



WESTERN AREA POWER ADMINISTRATION
An agency of the U.S. Department of Energy

Sierra Nevada Region

Energy Imbalance Service Rate Schedule

Informal Rates Meeting

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FERC ORDER 890

Energy Imbalance Service



- Three principles for imbalance provisions:
 - Charges based on incremental cost or some multiple thereof;
 - Charges must provide incentive for good scheduling practice; and
 - Provisions should address intermittent renewable resources (wind/solar) to waive punitive penalties
- Demand responses (emergencies/reserve activation) should not be penalized, but normal market prices will apply for energy purchased/received

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Energy Imbalance Service



- Energy Imbalance Service is an existing rate for service provided by the Transmission Provider (TP), Balancing Authority (BA), or Sub-Balancing Authority (SBA) to manage imbalance between resources and obligations
- Western's Schedule 4, Energy Imbalance Service, effective December 1, 2009:
 - <http://www.oatioasis.com/WAPA/WAPAdocs/WAPA-OATT-CLEAN-Effective-2009-1201.pdf>

FERC ORDER 890

Energy Imbalance Service



- No penalties shall apply when imbalance is direct result of reliability actions taken to:
 - Correct frequency
 - Comply with directives by BAs, TOPs, and RCs;
 - Accommodate reserve activations
 - To cover loss of generating units
- Increased penalty may be considered for intentional imbalance(s)

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Energy Imbalance Service



- Tiered Bandwidths:
 - Tier One: +/-1.5% of customers scheduled energy, netted on a monthly basis and then settled financially (2 MW minimum)
 - Tier Two: Greater than +/-1.5% and up to +/-7.5% of scheduled energy, settled financially each hour
 - Tier Three: Greater than +/-7.5% of scheduled energy, settled financially each hour

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Energy Imbalance Service



- Charges within the Tiered Bandwidths:
 - Tier One: Netted, No Penalty, Cost Only
 - Tier Two: 10% penalty—Charged 110% for under delivery of energy, and credited 90% for over delivery
 - Tier Three: 25% penalty—Charged 125% for under delivery of energy, and credited 75% for over delivery
- Intermittent Renewable Resources' (Wind/Solar) Energy Imbalance Service is limited to 10% penalty

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Energy Imbalance Service



- FERC will accept alternatives to pro forma design if:
 - It complies with three imbalance principles (Slide 2)
 - If a TP desires to retain an existing tariff rate for this service, then it must be consistent with or superior to the 890 pro forma

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Energy Imbalance Service



- TP or SBA can charge customer for both Generator Imbalance Service and Energy Imbalance Service in the same hour, but not if the imbalances offset each other
 - For example – Customer “A”
 - » Generator Imbalance Service: 5 MW surplus
 - » Energy Imbalance Service: -10 MW deficit
 - » Customer “A” charged: 5 MW (EI charge)

SNR's Existing Rate for Energy Imbalance Service



- Imbalance within the contractual bandwidths is tracked & settled with energy return
- Imbalance outside of the contractual bandwidths:
 - if under delivery, then it is settled at greater of:
 - 1) 150% of CAISO average hourly price; or
 - 2) Western's actual cost of energy
 - If over delivery, then the energy is lost to the system

Proposed Applicability



- The Energy Imbalance (EI) Rate Schedule is applicable to SNR's transmission customers who take EI Service under OATT

Energy Imbalance Service Rate Schedule



- The existing Energy Imbalance Service rate schedule will expire on September 30, 2011
- The new rate will be effective October 1, 2011, through September 30, 2016
- Requesting Customer input regarding FERC Order 890's methodology versus SNR's existing methodology for this rate



Questions?
