

Transmission Cost Allocation

IPSAC

February 2, 2010

John P. Buechler

NYISO Executive Regulatory Policy Advisor



Background

FERC Policy has evolved

- **Order 888 – No Planning Requirement for ISOs**
- **Order 2000 – Planning Requirement for RTOs**
 - Initially, RTOs addressed Reliability, then Economic Planning and cost allocation issues
- **Order 890 – Planning Requirement for all Transmission Providers, including ISO/RTOs**
 - Requires both Reliability & Economic Planning
 - Requires cost allocation to be developed for each region
 - Requires inter-regional coordination
 - All ISO/RTO Order 890 Planning Processes have now been accepted by the Commission

Order 890 Planning Principles

- **New Requirements**
 - Economic Planning Studies
 - Cost Allocation within regions
- **FERC Encouraged Regional Flexibility**
 - Must comply with the nine Planning Principles
 - No standardized method was mandated
 - Work with stakeholders to address regional needs
- **Each ISO/RTO Region has proposed somewhat different approaches for its regional planning process as well as cost allocation methodology**

Cost Allocation Methodologies

- Focus on the Northeastern ISO/RTOs
- Current methods reflect a range of philosophies
 - Approved by FERC
 - All provide for Merchant Transmission
- Region-wide Allocation: ISO-NE for Pool Transmission Facilities (“PTF”) providing Regional Network Service
 - Subject to a Transmission Cost Allocation process that eliminates “gold plating”
- Sub-regional Allocation: NYISO by zone
- PJM
 - Above 500kv: Region-wide allocation (August 2009: Remanded to FERC by 7th Circuit Court of Appeals; January 21, 2010: FERC Order establishing a paper hearing)
 - Below 500Kv: Zonal allocation based on DFAX methodology
 - Allocation for Merchant Transmission – Comparable to Zonal allocations – FERC Order No. 502 – Compliance Filing under preparation

Cost Allocation: Metrics

- The Northeastern ISO/RTOs utilize similar—but not identical—metrics
- **ISO-NE**
 - Reliability:
 - PTF costs socialized across region
 - “Market Efficiency Upgrades”
 - Utilizes region-wide total net production cost savings; costs allocated region-wide
 - Criteria may be revisited by New England stakeholders, including states
- **NYISO**
 - Reliability:
 - Costs allocated to loads based upon contribution to meeting resource adequacy requirements—by zone
 - Economic: Based on a 2-part test conducted over a 10-year period:
 - Initial Threshold: Statewide net production cost savings; B/C >1.0
 - Beneficiary/Cost Allocation: Zonal LBMP load savings (net of TCCs and bilaterals)
 - 80% of voting beneficiaries must approve the project
 - Developer must file the final project cost with FERC

Metrics (Cont'd)

- **PJM**

- **Reliability: for RTEP “baseline facilities”**

- **Cost Allocations to Zones:**

- $\geq 500\text{KV}$: Based on load ratio share based on prior year’s non-simultaneous zonal peak
 - $< 500\text{KV}/\text{Cost} > \5M : Based on DFAX impact analysis by zone
 - $< 500\text{KV}/\text{Cost} < \5M : Allocated to local zone

- **Cost Allocations to Merchant Transmission Facilities w/Firm Transmission Withdrawal Rights (“FTWRs”):**

Schedule 12 of the Tariff provides that such allocations are based on:

- $\geq 500\text{KV}$: Same method as used for PJM Load Zones, share based on FTWRs
 - $< 500\text{KV}/\text{Cost} > \5M : Same method as used for Zones
 - $< 500\text{KV}/\text{Cost} < \5M : Same method as used for Zones

- **Economic:**

- **Threshold tests:**

- **Energy** = $[(70\% * \text{Total Production Cost Savings}) + (30\% * \text{Net LMP Savings})]$
 - **Capacity** = $\{[(70\% * \text{Total Capacity Cost Savings}) + (30\% * \text{Net Load Capacity Savings})]$
 - Bright line metric must show B/C Ratio > 1.25

Metrics (Cont'd)

- **PJM**

- **Economic (cont)**

- **Cost Allocations to Zones:**

- $\geq 500\text{KV}$: Same as for Reliability upgrades

- $< 500\text{KV}$:

- **Modifications to reliability-based upgrades: Based on DFAX**

- **New Projects: Pro rata share of change in Load Energy Payment for zones with a decrease in Load Energy Payments**

- **Accelerations of reliability upgrades : Compare cost allocation factors based on DFAX vs. LMP benefit over acceleration period**

- If Differential $\geq 10\%$: Use relative LMP benefit

- If Differential $< 10\%$: Use DFAX methodology

- **Cost Allocations to MTF**

- **Compliance filing under preparation**

PJM/MISO Cross-Border Cost Allocation

- FERC directed PJM/MISO to develop a cross-border cost allocation methodology in 2004 as part of the PJM/MISO Seams Elimination Cost Adjustment (“SECA”) proceeding
 - **Reliability:**
 - Applies to “Cross Border Baseline Reliability Projects” (CBBRP) needed to maintain reliability in both RTOs
 - Cross-border cost allocation: DFAX analysis to determine each RTO’s contribution to net flows on the constrained facility (i.e. – positive flow less counter-flow)
 - Threshold: \$10M cost allocated to one RTO; =>5% to the other RTO
 - After cross-border allocation, each RTO allocates its share of costs according to its respective OATT
 - **Economic:**
 - Applies to “Cross Border Market Efficiency Projects” (CBMEP) to reduce congestion and improve market efficiency in both RTOs
 - Threshold: 5% DFAX; \$20 million project cost
 - Meets agreed-upon joint criteria: bright line metric produces C/B ratio ≥ 1.25
 - Joint metric is combination of present value cost savings of production and load costs over multiple years.
 - Meets separate Cost/Benefit criteria of each RTO
 - Projects to meet broad policy objectives beyond simple congestion relief are unlikely to qualify for CBMEP treatment

Next Steps

- **FERC has not directed any other ISO/RTO to develop a cross-border cost allocation methodology for either reliability or economic projects**
 - **Docket AD09-8 and FERC's Strategic Plan indicate that FERC continues to be interested in how inter-area cost allocation issues can be addressed**
- **In light of the above, and now that cost allocation has been substantially finalized within their respective regions, NYISO and PJM have agreed to begin discussions regarding cross-border cost allocation following completion of the planning studies discussed earlier today**
- **ISO-NE Status**
 - **To date, a need for Market Efficiency Upgrades has not been identified within the region**
 - **Several interregional Merchant Transmission Upgrades and Elective Upgrades are in various stages of the planning process**
- **The process of cost allocation discussion will be transparent and open to interested parties**