COMMENTS OF THE CALIFORNIA WIND ENERGY ASSOCIATION, THE LARGE-SCALE SOLAR ASSOCIATION, and 8minutenergy Renewables ON THE CAISO DYNAMIC TRANSFERS DRAFT FINAL PROPOSAL

The California Wind Energy Association (CalWEA), the Large-scale Solar Association (LSA), and 8minutenergy Renewables LLC (8me) hereby submit their joint comments on the following:

- ***"Dynamic Transfers – Draft Final Proposal"*** ("Proposal"), a May 20th update to the CAISO's prior proposals to standardize and expand "Dynamic Transfers" – Dynamic Scheduling and Pseudo-Tie arrangements; and
- ***The May 27th CAISO stakeholder meeting*** to discuss the Proposal.

These comments cover issues besides scheduling rights for Dynamic Transfer (DT) transactions. Our comments on DT scheduling rights were submitted on June 4th, per the CAISO's most recent timeline for this initiative.

Overview of these comments: We continue to strongly support this CAISO initiative. As discussed at the May 27th meeting, Dynamic Transfers will be required, not only to meet the requirements of the recent CPUC decision on unbundled TRECs (assuming that it is not substantially changed on rehearing), but also to enable development of cost-effective renewable energy needed to meet California's ambitious Renewables Portfolio Standard (RPS) objectives in other Balancing Authority Areas (BAAs) with limited balancing resources.

We continue to be disappointed by the CAISO's failure to address eligibility of generators under DT arrangements ("DT Generators") for the CAISO Participating Intermittent Resources Program (PIRP), because the proposed DT framework will not be commercially viable without that. However, we will not repeat our past arguments on that point yet again.

Instead, our comments focus here on two main areas:

- ***Scheduling and congestion-management features of the Proposal*** that would treat DT Generators in an unduly discriminatory manner and incur unnecessary costs for consumers, namely those that would:
  - Require that DT Generators submit both a "transmission reservation" for "maximum deliveries" and "expected average deliveries" for expected output; and
  - Use the transmission reservations, instead of expected energy, as the basis for:
    - The CAISO's forward scheduling/congestion management optimization;
    - As the basis for DT Generator charges for Grid Management Charges (GMCs) and congestion charges; and
    - As the basis for real-time curtailment, under some circumstances.
- ***Other areas of the Proposal needing clarification***, specifically provisions related to:
  - Real-time congestion-management, where the examples in the Proposal continue to be inconsistent with the CAISO's statements on this matter; and
  - Splitting DT Resources into separate scheduling and settlement streams.

We appreciate the opportunity to comment and hope that the CAISO will seriously consider these arguments in finalizing its proposal.

Regular scheduling and congestion management provisions

Internal unit scheduling & congestion management – current CAISO practice: Resources on the CAISO system submit Energy bids or self-schedules (and perhaps other bids) to the CAISO for each hour. The CAISO uses these submissions for forward scheduling and congestion management (even for very congested lines) and thus makes the most efficient use of the available transmission capacity.

In real time, internal resources may operate above their forward Energy schedules. The CAISO addresses any transmission congestion first through economic bids, and then by curtailing transmission in reverse order of "effectiveness," or the impact of different generators on the congested transmission element. In situations where economic dispatch cannot resolve a real-time overload situation in the required timeframe, the CAISO can issue Exceptional Dispatches or "operating orders" to curtail specific generators as needed to address the problem.

Charges are based on forward scheduling or real-time output, as provided in the CAISO Tariff.

DT Generator scheduling & congestion management in the Proposal: As noted above, the Proposal would require DT generators to submit, for each hour, a transmission reservation, based on the DT Generator's "maximum deliveries," in addition to "expected average deliveries." The reservation would be used for routine scheduling/congestion management, as well as GMCs and some CAISO operating orders (more on that below).

Our comments on the Proposal: The "expected average deliveries" submission is analogous to the regular Energy bid/self-schedule that internal resources submit to the CAISO, and it is needed for forward scheduling. However, the CAISO has not explained why it would require a separate "reservation" for DT Generators only, for congestion management or any other purpose. In fact, use of a transmission reservation, instead of expected energy output, could be counterproductive – probably one reason why the CAISO does not use it for internal resources.

First, any intermittent DT Generator would have to either submit a transmission reservation equal to its maximum capability or risk having its output (and revenues) restricted in real time. This reservation cost, based on maximum capacity, is not imposed on internal generators even though they enjoy the same operating flexibility.

Second, using the higher reservation number for congestion management could cause the re-emergence of a phenomenon – **"phantom congestion"** – that the CAISO worked hard to eliminate for pre-CAISO Existing Transmission Contracts (ETCs). Phantom congestion was an issue when the CAISO used ETC transmission rights (instead of expected energy schedules) for forward scheduling and congestion management, in order to allow those rights holders to increase their schedules in real time up to their total rights holdings.

This practice resulted in:

- ***Increased transmission "congestion" in forward scheduling*** that often did not, in fact, materialize in real time;
- ***Acceptance of unneeded economic bids in forward scheduling*** – and associated higher costs – to "mitigate" the forward congestion;
- ***Lower capacity availability to other resources in forward scheduling*** (and consequent reliability on less economic resources, again increasing costs); and
- ***Real-time under-utilization of scarce intertie capacity***.

The earlier phantom congestion problem was addressed through market-design reforms that allowed forward scheduling and congestion management for ETCs based on expected energy schedules instead of rights/reservations, with real-time dispatches as needed to accommodate any allowed real-time schedule increases above the forward-scheduled amount.

It is hard to understand why the CAISO would want to artificially create the very problem its own reforms have ameliorated in similar situations. Like the earlier ETC situation, the Proposal would perform scheduling and congestion management in forward scheduling – when the huge majority of load and generation are scheduled – based on an unrealistic representation of real-time schedules; while the unused capacity would be available in real time, that would only partly remedy the gross inefficiency of taking it out of use in forward scheduling.

Clarifications in other key areas

Real-time congestion management

- ***Normal congestion management:*** The CAISO clarified at the stakeholder meeting that, even if some DT Generators are operating above their transmission reservation and/or expected energy delivery levels, it would first use economic bids to resolve any real-time congestion or line overloads, assuming that there is sufficient time to allow for regular dispatch of those bids.

  Our comments: We appreciate the CAISO's clarification and agree with this approach. We further recommend that the CAISO state this as clearly in the final version of its Proposal.

  The Proposal then appears to say that the CAISO would order the any DT generators producing above their transmission reservations back to that level before imposing further reductions (e.g., reductions based on relative effectiveness, or pro rata reductions).

  Our comments: Since we oppose the transmission reservation concept (because of the discrimination, inefficiency, and cost impacts), as stated above, we do not agree that this step should be taken before moving to other congestion-management steps. The CAISO should use the same congestion-management procedures for DT transactions on the interties as for resources inside the CAISO once economic bids are exhausted, with a couple of adjustments.

  We have no objections to excluding static schedules from curtailments due to generation above schedule by DT Generators. (However, they should be subject to curtailments due to transmission de-rates or outages, the same as DT Generators.) The CAISO could use the priority list for any additional curtailments, as discussed above. Otherwise, the CAISO should use the same rules for curtailment of DT generators as it would for internal generators when a line is overloaded,

- ***Congestion management when there is no time to use economic bids:*** The CAISO clarified at the meeting that it would use "operating orders" when there is no time to wait for dispatch of economic bids.

  Our comments: We agree that the CAISO can use a more command-and-control approach under these circumstances. However, we recommend that the CAISO formalize the definition of "operating order" in Appendix A of the CAISO Tariff, including both the conditions under which the CAISO would issue such instructions and how it would decide which units/schedules to issue them to. As noted in the Proposal, Section 37.2.1.2 provides for penalties for failure to comply with CAISO operating orders, but applying penalties is unfair where they result from CAISO actions that are not well-defined in the Tariff.

Splitting DT resources into separate scheduling and settlement streams: The Proposal repeats the statements in the last version that CAISO systems can accommodate multiple Dynamic Schedules from one resource to different interties (e.g., where the resource can't get enough transmission capacity to a single intertie), where the interties, and the splits of the resource between the interties, is set in advance. To qualify, the resource must do the following:

- ***Establish a clear need for the arrangement***;
- ***Establish fixed proportions of the resource*** that would comprise each of the separate "resources;"
- ***Separate the "dynamic interchange communications into separate data streams*** that appear to the ISO as if the resources are actually separate," because the CAISO systems "would see the plant as a whole." This implies that the separate "resources" need not be separately metered.

The final CAISO Proposal should clarify the following:

- ***Whether the CAISO could support multiple Dynamic Schedules from one resource to the same intertie.*** This kind of arrangement might be useful, for example, for a resource that has multiple PPAs for its output.
- ***That the CAISO could accommodate splitting Pseudo Tie resources into separate schedules***, going to one intertie or multiple interties, if they come from separately metered parts of the plant. We are aware of situations where a resource is (or will be) covered by a single Participating Generator Agreement (PGA) and Meter Service Agreement (MSA) but is (will be) divided into separately metered entities, each with its own CAISO Resource ID and able to be scheduled and settled separately; these separately metered parts of the resource should be accommodated through multiple Pseudo Tie schedules.

It's not entirely clear why resources can be split for Dynamic Schedules without separate metering but not for Pseudo Tie schedules under those same conditions. Nevertheless, the CAISO clarified at the meeting that it could accommodate multiple Pseudo Tie schedules if the separate pieces <u>are</u> separately metered; this clarification should be clearly stated.