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Comments of TransWest Express LLC on  
February 21, 2012, Draft of California ISO 2012/2013 Transmission  
Planning Process Unified Planning Assumptions and Study Plan  
And  
TransWest Express, LLC Study Request

## **Introduction**

TransWest Express LLC (TransWest) appreciates the opportunity to comment on the Draft 2012/2013 Transmission Planning Process Unified Planning Assumptions and Study Plan issued on February 21, 2012. TransWest, as developer of the TransWest Express Transmission Project, has been engaged within regional, sub-regional and state transmission planning efforts for several years and looks forward to working with the California Independent System Operator (CAISO) and the stakeholders involved in the CAISO Transmission Planning Process. We have provided below a brief summary of the status of the TransWest Express Transmission Project to assist CAISO and others better understand the context of our comments. TransWest, like many other stakeholders, is focused on providing regional solutions that meet the immediate and long term needs of the industry as it undergoes a massive change to a cleaner and more sustainable generation fleet while it keeps our commitments to consumers for safe, reliable and cost-effective electricity service.

## **The TransWest Express Transmission Project**

The TransWest Express Transmission Project (TWE Project) is a regional 725 mile 3,000 MW, 600 kV, direct current electric transmission system that has been designed to provide needed transmission capacity between the Intermountain and Desert Southwest regions, including California. The two terminal TWE Project will interconnect into the existing and planned system in south-central Wyoming and the existing 500 kV transmission infrastructure in southern Nevada's Eldorado Valley. Under development since 2005, with an expected in-service date in 2016, the TWE Project will deliver Wyoming's world-class wind resources – which are both high-capacity and cost-effective – to support California's plan to meet a 33% renewable portfolio standard (RPS) by 2020. Wyoming's resources that are delivered by the TWE Project will meet the criteria for RPS Content Category 1 within SB 2 (1x) by importing into California balancing authority on an hourly schedule using ancillary services as appropriate (or through a dynamic transfer provisions as the techniques and protocols become available). In addition, the additional capacity will allow energy flow in both directions to allow for the efficient operation of the regional markets between the Desert Southwest and the interior markets.

In September 2011, TransWest and Western Area Power Administration (Western) executed an agreement under which Western and TWE will share development costs and Western may become a 50% owner of the TWE Project. TransWest and Western are actively engaged in the National Environmental Policy Act (NEPA) review of the TWE Project. The Bureau of Land Management (BLM) and Western are co-lead agencies for this process. A Draft Environmental Impact Statement for the TWE Project is planned to be released in July 2012. Similar to the role it had on the Path 15 Upgrade, Western will provide environmental analysis, permitting, land acquisition and other development services to support the TWE Project.

The TWE Project was selected as one of the seven pilot projects within the federal government's Rapid Response Team for Transmission initiative (RRTT). The TWE Project is the only RRTT pilot project with planned interconnections into California balancing authorities (BAs). The TWE Project plans to interconnect with two California BAs along with the other BAs present in the Eldorado Valley. TransWest is also actively engaged in Phase 2 of the WECC path rating process with an Accepted Rating for the TWE Project expected in June 2013. The TWE project is planned to be in service in late 2015 or early 2016.

The economic merit of the TWE Project was evaluated during the development of the 2011 WECC 10-Year Regional Transmission Plan. The 10-Year Regional Transmission Plan was completed in September 2011 and submitted to the U.S. Department of Energy, one of the primary sponsors of the Regional Transmission Expansion Planning process. The Plan identified remote renewable resource locations that appear cost-effective – even with the cost of regional transmission included - when compared to an equivalent amount of planned local renewable generation. The analysis indicated that of the Wyoming wind energy delivered over the TWE Project could produce potential costs savings for California consumers of \$660 million per year.

## **Comments**

### **Policy Objectives**

CAISO will be doing extremely important work during the course of the 2012/2013 Transmission Planning Process (TPP). Correctly executed, this TPP will identify the projects and investments needed to assure a reliable and economically efficient transmission grid for consumers who are served by CAISO and the Participating Transmission Owners.

The February 21, 2012 Draft of the CAISO 2012/2013 Transmission Planning Process Unified Planning Assumptions and Study Plan (Draft Study Plan) lays out a comprehensive set of studies to evaluate and assure the continued reliability of the CAISO transmission grid.

However, TransWest believes the Draft Study Plan falls short in its approach to considering economic issues. As further explained in the comments that follow, TransWest believes that CAISO should be evaluating future additions to the grid based on three primary policy objectives:

1. Providing the lowest delivered cost of power to consumers. The delivered cost of power in this context includes generation and transmission costs and capital and operating costs.
2. Providing a sufficiently robust grid so that vigorous competition can take place among generators to cost-effectively serve the needs of consumers.

3. Providing sufficient optionality within any Transmission Plan that clearly states the primary targeted transmission investments and a set of contingency or secondary investments that have sufficient flexibility to become the primary investments if certain assumptions that formed the basis for the primary investments change materially.

TransWest recommends that these objectives be included in Section 3.1 of the Draft Study Plan either in place of or in addition to the policy objectives currently listed in that section.

### **Policy Driven Transmission**

Policy Driven and/or economic transmission projects that were identified within the Draft 2011/2012 Transmission Plan have represented approximately 10 times the level of investments identified for reliability projects. This trend in spending on these RPS enabling and policy driven projects over the reliability projects is likely to continue on a per year basis as California transforms approximately 15% of its generation portfolio over the next eight years. The cost for this transmission is significant and requires appropriate scrutiny by the CAISO to ensure the consumers receive adequate benefit for all transmission investments made.

### **Resource Portfolios**

Section 4.2 of the Draft Study Plan outlines a process for developing sufficient transmission to enable compliance with California's 33% RPS. This process relies on resource portfolios being developed by the California Public Utilities Commission (CPUC). While TransWest respects the role played by the CPUC in California energy policy matters, including but not limited to the siting of transmission lines, we believe CAISO is obligated through Section 24.4.6.6 of the OATT to not rely exclusively on CPUC as the sole source for resource portfolios. There are a number of specific elements the CAISO must consider within the process as outlined in Section 24.4.6.6, not all of which are required within the CPUC process. In addition, Stakeholders should be encouraged to provide alternative resource scenarios. WECC and the California Transmission Planning Group (CTPG) have encouraged and accepted stakeholder input on resource assumptions that has resulted in useful insights from their transmission planning efforts. In addition to considering resource portfolios submitted by stakeholders, CAISO must assure that there is a meaningful opportunity for stakeholders to review and comments on the CPUC's proposed resource portfolios.

### **Economic Efficiency**

The process outlined in the Draft Study Plan does not include an assessment of delivered power costs to consumers. The process seems to assume that the resources included in the CPUC's resource portfolios combined with whatever transmission CAISO determines is necessary to deliver these resources will result in an optimal solution for consumers. However, this will not necessarily be the result. In developing its resource portfolios, CPUC make assumptions about what transmission is needed for delivery of certain resources. In the past, the CPUC's models have selected predominantly resources that are assumed to need little or no new transmission investment. To the extent that these resources actually do require new transmission investments, particularly consumer funded transmission investments, the original assumptions under which they were selected for the resource portfolio are incorrect. CAISO should perform its own independent total delivered cost analysis rather than deferring to CPUC in this important area.

### Least Regrets Approach

The process outlined in the Draft Study Plan and in the presentation at the February 28 stakeholder meeting seems to contemplate a future in which enough transmission is developed to deliver only the resources that are included in the CPUC's base portfolio and, perhaps, also in one or more of the CPUC's sensitivity portfolios where different weights are applied to the same data sets. This "least regrets" or "lowest common denominator" approach to transmission planning may serve to minimize new transmission investment. However, this approach provides only a single path to meeting the 33% RPS requirement and effectively eliminates competition among generators to cost-effectively serve the needs of California consumers. Absent a more proactive transmission planning philosophy, load serving entities will continue to consider only a limited range of resource options. This will lead to the selection of additional high-priced resources similar to many of the resources included in the "discounted core" that is expected to be hard-wired into the CPUC's resource portfolios.

TransWest's analysis indicates that the current resources included in the discounted core will cost California consumers approximately \$800 million per year more than other viable alternatives.

Historically, 'stranded investments' as cited by the CAISO in the transmission capacity historically has been very rare. 'Stranded investments' in generation resources is more common as underlying market fundamentals change, such as industry restructuring or required changes in resource mixes. The CAISO should seek to optimize the existing underutilized capacity to the greatest extent possible to invest in transmission capacity with a solid economic foundation to ensure any new capacity is fully utilized. Building regional transmission capacity to rich renewable resource areas has been proven in the past to increase in value over time.

Because transmission has longer lead times than many renewable resources, it is imperative that CAISO identify transmission additions that will facilitate multiple resource options in the 2012/2013 TPP.

### Economic Transmission Studies

Section 4.4 of the Draft Study Plan takes a very narrow view of economic transmission studies. The suggested approach would compare the total cost (capital and operating) of new transmission projects to savings in production costs resulting from the new transmission facilities. This "congestion" focus is very unlikely to result in new transmission investments. **New long-distance transmission investment is justified by providing access to lower-cost resources, not by congestion relief.** For the renewable resources needed to meet the 33% RPS, the costs are predominantly capital costs which will not be accounted for in the congestion analysis contemplated by the Draft Study Plan.

The requirements of SB 2 (1x), which have placed limitations on the level of renewable resources that do not have access to transmission capacity to schedule delivery into a California BA, makes the 'congestion' mitigation focus of these economic analysis meaningless for renewable resources. TransWest notes that a study request by Zephyr within the 2011/2012 Transmission Planning Process was not analyzed in part because there was 'no appreciable congestion between Wyoming and California'. While a lack of congestion may be demonstrable, this condition does not mean that wind resources could be delivered in accordance with California's RPS requirements between the sub-regions nor does it mean that such transmission would not be economic. Further study by the CAISO on these regional solutions to determine the relative economics of these alternatives is needed to ensure that the consumer interests are being looked after.

## **Regional Transmission Planning**

Except for a discussion of the Conceptual Statewide Transmission Plan in Section 3.2, the Draft Study Plan makes no mention of coordination with regional transmission planning efforts being undertaken by WECC and the sub-regional transmission planning groups in the Western Interconnection. There is a perception among some participants in these regional transmission planning forums that CAISO and other California transmission planning entities are internally focused and do not place a high priority on coordinating with others. However, at the same time, several California entities have contributed significantly to the WECC 10-Year Regional Transmission Plan and have continued to focus on how to improve the regional transmission planning process to better support the California planning entities. Although CAISO has been expending more effort to participate in regional planning activities in recent months, the absence of any discussion about regional coordination in the Draft Study Plan should be rectified and addressed.

## **TransWest Study Requests**

The 2011 WECC 10-Year Regional Transmission Plan identified four proposed high voltage direct current (HVDC) transmission projects with the potential to produce substantial savings for California consumers by delivering low-cost renewable resources (primarily wind) from Montana, Wyoming and New Mexico. All of these HVDC projects are proposed to terminate in the Eldorado Valley in southeastern Nevada. The analysis conducted by WECC indicated that the existing California transmission network was sufficient to deliver this energy into California.

In response to stakeholder input, CTPG included a scenario in the development of the 2011 Conceptual Transmission Plan with heavy renewable energy imports into southern California. This analysis also indicated that the existing California transmission network was sufficient to deliver this energy into California.

TransWest requests that a study be done by CAISO to confirm the WECC and CTPG results. Specifically, CAISO should add a scenario with 3,000 MW of wind resources delivered by an HVDC line into southeastern Nevada replacing an equivalent amount of energy from the lowest ranking resources in the CPUC's base 33% RPS portfolio. The objective of the study would be to assess the ability of the existing California transmission network to accommodate delivery of these imported resources along with RA deliverability.

This study would address an important regional transmission planning question much like the Central California Study described during the February 28 stakeholder meeting.

## **Contact Information**

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