

CHAPTER 25. ZONING.

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DIVISION A. IN GENERAL.

ARTICLE VI.C. Wind energy systems.

§ 25-69. Purpose.

The purposes of this article are to foster the development of alternative power resources and to provide standards for placement and design to facilitate a safe natural environment which does not harm or hinder living beings. The requirements set forth herein shall strive to protect the County's rural and scenic landscape and cultural and historic sites.

§ 25-69.1. Definitions.

Anemometer, Wind Monitoring, or Meteorological Tower. A temporary tower equipped with devices to measure wind speeds and direction, and used to determine how much wind power a site can be expected to generate.

Balloon Test. A technique utilizing a balloon to demonstrate the height of a proposed wind energy structure.

Height, System. The height of a wind turbine measured from existing lowest grade to the tip of the rotor blade at its highest point, or blade-tip height.

Shadow Flicker. The visible flicker effect when rotating turbine blades cast shadows on the ground and nearby structures causing the repeating pattern of light and shadow.

Wind Energy System. Wind energy systems include all equipment, machinery and structures utilized in connection with the conversion of wind to electricity. This includes, but is not limited to, transmission, storage, collection and supply equipment, substations, transformers, service and access roads, and one or more wind turbines.

Wind Farm. A parcel of land on which three (3) or more wind turbines are sited for the purpose of electricity generation.

Wind Turbine. A device that converts kinetic wind energy into rotational energy that drives an electrical generator. A wind turbine typically consists of a tower, nacelle body, and a rotor with two or more blades.

§ 25-69.2. Applicability.

This article applies to all wind energy systems proposed to be constructed after the effective date of this article and to all energy systems which request to be altered from their original state of permit, excluding any necessary monitoring or maintenance of the wind energy system.

§25-69.3. Use of consultant.

The County reserves the right to employ the services of a wind energy consultant to review all applications. All applicable costs will be the responsibility of the applicant. The recommendations of the consultant will be considered by the Zoning Administrator and the board of zoning appeals in making their decision as to whether or not to issue an Administrative or Special Use Permit for a wind energy system.

§ 25-69.4. Site plan required.

A site plan meeting the requirements of ARTICLE LXVII, "Site Plan Review" of this chapter shall be submitted at the time of application for an Administrative or Special Use Permit. Comments received from applicable agencies will be provided to the Zoning Administrator and/or board of zoning appeals before any permit is granted.

§25-69.5. Uses permitted by administrative permit.

A. The uses listed in this section shall be permitted only upon the issuance of an Administrative Permit by the Zoning Administrator pursuant to the provisions of ARTICLE LVI of this chapter. Administrative permits are to be issued only for systems where the applicant can demonstrate that the proposal meets the standards required by this chapter and the system will not have an undue adverse impact on the surrounding neighborhood.

B. The uses listed in this section shall be permitted in General Agriculture (GA), General Business (GB), and General Industrial (GI) zoning districts subject to compliance with this article and provided that:

1. The wind energy system is no more than eighty feet (80') in height;
- and
2. Where no more than two (2) systems are located on a parcel; and
 3. Where no lighting of any kind is located on the wind turbine; and
 4. The applicant shall provide evidence that the provider of electric utility service to the site has been informed of the applicant's intent to install an interconnected customer-owned electricity generator, unless the applicant intends, and so states on the application, that the system will not be connected to the electricity grid; and
 5. The applicant will provide information demonstrating that the system will be used primarily to reduce on-site consumption of electricity.

C. For purposes of testing and monitoring, an anemometer may be installed with the issuance of an Administrative Permit renewable and valid for one (1) year, provided:

1. It must be set back one hundred ten percent (110%) of the height of the anemometer from all property lines; and

2. It must be set back one hundred fifty percent (150%) of the height of the anemometer from any neighboring dwelling or commercial building.

D. Standards applicable to wind energy systems permitted by Administrative Permit.

1. Setbacks. Setback requirements shall not preclude the construction of habitable buildings on adjacent parcels following construction of the structure. In addition, the following setbacks shall be observed:

a. The minimum distance from the base of any wind turbine tower to all adjacent property lines shall be one hundred ten percent (110%) of the system height and one hundred fifty percent (150%) of the system height from any neighboring dwelling or commercial building; and

b. Any structure considered accessory to the turbine should adhere to the setbacks required in the district the turbine is located; and

c. Setback areas should be kept free of all structures and parking lots.

2. Height.

a. The minimum distance between the ground and any protruding blades utilized on a wind turbine shall be fifteen feet (15'), as measured at the lowest point of the arc of the blades; and

b. Wind turbines standing alone shall be secured by anti-climbing devices unless determined by the County not to be warranted.

3. Site control. The applicant shall submit documentation of the legal right to install and use the proposed system at the time of application.

4. Noise. Wind energy systems shall not exceed sixty (60) decibels (dB(A)), as measured at the closest property line. The level may be exceeded during short-term events such as severe windstorms. The applicant is responsible for providing information from a certified technician stating that noise levels are in compliance with these standards.

5. Shadow/Flicker. Wind energy systems shall be sited in a manner that does not result in shadowing or flicker impacts. The applicant shall provide documentation from a registered professional engineer that no shadow/flicker impacts are found. If this standard cannot be met and certified by a registered professional engineer, the applicant must make application for a Special Use Permit and provide mitigation efforts to the board of zoning appeals.

6. Location. No wind energy system shall be located on a vacant parcel unless it is proven to be accessory to a dwelling or commercial building and that parcel is located within a distance such that the wind energy system is able to service the dwelling or commercial building.

7. Federal and state regulations. Wind energy systems shall meet or exceed all applicable federal and state standards and regulations set forth by the Federal Aviation Administration (FAA), Department of Environmental Quality (DEQ), State Corporation Commission (SCC), and other agencies with the authority to regulate such systems.

8. Signs. No signs or advertising of any type may be placed on the wind energy system unless required by any state or federal agency.

9. Notification of adjoining property owners. Upon receipt of an application for an Administrative Permit for the construction of a new wind energy system, the Zoning Administrator shall send by first class mail written notice of such application to all adjoining property owners as shown on the current real estate assessment books.

a. Action if objection received.

If written objection is received from an adjoining property owner within twenty-one (21) days following the mailing of said notice, the application shall be denied, and the applicant advised that the requested system may be constructed or placed only upon the approval of a Special Use Permit by the board of zoning appeals.

b. Action if no objection received.

If no written objection is received from an adjoining property owner within twenty-one (21) days following the mailing of said notice, and the applicant meets all other requirements of this section, the Zoning Administrator may approve the Administrative Permit.

§25-69.6. Uses permitted by special use permit.

A. General standards applicable to all Special Use Permits. No Special Use Permit shall be issued without consideration that, in addition to conformity with any standards set forth in this chapter for Special Use Permit uses, the following general standards will be met either by the proposal made in the application or by the proposal as modified or amended and made part of the Special Use Permit:

1. Conformity with Comprehensive Plan and policies. The proposal as submitted or as modified shall conform to the Comprehensive Plan of the county or to specific elements of such plan, and to official policies adopted in relation thereto, including the purposes of this chapter.

2. Impact on neighborhood. The proposal as submitted or as modified shall not have undue adverse impact on the surrounding neighborhood.

B. The uses listed in this section shall be permitted in General Agriculture (GA), General Business (GB), and General Industrial (GI) zoning districts subject to compliance with this article and provided that:

1. The wind energy system is greater than eighty feet (80') in height; and
2. Where no more than two (2) systems are located on a parcel; and/or
3. Where a wind energy system/s are lighted; and/or
4. Facilities where the required setback requirements cannot be met; and/or (Ord. 09/28/11)
5. Where objections have been received for systems which are otherwise permitted by Administrative Permit. (Renumbered Ord. 09/28/11)

C. Standards applicable to wind energy systems permitted by Special Use Permit.

1. Setbacks. Setback requirements shall not preclude the construction of habitable buildings on adjacent parcels following construction of the structure. In addition, the following setbacks shall be observed:

a. The minimum distance from the base of any wind turbine tower to all adjacent property lines shall be one hundred ten percent (110%) of the system height and one hundred fifty percent (150%) of the system height from any neighboring dwelling or commercial building unless the board of zoning appeals finds that a lesser setback will adequately protect neighboring properties; and (Ord. 09/28/11)

b. Any structure considered accessory to the turbine should adhere to the setbacks required in the district the turbine is located.

2. Height.

a. The minimum distance between the ground and any protruding blades utilized on a wind turbine shall be fifteen feet (15'), as measured at the lowest point of the arc of the blades; and

b. Wind turbines standing alone shall be secured by anti-climbing devices unless determined by the County not to be warranted.

3. Site Control. The applicant shall submit documentation of the legal right to install and use the proposed system at the time of application.

4. Noise. Wind energy systems shall not exceed sixty (60) decibels (dB(A)), as measured at the closest property line. The level may be exceeded during short-term events such as severe windstorms. The applicant is responsible for providing information from a certified technician stating that noise levels are in compliance with these standards.

5. Shadow/Flicker. Wind energy systems shall be sited in a manner that does not result in shadowing or flicker impacts. The applicant shall provide proof from a registered professional engineer to the board of zoning appeals that this effect does not impact neighboring or adjacent uses either through siting or mitigation.

6. Location. No wind energy system shall be located on a vacant parcel unless it is proven to be accessory to a dwelling or commercial building and that parcel is located within a distance such that the wind energy system is able to service the dwelling or commercial building.

7. Federal and state regulations. Wind energy systems shall meet or exceed all applicable federal and state standards and regulations set forth by the Federal Aviation Administration (FAA), Department of Environmental Quality (DEQ), State Corporation Commission (SCC), and other agencies with the authority to regulate such systems.

8. Signs. No signs or advertising of any type may be placed on the wind energy system unless required by any state or federal agency.

9. Visual Impact. The applicant shall demonstrate through project siting and proposed mitigation that the onsite system minimizes impact on the visual character of surrounding neighborhoods and the community. This may include, but not be limited to, information regarding site selection, turbine design, buffering, lighting, cable layout, and demonstration of compliance with all permit regulations.

10. Material. Wind turbines shall maintain a galvanized steel finish, unless any applicable state or federal standards require otherwise, or if the owner is attempting to conform the system to the surrounding environment and architecture, in which case it may be painted to reduce visual obtrusiveness. If the turbine is painted it shall be a neutral color such as white, off-white, or grey, unless another color is shown to better suit the natural environment. A photo simulation may be required at the request of the board of zoning appeals.

11. Photo Simulation. Color photo simulations showing to scale representations of the proposed wind energy system as it would appear viewed from the closest residential property or properties and from adjacent roadways may be required for those systems requiring a Special Use Permit.

§ 25-69.7. Uses permitted in public use overlay (PUO) districts.

The uses listed in this section shall be permitted by the designation of a Public Use Overlay (PUO) District, as permitted in ARTICLE XLIX of this chapter, through a public hearing before the board of supervisors and shall be required for wind energy systems that are:

1. Considered a wind farm by definition; and/or

2. Where the primary use of the system is electrical generation to be sold to the wholesale electricity markets and not used primarily for the onsite consumption of energy by a dwelling or commercial building.

§ 25-69.8. Bonding.

Prior to the issuance of a Building Permit for a wind energy system which requires a Special Use Permit or a Public Use Overlay (PUO) designation, the applicant shall:

A. Submit to the Zoning Administrator an itemized cost estimate of the work to be done to completely remove the entire wind energy system and concrete pad plus twenty-five percent (25%) of said estimated costs as a reasonable allowance for administrative costs, inflation, and potential damage to existing roads or utilities.

B. Submit a bond, irrevocable Letter of Credit, or other appropriate surety acceptable to the County in the amount of the estimate as approved by the Zoning Administrator which shall:

1. Secure the cost of removing the system and restoring the site to its original condition to the extent reasonably possible; and

2. Include a mechanism for a Cost of Living Adjustment after ten (10) and fifteen (15) years.

C. The applicant will ensure the bond, irrevocable Letter of Credit, or other surety shall remain in full force and effect until the Community Development Department has inspected the site and verified that the wind energy system, concrete pad, and equipment has been removed. At which time the Community Development Department shall promptly release the bond, irrevocable Letter of Credit, or other surety.

§ 25-69.9. Removal, maintenance and safety.

A. The applicant shall maintain the wind energy system in good condition. Such maintenance shall include, but not be limited to, painting, structural integrity of the foundation and support structure and security barrier (if applicable), and maintenance of the buffer areas and landscaping if present. The project owner shall be responsible for the cost of maintaining the wind energy system and access road, if present unless accepted as a public way, and the cost of repairing any damage occurring as a result of operation and construction.

B. Any wind energy system that is found to be unsafe by the building official shall be repaired by the owner to meet federal, state, and local safety standards or removed within six (6) months. Any wind energy system that is not operated for a continuous period of twenty-four (24) months shall be considered abandoned and the owner of the system shall remove the system within one hundred eighty (180) days of

receipt of notice from the County instructing the owner to remove the wind energy system.

C. The applicant shall notify the Zoning Administrator within thirty (30) days of the date the system is no longer used for a wind energy system. The system and concrete pad shall be disassembled and completely removed from the site within one hundred eighty (180) days of the date the system is no longer used for wind energy purposes.

Ord. 2/11/10, eff. 3/1/10