

**Metropolitan Domestic Water Improvement District
Board of Directors Meeting**

December 12, 2011

Renewable Power Supply

Synopsis

The District began this year using renewable power by installing a solar system at its District office. Staff has been examining since November 2009 another renewable power supply option which may help lower electrical costs associated with recovering CAP water from the Avra Valley Recharge Project. In November 2011, the U.S. Congress approved legislation to reallocate Hoover Power beginning in 2017. Hoover Power is a renewable energy and inexpensive at 3.6 cents per kilowatt-hour. Direction is requested by staff if the Board of Directors desires qualifications and costs for contracting with professionals to complete a Hoover Power supply application.

Overview

Hoover Dam Power contractors in Arizona, California and Nevada obtained approval in November 2011 from Congress on legislation to renew their electric power contracts. The current 25 year contract will expire in 2017. The “Hoover Power Reallocation Act of 2009” (HB 4349) renews Schedule A and B contracts with its current customers for 50 years so that it would coincide with their 50 year commitment to fund the Lower Colorado River Multi-Species Conservation Program. In addition, each existing customer would contribute 5 percent of its capacity and energy to create a new pool of electric power called Schedule D. The new pool was the result of system improvements in the dam’s infrastructure to produce larger amounts of electric power. This new pool has been characterized as for federally recognized Indian Tribes and other eligible entities that do not currently purchase Hoover power.

Issues

The total annual amount of firm electrical power identified in Schedule D for reallocating within Arizona to Indian Tribes and other eligible entities totals 25,113,000 kWh. Arizonans working on the legislation have said the Schedule D power has been structured that after 18 months from the bill passage 2/3 of the pool would be marketed to the Indians and the other new entities. The Arizona Power Authority would set the criteria for dividing the firm power among the new eligible entities.

The District’s annual electrical use in Metro-Main is 9,000,000 kWh and 800,000 kWh in Metro-Hub. The Metro-Main’s summer monthly usage of 1,000,000 kWh equals about 34 percent of the proposed monthly summer reallocation. The winter monthly usage of 650,000 kWh is 52 percent of the monthly winter reallocation. Therefore, the District could face stiff competition to get all of its energy needs met from the reallocation. However, a power allocation for recovering and delivering CAP water from the Avra Valley Recharge Project would be strategic for the District in lowering

those future energy costs.

The legislation does require that new eligible entities proportionally reimburse Schedule A and B entities for their financial investments to make Hoover Dam a more efficient facility to produce greater amounts of electrical power. This cost share has not been quantified yet. Presently, the average customer cost for Hoover power is 3.6 cents per kilowatt hour. This cost does not include transmission costs to the customer from the electric grid.

Another concern will be the long-term viability of the power supply. Equipment improvements at Hoover Dam have increased power production levels even as Lake Mead has dropped to all time lows from the 10 year drought, but there is a risk if production levels can be maintained during longer-term drought conditions of 20 to 40 years.

Eligibility

District staff submitted the attached letter to the Arizona Power Authority (APA) asking if the District would be eligible for a Hoover Power contract. APA Legal staff responded favorably that the District would be eligible for a contract from either Schedule A, B, or D. The APA announced at its November 2011 meeting that staff is preparing guidance on the application process.

Staff has observed that the customer representation at the APA meetings is dominated by attorneys. This is because of the myriad of federal and state laws that govern and effect electrical power contracts. Staff does not have expertise in the Hoover Power reallocation process nor federal and state law affecting Hoover power.

Staff Recommendation

It is recommended that the Board of Directors direct staff to work with Legal Counsel to determine if Legal Counsel has the expertise to develop an application. Staff and Legal Counsel would also develop the costs involved to own a Hoover contract and determine if the benefits of having Hoover Power outweigh those costs. The information gained would be brought back to the Board to determine how to proceed next.

Suggested Motion

The Board is requested to direct staff to work with Legal Counsel to determine if an application can be developed along with the costs that would be involved with owning a Hoover contract. No formal motion is necessary.

Respectfully submitted,

Warren Tenney
Assistant General Manager

I concur with staff's recommendation.

Respectfully submitted,

Mark R. Stratton, P.E.
General Manager