term (ST) transmission business between PTOs (i.e., PTO to PTO) can be handled through the use of transfer payments. The sale of FTRs will be used to offset the transfer payments associated with ST transactions. On the other hand, for ST transmission use by marketing entities (i.e., Non-PTO - PTO) in transactions involving "daisy chains" that make it nearly impossible to determine the source (generator) and the sink (load), it has been decided that transfer payments will not apply.

The Montana Power Company (Montana) is unique to the other RTO West PTOs in that it does not have a merchant function or generation (except for its share of Colstrip Unit 4, which is dedicated to long term contracts). Instead, it now has an IPP/Marketer within its transmission system doing ST business as described above -- meaning that Montana will not collect transfer payments for this business, yet it would have if it still had a merchant function.

It has been suggested that the sale of FTRs might offset some, all, or even exceed, this shortfall. Montana does not believe it must accept the risk connected to the sale of FTRs just because it is uniquely situated. This creates an unequal position between the PTOs.

**Effect of Problem**

If Montana cannot collect the transfer payments for the ST IPP/Marketer business, it will be subject to a revenue credit short fall of up to \$17 million (\$12 Million attributed to Montana no longer having an affiliate merchant, and an additional \$5 million related to other ST marketer activity). This represents a significant portion of Montana's revenue requirement, which is currently \$48.8 million under a FERC settlement. In the most conservative case, this uncollected transfer payment represents 15% of Montana's revenue requirement (\$12 million / \$80 million).

Since the entire transfer payment concept is intended to minimize cost shifts for parties, it is clear that unless this issue is resolved, Montana will be subject to just such a cost shift -- one that is of significant magnitude.

**Solution Options**

The following describes potential solutions to the problem, and the pros and cons of each.

1. *Determine Regional Generation Surplus/Deficiencies (Who are the Net Importers and Net Exporters)*  
Regional generation surplus/deficiencies and resulting surrogate transfer payments can be determined, as described in Ted Williams' paper (Attachment 1).

Pros

This method may determine which PTOs deserve transfer payments, and which loads should pay, based upon load/resource balance. If a region is generation deficient, it should pay for the use of those transmission systems that provide the transfer of power to that region.

Cons

- a. The load/resource tabulations used to determine the generation surplus/deficiencies are subject to potential dispute: (i) are actual or forecast loads used? (ii) are actual or projected resource levels used? (iii) should a 1 CP, 3 CP, 12 CP, or other, load be used?
- b. This method may not provide the same revenue distribution that has been actually experienced.

2. *Place the Montana shortfall in the RTO Uplift*  
Montana receives its revenue shortfall, which is placed in the RTO Uplift Charge.

Pros

Easy to administer -- a single revenue amount is paid to Montana and added to the RTO Uplift.

Cons

The loads benefiting by the use of the Montana transmission system are not paying the total cost. Instead, the cost is "socialized," and all RTO participants pay a portion of the cost.

3. *Use Whatever Means Possible (Tags, Schedules, Transaction Records, etc.) to Determine Load*  
Through the use of tags, schedule information, etc., determine the loads that used the Montana system, and compute the transfer payment to Montana, accordingly.

Pros

The transfer payments are made by the appropriate loads/PTOs. I.e., the cost-causer is the cost-payer -- the costs are not socialized, as is the case with Option 2.

Cons

- a. This would involve a very time consuming process -- the number of tags is extremely large.
  - b. For 1999, tags may not be a perfectly reliable source of transaction information.
  - c. Tags are only used for pre-schedules, therefore, the determination of loads associated with real-time business would be nearly, if not totally, impossible.
4. *Develop a Generation Charge*  
A volumetric generation charge could be developed that would apply to exports from the Montana system (not the RTO) to recover the revenue shortfall.

Pros

The charge could be easily developed based upon the revenue shortfall and energy that was transferred in the base year.

Cons

Any generation charge, volumetric or otherwise, is in total conflict with the Transmission Pricing WG recommendation that RTO charges be load based.

**--Ted Williams Proposal on a Method to address the IPP Problem  
associated with Transfer Payments--  
Deficiencies in Their Application**

One means of eliminating cost shift in the RTO “company rate” proposal is the adoption of transfer payments. To the extent participating transmission owners have transactions with one another, transfer payments will be assessed to take the place of the revenue credits and wheeling expenses currently used in the calculation of each transmission owner’s revenue requirement. The net amount of the transfer payments paid to and received from others will be added to each participating transmission owner’s revenue requirement in calculating its “company rate”. The concept has been widely (albeit not unanimously) accepted, although the transactions that contribute to the calculation of the transfer payment have not been agreed upon.

The concept is straightforward in theory. There are problems, however, in practice. Because of the proliferation of independent power producers (IPPs) and marketers, many transactions take place today that are impossible to attribute to specific loads through transfer payments between transmission owners. Because these IPPs and marketers do not own transmission that will be contributed to the RTO, there is no means to assess a transfer payment to these entities and subsequently to place the burden on those IPPs and marketers to attribute their transactions to the appropriate loads. This paper offers the skeleton of a concept to deal with this problem.

It’s clear that some areas within the proposed RTO are generation surplus while others are generation deficient. In many cases, the deficient systems serve load with resources from surplus systems. In such instances, it is reasonable that the customers in deficient areas pay some of the transmission costs of the surplus systems. This is the underlying principle in the transfer payment scheme. If all systems performed some kind of load/resource tabulation, it could be determined which systems are surplus resources and which are deficient. For surplus systems, the amount of generation in excess of their loads generates transmission revenue that is credited to the customers within those systems. One way to determine transfer payments would be to calculate for each surplus system the amount of credit it would earn without the RTO (surplus x company rate – transfer payments otherwise determined). The total of the surplus systems’ credits then needs to be allocated to the deficient systems to determine the appropriate transfer payment. If the amount of surplus is greater than the amount of the deficiency (in MW), then some portion of the surplus credits would need to be recovered from exports.

There are clearly holes in this concept. Among them, (1) it addresses surplus generation within the RTO (Montana’s IPP problem), but it doesn’t deal effectively with marketer transactions (Idaho’s (et al’s) problem); (2) the company rates that are used to calculate the surplus systems’ credits are a function of the credits, so it is an iterative process; (3) it assumes that loads somewhere pay all the transmission costs of the surplus systems without regard to the supply and demand influences on pricing in an efficient market (i.e. in some market scenarios, generators may eat the cost of transmission to get their product to market).

Nonetheless, there may be value in putting flesh on these bones unless someone identifies a fatal flaw.

**Revision of paper on how to handle non-firm component of transfer payments**  
**(by D. Hoff)**  
**(Paper titled “Non-firm”)**

(Revisions based on the proposal to divide revenues from the auction of non-exempt FTRs to replace lost revenues.)

Establish a RTO wide fixed hourly FTR “uplift” charge on all non-exempt FTRs.

Fee calculated by dividing all lost revenues by non-exempt FTR hours.

Receipts used to replace lost revenues on company basis.

This would be coupled with a requirement that a marketer/generator must have a FTR to schedule. (This, I believe, is the current CM proposal)

**Advantages:**

**Will collect sufficient revenue to compensate all losers.** Reduces transmission owner’s risk significantly. Eliminates uncertainty regarding this portion of the transmission owner’s revenue requirement coverage. Solves Montana, Idaho and BPA problems (I think).

Changes issue of whether short term and imputed are included in transfers from one of revenue recovery to one of cost allocation.

Acknowledges that customers do not pay all costs under current system. Customers pay costs when there are no alternatives. Marketers/generators pay costs when selling into a competitive market. In economic terms, the incidence of the transmission “tax” is on the customer if the demand is inelastic, and on the seller if the demand is elastic. The question is: can the sellers pass on the cost of an increase in transmission costs to the buyer? If they can, the customer pays. If they cannot, the seller pays (through decreased margins).

Will collect charges on transactions that were non-firm pre-RTO, since an FTRR would be required for all transactions.

Will collect charges from non-RTO participants.

Is economically efficient.

Is competitively neutral.

Offsets some of windfall gains going to merchants/generators as a result of the RTO.

**Disadvantages.**