

ORDINANCE #248

AN ORDINANCE PROVIDING FOR REGULATING PRIVATE USE WIND AND SOLAR ENERGY CONVERSION SYSTEMS FOR THE PRODUCTION OF ELECTRICITY FOR USE ON THE SUBJECT SITE AND NET METERING THROUGH THE POWER COMPANY FOR AND WITHIN THE CITY OF COLTON, SOUTH DAKOTA.

BE IT ORDAINED BY THE CITY COUNCIL OF THE CITY OF COLTON, SOUTH DAKOTA:

In order to balance the need for clean, renewable energy production with the health, safety and welfare of the community of Colton, South Dakota, the purpose of this section is to regular private use wind and solar energy conversion systems for the production of electricity for use on the subject site and net metering through the power company.

Section 1. Applicability and Definitions

- a) Private Use Wind and Solar Energy Conversion Systems.
A private use wind and/or solar energy conversion system can consist of a wind turbine, tower, solar panels and associated control or conversion electronics for the purpose of producing electrical power for a lawful principle use. A system having a rated capacity of 10 kilowatts (kW) or less for residential use or 100 kW or less for non-residential uses shall be considered a private system for the purposes of these regulations. Wind and Solar Energy Conversion Systems are allowed in all zoning districts within the city limits of Colton.

- b) Wind Turbine
A component of a Wind and Solar Energy Conversion System that converts energy from wind into electrical energy, independent of the electrical conductors, electrical storage system, electrical metering, or electrical

inverters. This term shall include the supporting structures, poles or towers that support wind turbines.

- c) Solar Panel
A structure containing solar cells that collects sunlight and converts it to electrical energy. This term shall include the supporting structures that secure solar panels.
- d) Tower Height
The height above adjacent grade of the fixed portion of any stand alone tower, excluding the wind turbine itself.
- e) Total Extended Height
The height above adjacent grade to a blade tip at its highest point of travel and including any other portion of the system.
- f) Building/Fire Code
All codes, ordinances, policies, procedures and standards adopted and enforced by the Colton City Council.
- g) FAA
The use of this acronym shall denote the Federal Aviation Administration that regulates air safety within the Colton, South Dakota jurisdiction.
- h) Special Use Permit
Private use wind and solar energy conversion systems shall be allowed as accessory uses in all public zoning districts without the requirement of a Special Use Permit approval **provided** the system meets all other requirements of this section.
- i) Building Permit
All proposed Private Use Wind and Solar Energy Conversion Systems within the city limits of Colton must receive a building permit from the City of Colton, South Dakota.

Section 2 Standards

All Private use Wind and Solar energy Conversion Systems are subject to, and must comply, with the following provisions of this section.

- a) Setbacks
Minimum setbacks for private use wind turbines shall be a minimum of 0.5 times the total extended height from any adjacent property lines. This minimum setback includes any part of the turbine, rotors, tower structure or support buy wires.
- b) Number Per Parcel
A maximum of two (2) free standing tower or roof top pole mounted wind turbines and/or six (6) integrated roof top wind turbine systems is permitted on parcels less than one (1) acre in size. Agricultural and/or business applications that can demonstrate and document increased energy production needs can exceed these system maximums with approval of the proposed energy production system from the Colton City Council.
- c) Height
Maximum free standing tower height is thirty-five (35) feet above adjacent grade. Maximum free standing total extended height is forty (40) feet above adjacent grade. Maximum total extended height of pole mounted roof top wind turbine systems is ten (10) feet above adjacent roof grade.
- d) Lighting
Wind system towers shall not be artificially lighted unless required, in writing, by the FAA that regulates air safety-or-by the Colton City Council due to emergency medical evacuation and transport related safety concerns. When required, the lighting shall be within the intensity range allowable under FAA regulations; the fixtures shall be shielded and directed to minimize glare and visibility from the ground; and no strobe lighting shall be

permitted – unless expressly required in writing by the FAA or the Colton City Council.

e) Access

All wind turbine towers shall be designed and installed so that there shall be no exterior stop bolts or a ladder on the tower readily accessible to the public for a minimum height of twelve (12) feet above adjacent grade. For lattice or guy wired towers, sheets of metal or wood similar barrier shall be fastened to the bottom tower section such that it cannot be readily climbed; and all ground-mounted electrical and control equipment components shall be labeled and secured by a locking device to prevent unauthorized access.

f) Rotor Safety

Each wind turbine shall be equipped with automatic or furling breaking system to limit the rotational speed of the blade within the design limits of the rotor. The minimum distance between the ground grade and any protruding blades utilized on a wind turbine is ten (10) feet as measured from the lowest point of the arc of the blade array.

g) Noise

No wind turbine or combination of wind turbines on a single parcel shall create noise that exceeds a maximum of sixty (60) decibel (dBA) at any adjacent property line. Any wind turbine(s) found to exceed this level shall cease operation upon notification by the City of Colton, SD and may not resume operations until the noise levels have been reduced and verified to be operating within the allowed maximum dBA.

h) Aesthetics

All Private Use Wind and Solar Energy Conversion Systems, unless subject to applicable FAA standards, shall be a non-intrusive color such as tan, sand, gray, black or similar neutral colors. Galvanized steel or metal is acceptable for support structures. Painting or coating

of all system components shall be kept in good repair for the life of the system.

- i) Maintenance
All Private Use Wind and Solar Energy Conversion Systems shall be maintained in good repair, as recommended by the manufacturer's scheduled maintenance or industry standards. All electrical wire leading from free standing systems to electrical control components shall be located underground in compliance with the State of South Dakota electrical code requirements.
- j) Signs/Labels
There is a limit of one (1) advertising sign allowed for Private Use Wind and Solar Energy Conversions Systems, not exceeding one (1) square foot in size unless otherwise approved by the Colton City Council.
- k) Compliance With FAA Regulations
All Private Use Wind and Solar Energy Conversions System components shall comply with any and all applicable FAA regulations, including any necessary approvals for installation.
- l) Certified Safe
Components within each Private Use Wind and Solar Energy Conversion System must carry either a CE< ISO or UL rating and must be installed by a licensed and certified electrician in accordance with accepted industry standards on insure safe operation for the intended purpose.

Section 3 Repair and Removal of Private Use Wind and Solar Energy Conversion Systems.

Any Private Use Wind and Solar Energy Conversion System found to be unsafe by the City of Colton, SD shall immediately cease operation upon notification from same and shall be

repaired by the owner to meet federal, state and local safety standards and codes or be removed within six (6) months from time of notification and cessation of operation.

- a) When a Private Use Wind and Solar Energy Conversion System is removed from a site, all associated and ancillary equipment, batteries, devices, structure or support(s) shall also be removed. For the purposes of this section, non-operational shall be deemed to include, but not limited to, the blades of the wind turbine remaining stationary so that wind resources are not being converted into electrical or mechanical energy, or the Private Use Wind and Solar Energy Conversion System is longer connected to the public utility electricity distribution system.

Section 4 Mounting of Wind Turbines

Attachment of any wind turbine, including any support or structural components, to any building or structure, shall be in strict compliance with accepted industry standards and shall comply with any and all existing and applicable fire and building codes.

Section 5 All Standards Are Absolute

Once Private Use Wind and Solar Energy Conversion Systems are permitted, the owners have the option of compliance with the standards or discontinuation of operations and removal of the Private Use Wind and Solar Energy Conversion System, If the operation of the Private Use Wind and Solar Energy Conversion System does not comply with the provisions of this ordinance, the owner shall promptly take any and all measures necessary to bring the system into compliance or discontinue operation and remove the system.

Section 6 Special Use Permit

Any and all variations or deviation from the regulations and Standards of this ordinance may only be permitted by a Special Use Permit, approval pursuant by the Colton City Council.

The forgoing ordinance was introduced by Matthew Swartwout, who moved for its passage and adoption; Ryan Tellberg seconded the motion. A roll call vote was taken with Karen Burgers, LeRoy Koopman, Jeffrey Pedersen, Jack Schmidt, Matthew Swartwout and Ryan Tellberg all voting aye.

Whereupon Mayor Erik Miller declared the ordinance passed and adopted and instructed the Municipal Finance Officer to publish this ordinance in the official newspaper of the city and to comply otherwise with all applicable notice requirements of the law.

Adopted this 12th day of October, 2009.

Erik Miller
Mayor

ATTEST:

Gail DeJong
Municipal Finance Officer

1 st Reading	Sept. 14, 2009
2 nd Reading & Adoption	Oct. 12, 2009
Publication Date	Oct. 21, 2009
Effective Date	Nov. 10, 2009

