

June 21, 2011

James Avery, Chairman
California Transmission Planning Group
San Diego Gas and Electric



**2011 Study Request to the California Transmission Planning Group
Southwest Import Scenario Request - Supplemental Information**

Dear Mr. Avery:

The Vote Solar Initiative, on behalf of a diverse group of interested parties¹, hereinafter referred to as the Group, appreciates the opportunity to discuss the Group's submittal regarding Southwest Import Scenarios and respectfully submits this Supplemental Information Letter. The objective of this letter is to provide current information regarding the development of renewable resources in the Southwest that will provide sufficient evidence to support an additional West of River (WOR) study scenario to the one currently being developed by California Transmission Planning Group (CTPG).

Specifically we are interested in the following WOR scenarios:

1. Study Scenario # 1 (WOR - Heavy El Dorado Injection) – 2011 WOR study scenario with the 2010 assumptions (using a 40% Southwest import assumption) with the following injection allocations: 50% at El Dorado, 37% at Palo Verde and 13% at North Gila under heavy autumn conditions;
2. Study Scenario # 2 (WOR – Heavy Palo Verde Injection) – 2011 WOR sensitivity study scenario (using a 40% Southwest import assumption) with the following injection allocations: 50% at Palo Verde, 37% at El Dorado and 13% at North Gila under heavy autumn conditions.

We support both scenarios incorporating the Once-Through-Cooling (OTC) criteria proposed by CTPG.

We focus our comments in this Supplemental Information Letter on increasing the injections at the Palo Verde hub (proposed Study Scenario #2) since the 2010 analysis, and the CTPG follow-on analysis for 2011 incorporating OTC retirements (Study Scenario #1), already examines a higher import scenario via the El Dorado hub. We believe there is great uncertainty as to which injection point will deliver greater amounts of renewable energy to meet California's 33 percent Renewable Portfolio Standard (RPS) and therefore recommend CTPG evaluate the impacts of both scenarios.

Through this Supplemental Information Letter, we will provide information that may not have been available for the 2010 WOR analysis. The supporting evidence this letter provides is divided into three categories: transmission planning activity, interconnection request activity, and stakeholder support.

¹ Parties include The Vote Solar Initiative, Nye County, BEC Environmental Inc., SolarExpress, Solar Millennium, Nevada Office of State Energy, and the Nevada Institute for Renewable Energy Commercialization.

Transmission Planning Activity

Transmission planning activity is an indicator of renewable development potential in a particular area. Four key transmission planning activities have recently completed or are underway in Arizona to enhance the existing transmission system and expand deliverability to California. The four transmission planning activities including brief summaries are:

1. *Arizona Top Three Renewable Transmission Projects*² – In this report, each AZ utility identified the top three renewable development projects in Arizona. While not implicitly aimed at export of renewable resources, the transmission projects when examined from a system perspective could greatly increase the capacity to the Palo Verde hub.
2. *Western Area Power Administration (WAPA) Sonoran-Mojave Renewables Transmission (SMRT) Project Study and Planning Work* - Study participants include Arizona Public Service, Salt River Project, Wellton-Mohawk Irrigation and Drainage District, Imperial Irrigation District, Western Area Power Administration, Starwood, TransElect, and Citizens Energy. The study goal was to determine system impacts associated with constructing new and upgraded transmission lines which would interconnect load centers (in California) with new renewable generation in the Mojave and Sonoran Deserts. A major study objective was to determine maximum injection capability for renewable energy resources onto the SMRT transmission system as a whole.
3. *Merchant Project Development* – Three specific merchant projects, SunZia, High Plains Express, and Southline, could substantially increase the renewable exports from Wyoming and New Mexico to Arizona and potentially utilize the *Top Three Renewable Projects* capacity to the Palo Verde hub. The total estimated transfer capacity if these three projects were completed is estimated at 6,000 MW.
4. *Arizona Biennial Transmission Assessment (BTA) Mandated Renewable Export Analysis* - From Arizona Corporation Commission's (ACC) 6th BTA Signed Order: "The Commission is mindful of the interest in Arizona's abundant supply of renewable energy, and the potential for these energy resources to be tapped by surrounding states to meet their RPS obligations. We would like the utilities to jointly conduct or procure a study, as well as a stakeholder workshop, to identify the barriers to and solutions for enhancing Arizona's ability to export renewable energy, including identifying specific transmission corridors that should be built out in order to accomplish this objective. The study and results of the workshop should be filed at the Commission no later than November 1, 2011, and shall be included as part of the 2012 BTA."

In addition to the Transmission Planning Activities listed above, the ACC 6th BTA included two separate plans for constructing the Arizona portion of the Palo Verde – Devers II 500kV transmission line (PVD2). Southern California Edison (SCE) was one of the entities which re-submitted a portion of the PVD2 which would indicate that SCE continues to see Palo Verde as a significant energy import point. This line has been planned for the sole purpose of delivering energy to California from the Palo Verde Hub area and would increase the import capacity by up to 3,000 MW.

² ACC 6th Biennial Transmission Assessment Staff Report, approved December 2010

Each of these major transmission planning activities is focused on encouraging the developments of renewable resources with the direct or implied directive of enhancing renewable energy export. Additionally, we hope it is recognized that the SMRT transmission project would allow for transfer of the power along the Colorado River to all the three major import points, thus increasing flexibility in injection point balancing. We are not requesting specific consideration of any of the described planning projects or components; rather we have identified these activities as direct indicators of substantial transmission planning activities aimed at exporting, or having the potential to export, substantial amounts of renewable resources to California.

Interconnection Request Activity

Interconnection request activity is likely the key indicator in determining the potential generation development in a given area. Coupled with the significant transmission planning activities we feel it would be fair to consider all or more significant portion of the generation from New Mexico, Wyoming and Arizona for injection at the Palo Verde and North Gila injection points. The table below summarizes the interconnection queue activity since July 15, 2010 - December 1, 2010 and December 1, 2010 - present in APS, ANPP, WAPA, and CAISO interconnection queues for projects that are located within New Mexico, Wyoming and Arizona.

Entity	Dec 1, 2010-Present Interconnection Requests (MW)	July 15, 2010-Dec 1, 2010 Interconnection Requests (MW)
Arizona Public Service	3,257	104
Arizona Nuclear Power Project Switchyard ³	1,000	150
Western Area Lower Colorado	300	360
CAISO	6,650	2,488
Total	11,207	3,102

Table 1 - Summary of interconnection Request Activity by State/Potential Injection Point

The table above shows a 300% increase in interconnection request (MW) from December 1, 2010 until present when compared to the proceeding six months with more than 14,000 MW of new interconnection requests during the one year snapshot. When taken with the significant transmission planning activity that would support a significant portion of the interconnection queue, we feel this provides a strong argument for a second WOR scenario and supports increased export through Palo Verde.

Stakeholder Support

Stakeholder support is an indicator of renewable development potential in a particular area. In addition to the support for WOR scenarios formally expressed by the members of the Group, we understand CTPG received multiple requests for additional or continued WOR study scenarios which demonstrate important stakeholder support. The Group will demonstrate additional stakeholder support for both the

³ Arizona Nuclear Power Project (ANPP) switchyard shall mean those facilities constructed and owned by the ANPP Joint Participants, specifically those in the Palo Verde hub area including Palo Verde, Hassayampa and Harquahala.

High El Dorado and High Palo Verde WOR study scenarios through forthcoming letter(s) of support from other stakeholders.

The Group feels this Supplemental Information Letter provides new and compelling evidence to support both the CTPG WOR - High El Dorado Injection scenario (Scenario #1) and an additional WOR- High Palo Verde Injection scenario (Scenario #2) through demonstration of recent transmission planning activities, increased renewable resource interconnection request activity, and substantial stakeholder interest. We respectfully request that both WOR scenario studies described in this Supplemental Information Letter be included in the 2011 CTPG Study Plan.

Thank you again for consideration of this request.

Sincerely,

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

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cc: Mike Deis, SMUD