



# INTEROFFICE MEMO

EUGENE WATER & ELECTRIC BOARD  
Power Resources Division

*Rely on us.*

TO: Commissioners Farmer, Brown, Cassidy, Cunningham and Ernst

FROM: Dan Morehouse, Colleen Wedin, and Eric Hiaasen

November 3, 2009

RE: 2010 Customer Generation Rates

---

## *Issue Statement*

EWEB's customer generation policy establishes requirements for interconnecting customer-owned generation to EWEB's electric system and sets rates for the purchase of generation from those systems. The Policy specifies the Rate Schedules are subject to annual review and may be adjusted or amended at the discretion of the Board. This memo and the attached Power Purchase Rate Schedules describe the results of staff's annual review and recommendations for customer-owned generation payment rates for 2010.

## *Background*

EWEB has offered a solar electric generation program since 2001. To date, 114 customer generation systems have been installed with a nameplate capacity of almost 2.1 MW. The systems produce approximately 2.3 million kWh annually. Installed capacity in 2009 will be approximately 300 kW. In the first three quarters of 2009, Energy Management staff has received over 500 calls regarding solar electric generation. Staff anticipates continued interest in photovoltaic generation in 2010.

The Customer Generation Policy provides rate schedules for purchasing electricity from four different customer-generation configurations as described in the attached 2010 Power Purchase Rate Schedules.

The rate for each generation configuration is based on an analysis that considers power market forecasts for electricity, the value of renewable energy credits (RECs), customer participation forecasts, the cost of servicing and maintaining generation accounts, and the value of reduced transmission and distribution losses resulting from local generation of electricity. In addition, for the Solar Electric Generation Purchase Rate, the value of the Bonneville Power Administration Renewable Rate Credit is included. The Bonneville Renewable Rate Credit allows a portion of EWEB's Conservation Rate Credit to be offset using investments in renewable energy.

## *Discussion*

Several years ago, staff developed a financial analysis model to assist in setting rates for customer generation. Staff recently updated the inputs to the model to reflect changes since last year. Staff found significant changes in the power market and the value of RECs. The annual Bonneville Renewable Rate Credit payment remains essentially the same as 2009.

The Small Renewable Net-Metered, Renewable Electric Generation Purchase Rate and Non-Renewable Electric Net-Metered Schedules are derived directly from power market forecasts with consideration for REC values where appropriate. Based on analysis of these factors, the recommended rates are as follows:

- Small Renewable Net-Metered                      \$.0722 per kWh
- Renewable Electric Generation                      \$.04609 per kWh
- Non-Renewable Electric Net-Metered                      \$.03365 per kWh

The analysis for the Solar Electric Generation Purchase Rate Schedule uses a more complex model that evaluates the ten-year levelized value of the power market forecast, REC values, the first year Bonneville Renewable Rate Credit payment, customer participation forecast and other factors over the ten-year period of the generation purchase contract. An iterative process is used to seek a rate that yields a benefit cost ratio of 1.0 for EWEB. This outcome provides a full sharing of the costs and benefits with the customer-generator. Staff used the updated input assumptions and values in the financial model and ran scenarios for several potential program participation levels.

The resulting rates centered on a generation payment rate of \$0.11 per kWh for the first tier of generation, and \$0.071 per kWh for the second tier of generation. Installation costs of solar electric generation have decreased by approximately 15% over the past twelve months, therefore the proposed generation rate results in roughly the same benefit cost ratio for the customer as in 2009.

All 2010 recommended rates create a break-even scenario for EWEB and pay 100% of EWEB's forecasted value to the customer.

***Recommendation***

Staff recommends the Board approve the attached 2010 Power Purchase Rate Schedules and adopt Resolution Number 0926, continuing the purchase of customer-generated electricity under the new rate schedule.

***Requested Board Action***

Staff is requesting the Board approve this recommendation and execute Resolution Number 0926.

***Attachments:***

Updated 2010 Power Purchase Rate Schedule (Excerpted from EWEB Customer Services Policies and Procedures, E-VI-7 through 11)

Resolution Number 0926

**Power Purchase Rate Schedules (Excerpted from EWEB Electric Customer Services Policies and Procedures, E-VI-7 through 11)**

**F. Power Purchase Rate Schedules**

The following Power Purchase Rate Schedules are available to EWEB Customers with Customer Generation (CG) Systems as applicable:

- Small Renewable Net-Metered Rate
- Solar Electric Generation Purchase Rate
- Renewable Electric Generation Purchase Rate
- Non-Renewable Net-Metered Rate

These Rate Schedules are subject to annual review and may be adjusted or amended at the discretion of the EWEB Board. Service under all Schedules is subject the policies and procedures of EWEB.

**1. Small Renewable Net-Metered Rate Schedule  
(For Generation Less than 100 kW)**

a. Applicability

Small Renewable Net-Metered Rates shall apply to a CG System interconnected in parallel to EWEB on the Customer’s side of the meter and sized such that it primarily offsets the Customer’s load at the site.

Small Renewable Net-Metered Rates are available only to a CG System with an installed output capacity less than 100 kW, that uses solar power, wind power, fuel cells, hydroelectric power, landfill gas, digester gas, waste, dedicated energy crops available on a renewable basis, or low-emission, non-toxic biomass based on solid organic fuels from wood, forest, or field residues.

b. A Customer who uses the net-metered approach shall be responsible to pay the monthly basic charge, demand charge, energy charge, distribution charge and reactive charge applicable to its rate class.

c. At the end of each monthly meter reading cycle, excess energy generated by the CG System as measured by EWEB’s billing meter shall be credited at the excess generation rate listed below. The resulting amount shall be credited to the Customer’s EWEB bill in that same billing cycle.

d. Monthly Small Renewable Net-Metered Rate

Excess generation for CG Systems will be credited based on the following rate:

All kWh of excess generation.....\$0.0722 per kWh

**2. Solar Electric Generation Purchase Rate Schedule  
(For Generation Greater than 10 kW and Less than 1,000 kW)**

a. Applicability

Rate schedule applies to residential, commercial, industrial and public agency Customers with solar electric systems that are connected directly to the EWEB electric system and whose nameplate capacity is greater than 10 kW and less than 1,000 kW.

Rate schedule applies to the purchase of electrical energy generated by Customer's solar electric system. Purchase rate shall be applied to Standard Offer contracts for solar electric systems interconnected to EWEB in 2010.

b. 2010 Solar Electric Generation Purchase Rate

**Summer** (April through September billing cycles)

First 45,000 kWh per month.....\$0.11 per kWh

Over 45,000 kWh per month.....\$0.071 per kWh

**Winter** (October through March billing cycles)

First 30,000 kWh per month.....\$0.11 per kWh

Over 30,000 kWh per month.....\$0.071 per kWh

c. Energy delivered to the EWEB system will be credited to Owner's generation account monthly according to the Rate Schedule above. Payments for solar electric generation credits will be issued once per year in December in the form of a check.

**3. Renewable Electric Generation Purchase Rate Schedule  
(For Generation Greater than 100 kW and Less than 1,000 kW)**

a. Applicability

Rate schedule applies to residential, commercial, industrial and public agency Customers with EWEB approved renewable energy generation systems that are connected directly to the EWEB electric distribution system, that have an installed output capacity greater than 100 kW and less than 1,000 kW, and that use wind power, fuel cell, hydroelectric power, landfill gas, digester gas, waste, dedicated energy crops available on a renewable basis, or low-emission, non-toxic biomass based on solid organic fuels from wood, forest, or field residues.

Rate schedule applies to the purchase of electrical energy generated by Customer's renewable energy generation system. Purchase power rate shall be applied to Standard Offer contracts for renewable electric generation systems connected to EWEB in 2010.

b. 2010 Renewable Electric Generation Rate

All purchased power.....\$0.04609 per kWh

c. Energy delivered to the EWEB system will be credited to Owner's generation account monthly according to the Rate Schedule above. Payments for renewable electric generation credits will be issued once per year in December in the form of a check.

**4. Non-Renewable Electric Net-Metered Rate Schedule  
(For Generation Less than 1,000 kW)**

a. Applicability

Non-Renewable Electric Net-Metered Rates shall apply to a CG System interconnected in parallel to EWEB on the Customer's side of the meter that uses fossil fuel or any other non-renewable fuel source and is sized such that it primarily offsets the Customer's load at the site.

Non-Renewable Electric Net-Metered Rates are available only to CG Systems with an installed output capacity less than 1,000 kW.

b. A Customer who uses the net-metered approach shall be responsible to pay the monthly basic charge, demand charge, energy charge, distribution charge and reactive charge applicable to its rate class.

c. At the end of each monthly meter reading cycle, excess energy generated by the CG System as measured by EWEB's billing meter shall be credited at the excess generation rate listed below. The resulting amount shall be credited to the Customer's EWEB bill in that same billing cycle.

d. Monthly Non-Renewable Electric Net-Metered Rate

Excess generation for CG Systems will be credited based on the following rate:

All excess power.....\$0.03365 per kWh

**RESOLUTION NO. 0926**

**November 2009**

**Customer Generation Rates Revision**

**WHEREAS**, the Eugene Water & Electric Board (EWEB) has developed an Integrated Energy Resource Strategy as a means of ensuring an adequate energy supply for its customers and supporting the development of renewable energy resources; and

**WHEREAS**, in response to this strategy, EWEB has developed a Customer Generation Policy to support the installation of electric generation systems by customers within the utility's service area; and

**WHEREAS**, EWEB's Customer Generation Policy includes rate schedules for the purchase by EWEB of the electric output from customer-generation installations at established per kilowatt-hour rates; and

**WHEREAS**, such purchase rates are not affiliated with nor do they otherwise affect rates charged for electricity supplied to customers by EWEB for normal distribution service; and

**WHEREAS**, the Board has reviewed background concerning EWEB's Customer Generation Policy parameters and proposed rates for said power purchases from qualifying customer installations for consideration and approval on its November 3, 2009 Consent Calendar.

**NOW, THEREFORE, BE IT RESOLVED** by the Eugene Water & Electric Board that:

1. The Board hereby adopts the Customer Generation Policy Rate Schedule as presented and proposed by staff; and
2. Grants the General Manager or his designees the continuing authority to enter into Standard Offer contracts for the purchase of customer-generation system output at the established purchase rates, as may be generally amended from time to time.

DATED this 3rd day of November 2009.

THE CITY OF EUGENE, OREGON  
Acting by and through the  
Eugene Water & Electric Board

---

President

I, DEBRA J. SMITH, the duly appointed, qualified, and acting Assistant Secretary of the Eugene Water & Electric Board, do hereby certify that the above is a true and exact copy of the Resolution adopted by the Board at its November 3, 2009 Regular Board Meeting.

---

Assistant Secretary