PASADENA WATER AND POWER

January 26, 2011

California Energy Commission
Dockets Office
Attn: Docket 11-IEP-1E
1516 Ninth Street, MS-4
Sacramento, CA 95814-5512

Subject: 2011 IEPR Electric Transmission-Related Data Submittal

Ladies and Gentlemen:

The City of Pasadena Water and Power (PWP) is pleased to submit in accordance with the 2011 Integrated Energy Policy Report Request for Data this letter describing the City's bulk transmission system and plans.

Bulk Electric System Description and Needs

In response to question 1, PWP, in and of itself, has no plans to neither build, acquire, nor expand any transmission facilities and therefore has no response to this question.

In response to questions 2 and 3, PWP currently owns or has a partial ownership share in three transmission facilities:

a. A 30/1300 share in the 500kV Pacific DC Intertie between the Nevada-Oregon Border (NOB) and Sylmar, California;
b. A 2.476% share in the 500kV McCullough-Victorville Line 2; and
c. The 220kV Goodrich Substation.

Details regarding transmission line capabilities and upgrades expected to be operational between January 2011 and December 2020 will be provided by the Los Angeles Department of Water and Power (LADWP) and/or Southern California Edison (SCE) for the DC Intertie and by LADWP for the McCullough-Victorville Line 2.

With regard to the 220kV T.M. Goodrich Receiving Station, this substation consists of a five-breaker ring bus feeding three 112MVA 220/34kV transformers. On the Pasadena City (City) side of the transformers, voltage is stepped down to the City's 34kV sub-transmission voltage. The high side of the substation is connected to the Bulk Electric System via two SCE-owned 220kV transmission lines (Gould and Laguna-Bell). Under normal operating conditions, the station is the sole active connection to the Western Electricity Coordinating Council (WECC)

transmission grid through which all power, including renewable energy, is received for consumption by PWP's customers. Under normal operating conditions, the station is also the sole point through which energy generated by PWP's five natural gas-fired plants are delivered into the WECC transmission grid. If the City is separated from SCE by simultaneous outages of both 220kV lines, PWP has the ability to connect its sub-transmission system to LADWP via two 34kV lines to LADWP's Saint Johns Substation, which is limited to approximately 40MW.

PWP's most recent planning studies indicate that an upgrade of T.M. Goodrich Receiving Station's total transformation capability to 448MVA (by adding a fourth 112MVA transformer) will be appropriate when the system peak load reaches about 342MW. Until the summer of 2010, growth of peak load had been essentially flat, making the projected date of an expansion indeterminate and subject to further studies. During the summer of 2010, a new peak (320MW) was reached, requiring an updated planning study to be scheduled. Due to the design of the City's backbone sub-transmission system and the City's geographical layout, reliable transfer capability at this station is required to meet the City's load. The upgrade described above is intended for reliability purposes as the substation's current rating is sufficient to meet the City's Renewables Portfolio Standard (RPS) and load requirements.

In response to question 4, PWP is not planning to undertake any maintenance or construction projects that could impact transfer capability between January 2011 and December 2013 at its T.M. Goodrich Receiving Station.

In response to question 5, there are no plans beyond 2020 for further upgrades to the T.M. Goodrich Receiving Station.

Transmission Corridor Needs

Based on ratings, peak electrical loads, and the current configuration of, and connection to the SCE system, the City has no need to build or participate in a transmission corridor project in the near future.

If you have any questions of comments regarding the information submitted above, please feel free to contact me at (626)744-7599 or sendo@cityofpasadena.net.

Sincerely,

Steven K. Endo, P.E.
Principal Engineer
Pasadena Water and Power Department