



September 4, 2018

Chair David Olsen  
Governor Ashutosh Bhagwat  
Governor Mark Ferron  
Governor Angelina Galiteva  
Governor Richard Maullin

**RE: 2018 IPE proposal for "Timing of Technology Changes"**

Dear Chair Olsen and Governors Bhagwat, Ferron, Galiteva, and Maullin:

I am writing this letter on behalf of NextEra Energy Resources (NEER) about one agenda item for the September 5, 2018 CAISO Board meeting.

Specifically, NEER requests that the Board direct CAISO Management to revise its final proposal for one item under the "2018 Interconnection Process Enhancements" (IPE) agenda item for this month that has the potential to severely impair older projects in the queue that are satisfactorily progressing toward Commercial Operation. This 2018 IPE item is called "Timing of Technology Changes."

The overall Management proposal for this topic would prohibit technology changes (e.g., conversions of natural gas to solar) for generation projects in the queue for longer than the applicable tariff development deadline (7 years for cluster-study projects, 10 years for pre-cluster projects). NEER supports this proposal in concept, since projects in the queue for that long should not be allowed to effectively start over with a completely different technology; instead, they should re-enter the queue as new projects.

However, Management also proposes to prohibit technology additions (as opposed to conversions) for such projects. Buyers in today's difficult contracting market have taken seriously CAISO pronouncements regarding potential renewables curtailments at certain times of the day and year; as a result, many buyers are now requesting addition of energy storage facilities to their renewables contracts.

The CAISO has accommodated requests for such storage additions generally by enabling "behind the interconnection" (BTI) capacity additions, as long as the combined project does not exceed the original maximum output to the grid or Resource Adequacy (RA) deliverability levels. These CAISO policies recognize that such additions for energy storage would increase reliability, and further RPS attainment, by preserving renewable energy for later use that would otherwise be curtailed, and relieving over-generation pressures on the system.

Management is right to be concerned that older projects may seek to circumvent the technology-conversion prohibition by adding capacity with a different technology through the BTI process and then downsizing the project to remove the original technology. However, those concerns can be mitigated by allowing the technology addition but conditioning CAISO approval of the addition on retention of the original project technology and capacity level.

The 2018 IPE memo to the Board for this meeting repeats Management's fears about such gaming but does not address NEER's mitigation proposal (which was supported in the 2018 IPE stakeholder process by the Large-scale Solar Association (LSA) and other large renewables developers – First Solar, EDF-Renewables, and SPower). The proposed mitigation condition should enable the CAISO to enforce the technology-change prohibition for older projects without restricting beneficial technology additions to such projects.

NEER respectfully requests that the Board direct Management to revise the "Timing of Technology Change" proposal to apply only to the originally proposed generation capacity and not to BTI additions of other technologies (especially energy storage additions). In other words, the proposal should be revised to allow energy storage additions to older generation projects under development, as long as the original project capacity is preserved with the original technology.

Sincerely,

A handwritten signature in black ink, appearing to read "Jim Shandalov", with a long horizontal flourish extending to the right.

Jim Shandalov  
Executive Director, Renewables Development