

## **RENEWABLE ENERGY PROPERTY ASSESSMENT**

### **LOCALLY ASSESSED RENEWABLE ENERGY PROPERTY**

Effective for the 2008 tax year forward, Colorado assessors are required to discover, classify, list, and value all taxable renewable energy property used to produce two (2) megawatts or less of alternating current electricity.

#### **Valuation of real and personal property that produces alternating current electricity from a renewable energy source.**

*(1) (a) except as provided in paragraph (b) of this subsection (1), on and after January 1, 2008, all real and personal property used to produce two megawatts or less of alternating current electricity from a renewable energy source shall be valued by the assessor in the county where the property is located in accordance with valuation procedures developed by the administrator.*

#### **§ 39-5-104.7, C.R.S.**

#### **Classification**

For Colorado property taxation purposes, renewable energy systems as defined under § 40-1-102 (11), C.R.S., that are used to produce two (2) megawatts or less of alternating current electricity are classified as personal property and assessed by the county assessor. The following are examples of renewable energy systems (property): photovoltaic panel (solar), hydroelectric, and wind turbine property.

#### **Valuation**

Under the provisions of article X, section 3, of the Colorado Constitution, assessors must consider the cost, market, and income approaches to value in their appraisal of taxable personal property.

In applying the cost approach, the replacement cost new (RCN) estimate is developed based on the following information:

1. the cost per kilowatt published by the Division of Property Taxation, and
2. the electricity generating capacity of the property as provided by the taxpayer.

With this information, the RCN is developed by multiplying the cost per kilowatt times the electricity generating capacity of the subject. The RCN estimate represents the reasonable costs of acquisition, installation, sales tax, and freight of comparable non-renewable property as of the January 1 assessment date. The RCN estimation method will be applied to all locally assessed renewable energy property capable of producing two megawatts (2,000 kilowatts) or less of alternating current electricity.

Renewable energy property cost per kilowatt information is provided in the annual Division study titled **RENEWABLE ENERGY ASSESSMENT THRESHOLD ANALYSIS** which is located under the State Assessed section of the Division of Property Taxation website at [http://dola.colorado.gov/dpt/state\\_assessed/index.htm](http://dola.colorado.gov/dpt/state_assessed/index.htm).

Annual depreciation, based on the age of the system, will be applied utilizing a newly devised Industry Category 14 (renewable energy industry category) with a twenty (20) year economic life using the Division's "General Percent Good Table" and "Level of Value (LOV) Adjustment Factor" as published in ARL 5, Chapter 4.

The steps for utilizing the cost approach to value the renewable energy property follow:

1. Ascertain the electricity production capacity (e.g., 30 kilowatts), year of acquisition, installation, and first use of the renewable energy property. This information comes from the declaration schedule completed by the owner or from additional information requests and contacts, if necessary.
2. Multiply the productive capacity of the system in kilowatts (kw) by the rate per kilowatt listed in the **RENEWABLE ENERGY ASSESSMENT THRESHOLD ANALYSIS** study for the appropriate alternating current electricity production capability. The resulting number represents the estimated replacement cost new of the property as of the assessment date. For 2008, the rate is \$1,008 per kilowatt for all systems up to and including two (2) megawatts (2,000 kilowatts).
3. Adjust for depreciation by multiplying the estimated replacement cost new by the percent good based on the age of the system. The percent good is based on the twenty (20) year life table published by the Division of Property Taxation in Chapter 4. The result represents the replacement cost new less depreciation of the renewable energy property as of the assessment date.
4. Multiply the estimated RCNLD by the Industry Category 14 level of value (LOV) adjustment factor to derive the estimated actual value as of June 30 of the most recent previous even year.

An example of the valuation process is shown below:

On December 15, 2007, a roof-mounted thirty (30) kilowatt photovoltaic (PV) solar panel system was installed on a restaurant. The system was installed in 2007 and therefore the property is valued for the 2008 tax year as one (1) year old.

Valuation of the PV system is calculated as follows:

30	Capacity in kilowatts
x <u>    \$1,008</u>	Rate per kilowatt
\$30,240	Estimated RCN
x <u>    0.98</u>	Percent good from the 20 year life depreciation table
\$29,635	Estimated RCNLD
x <u>    0.97</u>	Level of value adjustment factor
<u>    \$28,594</u>	Estimated actual value as of the June 30 previous even year

### Market and Income Valuation of Renewable Energy Property

An assessor must consider both the sales comparison (market) and income approaches. Under the provisions of 39-4-102 (1)(e), C.R.S., the actual value of any renewable energy property cannot exceed the value of the property derived using the cost approach.

## Assessment of Renewable Energy Credits by County Assessors

Renewable Energy Credits (RECs), also known as “green tags” or “renewable energy certificates”, are tradable environmental commodities that represent proof that one (1) megawatt-hour (MWh) of electricity was generated from an eligible renewable energy resource. These certificates can be sold and traded and the owner of the REC can claim to have purchased renewable energy.

RECs are classified as intangible personal property and, exempt pursuant to 39-3-118, C.R.S., so they cannot be separated out and valued by the county assessor.

### **STATE ASSESSED RENEWABLE ENERGY SYSTEMS**

All renewable energy systems greater than two (2) megawatts in size are valued as public utility property by the State Assessed Properties Section of the Division of Property Taxation (Division). Also classified as public utility property valued by the Division are wind energy facilities defined pursuant to § 39-4-104 (4), C.R.S.