

**Market Operations Task Team
Meeting Notes
November 7, 2002**

Discussion Summary

The Market Operations Team (MOT) met the morning of November 7th. Discussion focused review on capacity purchased for system security and on issues in paper drafts – penalties, non-dispatchable resources, dynamic scheduling and dead bands, co-optimization of capacity and energy, self-provision, and hubs and zones.

Discussion Notes

1. System Security Commitment:

- a. Concern was expressed about the proposal to acquire reserves by RTO West, when its forecast exceeds the day-ahead schedules of the transmission customers. If the supplemental commitment made to insure system security occurs after day-ahead prices are set, an unintended incentive is created for under or over scheduling.
- b. Instead of being done in subsequent step, this process should occur simultaneously with the day-ahead process, i.e., RTO West would use a single stack of bids for energy, A/S and replacement reserves.
 - i. The charges for the replacement reserves would still be charged to those who have insufficient reserves in real-time or uplifted in the event that RTO West over estimated the next day's load.
 - ii. Concern over RTO West staff incentives was expressed once more. A financial incentive is needed to minimize such purchases to avoid excessive uplift.

2. Penalties:

- a. Imbalance penalties.
 - i. The paper draft describing a double screen approach was reviewed.
 - The general approach seems to be acceptable.
 - Concern was expressed however that small parties not be able have large errors (perhaps even

intentionally) and have no penalty when larger parties are keeping the total system in balance. This could be addressed by another test that checks for large error on individual schedules in addition to the double screen approach.

- In the opposite direction, concern was expressed that there are some conditions when no-one is able to adequately forecast such as the arrival of a cold snap. Should there be a suspension of penalties under such conditions? If so it should be based on an objective test.

ii. Ren Orans and Preston Michie to re-draft of paper.

b. Failure to Perform – these are penalties and sanctions for non-compliance with instructions or agreements to provide.

3. Non-Dispatchable Resources:

a. The draft paper was discussed:

- i. After some discussion, it became clear that there is a disconnect between our discussion last week and the balanced schedule model.
 - In a balanced schedule approach, the non-dispatchable resources would be incorporated in the portfolio of Scheduling Coordinators (SCs) through forward energy contracts. As a result, they would be incorporated in the total schedule of each SC.
 - Separate settlement of dispatchable resources with RTO West, assumes they are “put” to RTO West in an energy market.
- ii. If there is an energy market, then the non-dispatchable resource should have two options:
 - Provide schedule to RTO West using a certified forecasting method with updates to real-time and be a price-taker with no penalty exposure for energy supplied.
 - Bid and schedule like any other resource, including the risk of possible penalties. This may require the resource to acquire load following and regulation from other sources.

iii. Concern was expressed about the portion of the draft paper which would not require regulation charges for intermittent resources.

b. Jim Hansen will redraft and circulate to Paul Kroger and Tom Foley for review.

4. Dynamic Scheduling and Dead Bands:

a. The examples described in the paper were discussed.

b. The key point is that any assumed "dead band" for dynamic schedules under existing obligations must be captured in the catalogue so that settlement is the same for all parties.

5. Co-Optimization of Energy and Ancillary Services:

a. The suggested approach is to use a single stack of resources to acquire both energy and ancillary services with the locational requirements for acquisition factored into the process.

i. If A/S is purchased after day-ahead energy prices are set, then locational selection of reserves, regulation, etc. will create congestion clearing that is not recognized in the day-ahead prices.

ii. Whether the problem is solved iteratively or simultaneously is a matter of implementation and solution convergence. In theory either would work, as long as the prices include acquisition of all the products RTO West needs. The "rational buyer" provision is another constraint in the optimization (higher price for higher quality service).

iii. The simultaneous approach could produce a marginal nodal price for capacity products just as there is a nodal energy price.

b. During discussion of the paper the following observations were made:

i. Scheduling transmission for regulation or reserve, means scheduling to keep the capacity open for use for regulating or to cover contingencies.

ii. When such reservations are made, it creates a constraint in the security constrained dispatch which keeps the

transmission capacity unloaded. The cost of keeping the transmission unloaded will be captured in nodal prices.

iii. Such reservations pay the congestion cost of the schedule (price spread) even though there is no associated injection or withdrawal of energy.

c. Ren Orans will redraft the paper to capture the ideas developed in this discussion.

6. Hubs and Zones Paper:

a. Brief discussion of re-drafted paper; suggested editorial revisions will be made.