IOWA COUNTY ORDINANCE NO. 32

WIND ENERGY CONVERSION SYSTEMS

AN ORDINANCE REGULATING THE CONSTRUCTION, INSTALLATION AND MAINTENANCE OF WIND ENERGY CONVERSION SYSTEMS AND ADDRESSING THE STANDARDS AND CONDITIONS THEREOF WITHIN IOWA COUNTY, STATE OF IOWA.

Be it ordained and enacted by the Iowa County Board of Supervisors, Iowa County, State of Iowa as follows:

ARTICLE I
Purpose

The purpose of this Ordinance is to provide for the regulation of Owners/Developers engaged in the construction, erection, placement, location, operation and maintenance of Wind Energy Conversion Systems in Iowa County, Iowa; and to preserve and protect public health and safety therefrom without significantly increasing the cost or decreasing the efficiency of said systems and associated structures.

ARTICLE II
Jurisdiction

This Ordinance applies to all lands within the unincorporated areas of Iowa County, Iowa, but shall not apply to land within the incorporated cities of Iowa County, Iowa.

ARTICLE III
Definitions

Unless the context specifically indicates otherwise, the meaning of terms used in this ordinance shall be as follows:

Sec. 1. "Commercial Grade Wind Energy Conversion System" or "Commercial Grade WECS" shall mean a Wind Energy Conversion System of equal to or greater than 100 kW in total nameplate generating capacity.

Sec. 2. "Decommission" or "Decommissioning" shall mean the complete removal of all wind turbines and related devices and equipment and distribution and transmission facilities comprising a Wind Energy Conversion System including, but not limited to, all rotors, nacelles and towers; all collection step-up transformers; all Wind Energy Device foundations, pads, underground electrical wires and any and all other underground wind energy

structures and improvements and all access roads (unless the relevant landowner requests that such access road remain), all in accordance with Article VII herein.

Sec. 3. "Distribution" when used in reference to Overhead Utility Lines shall mean a line which is not franchised by the Iowa Utilities Board.

Sec. 4. "Larger Turbine" shall mean a turbine 500 feet or greater in height from the ground at the base to the highest point reached by the tip of a blade.

Sec. 5. "Meteorological Tower" or "MET Tower" shall mean any meteorological, measuring or surveying equipment or devices erected on or attached to any tower, monopole or guyed structure to verify the wind and weather resources found within a certain area.

Sec. 6. "Non-Participating Residence" shall mean the primary human dwelling on any privately-owned parcel of land where the owner(s) of such parcel has not entered into a voluntary agreement with the Owner/Developer.

Sec. 7. "Non-Participating Property Line" shall mean the boundary line defining any parcel of land where the owner(s) of the parcel has <u>not</u> entered into a voluntary agreement with the Owner/Developer regarding the Project, regardless of the presence of a residence.

Sec. 8. "Owner/Developer" shall mean the individual, firm, business or entity that intends to own and operate a Wind Energy Conversion System in accordance with this Ordinance.

Sec. 9. "Participating Residence" shall mean the primary human dwelling on any parcel where the owner(s) of the parcel has entered into a voluntary agreement with the Owner/Developer.

Sec.10. "Participating Property Line" shall mean the boundary line defining any parcel of land where the owner(s) of the parcel has entered into a voluntary agreement with the Owner/Developer regarding the Project, regardless of the presence of a Participating Residence on such parcel.

Sec.11. "Smaller Turbine" shall mean a turbine less than 500 feet in height from the ground at the base to the highest point reached by the tip of a blade.

Sec.12. "Total Height" shall mean the vertical distance from ground level to the tip of the blade on a Wind Energy Device when such blade is at its highest point.

Sec.13. "Tower" shall mean any monopole, freestanding or guyed structure that supports a wind Energy Device.

Sec.14. "Transmission" when used in reference to Overhead Utility Lines shall mean a line operating at or above 69kV and subject to a franchise from the Iowa Utilities Board.

Sec.15. "Wind Energy Conversion System" or "WECS" shall mean an electrical generating facility comprised of one or more Wind Energy Devices and accessory facilities including, but not limited to, power lines, transformers, substations and meteorological towers that operate by converting the kinetic energy of wind into electrical energy. The energy may be used on-site or distributed into the electrical grid.

Sec.16. "Wind Energy Device" or "WED" shall mean any equipment that transforms energy from the wind into usable forms of energy not intended for residential or personal use. This equipment includes any base, blade, foundation, generator, nacelle, rotor or tower that is integrated as part of a single device. The term wind energy device often refers to and includes wind towers, wind turbines, wind generators, windmills or other wind energy conversion systems. This definition shall not include any buried wires or other sub-surface electrical transmission equipment or ancillary above ground electrical structures such as junction boxes and step-up transformers.

Sec.17. "Wind Energy Accessory Building or Structure" shall mean any permanent building or structure located within the same defined boundaries of a permitted Wind Energy Conversion System or on the same lot, parcel or tract of land of a single Wind Energy Device, and is clearly considered customarily and incidental and subordinate to the principal Wind Energy Device(s). Any Wind Energy Device Accessory Building or Structure may contribute to the successful operation, convenience and necessity of the principal Wind Energy Device(s). Examples of Wind Energy Device Accessory Buildings or Structures may include, but not be limited to, electrical substations, switching stations or any other permanent structures used in a capacity similar to electrical substations and associated with Wind Energy Conversion Systems. This definition shall not include any above ground or buried transmission lines, wires or other electrical equipment in addition to any above ground junction boxes, step-up transformers, operations and maintenance buildings or any temporary or non-permanent buildings or structures used during the construction of a Wind Energy Device or Wind Energy Conversion System. For the avoidance of doubt, junction boxes are small pieces of electrical equipment that are typically no larger than approximately 3' tall above the surface and approximately 4' in width and 3' in depth. Step-up transformers are pieces of electrical equipment approximately 6' tall above the surface and approximately 6' in width and 6' in depth and are usually located in close proximity to the base of the Wind Energy Device.

ARTICLE IV
Wind Energy Conversion System Requirements

Sec. 1. The Owner/Developer will design and construct any Wind Energy Conversion System using the following distances for setbacks from Features/Criteria of or on the land:

Feature/Criteria	Setback (a) for Smaller Turbine	Setback for Larger Turbine	Measured From	Measured To
Participating Residences	1,500	1,600	Center of Turbine	Nearest Point of Residence
Non-Participating Residences	1,800	1,800	Center of Turbine	Nearest Point of Residence
Participating Shared Property Line of Different Owners	300	400	Center of Turbine	Property Line
Non-Participating Property Lines	700	800	Center of Turbine	Property Line
Public Roads	700	800	Center of Turbine	Center of Road
Incorporated Cities (b)	5,280	5,280	Center of Turbine	Corporate Limit
Microwave Paths	400	500	Center of Turbine	Beam Path Centerline
Public Rights of Way Unrelated to Roads	700	800	Center of Turbine	Edge of Right of Way Area
Overhead Utility Lines (Transmission)	700	800	Center of Turbine	Center of Line
Overhead Utility Lines (Distribution)	300	400	Center of Turbine	Center of Line
Natural Gas Pipelines	650	750	Center of Turbine	Center of Line
Railroads	650	750	Center of Turbine	Centerline of Track
Cemeteries	1,500	1,500	Center of Turbine	Edge of Area
Hog, Cattle and Chicken Farming Confinement Buildings	1,200	1,300	Center of Turbine	Edge of Structure
The Iowa River	15,840	15,840	Center of Turbine	Center of Channel

The English River	2,640	2,640	Center of Turbine	Center of Channel
Publically owned Parks or Lakes	1,800	2,000	Center of Turbine	Edge of Area

Notes: (a) All measurements in this table are in feet.

(b) Subject to statutory right of cities under certain circumstances to exercise zoning control up to two miles outside of the corporate city limits.

Sec. 2. Setbacks for Wind Energy Devices and Meteorological Towers. The foregoing setbacks shall apply to all Wind Energy Devices and Meteorological Towers.

Sec. 3. Setback Waiver. The foregoing setbacks may be waived by non-participating or participating residences and by owners of participating shared property line or non-participating property line owners.

Sec. 4. Maximum Height. Wind Energy Conversion Systems which include Wind Energy Devices that would exceed 650 feet in total height are not permitted.

Sec. 5 Number of Turbines. No more than 200 small and/or large turbines will be permitted in Iowa County, Iowa.

Sec. 6. Shadow Flicker. The Owner/Developer shall use shadow flicker computer modeling to estimate the amount of shadow flicker anticipated to be caused by the WECS so that computer modeling indicates that no non-participating residential dwelling will experience more than 30 hours per year of shadow flicker under planned operating conditions. If any owner of a non-participating residential dwelling experiences more than 30 hours of shadow flicker per year under WECS normal operating conditions, then the Owner/Developer shall be obligated to mitigate such shadow flicker to comply with the terms of this Ordinance.

Sec. 7. Access. All ground mounted electrical and control equipment shall be labeled and secured to prevent unauthorized access.

Sec. 8. Electrical Wires. All electrical wires associated with a WECS, other than wires necessary to the operation of the Wind Energy Device itself, shall be located underground. Transmission lines or high capacity electrical lines from substations transferring cumulative energy resources from a WECS shall not be required to be placed underground.

Sec. 9. Lighting. Wind Energy Devices shall not be artificially lighted from the ground upward. The only lighting permitted is that which is recommended by the Federal Aviation Administration or other governmental entities. All

temporary or permanent Meteorological Towers (regardless of their height) shall display a flashing red light at the top of the tower and be painted conspicuously. Where feasible to do so, aircraft detection lighting systems (ADLS) shall be used to reduce the impact of nighttime lighting on nearby residents, communities and migratory birds and to extend the life expectancy of obstruction lighting, all in accordance with FAA Advisory Circular: 70/7460-1L, section 14.1 *et. seq.* (12/04/15).

Sec.10. Code Compliance. All WECS shall comply with all applicable State of Iowa construction and electrical codes, and the National Electrical Code.

Sec.11. Utility Notification and Interconnection. WECS that connect to an electric utility shall comply with all local, State of Iowa and federal regulations regarding the connection of energy generation facilities.

Sec.12. Wind Energy Accessory Buildings or Structures. Above ground Wind Energy Accessory Buildings or Structures shall be set back a distance of no less than 1,500 feet from any residential dwelling. The measurement between the Wind Energy Accessory Building or Structure is to be taken from the nearest point of the residential dwelling to the visually apparent perimeter of the above ground Wind Energy Accessory Building or Structure, or the boundary of an area containing such above ground Wind Energy Accessory Building or Structure (as may be evidenced by a fence, edge of parking lot, or other visible surface or above ground element of the building or structure; provided, however, that a sign or natural vegetation shall not be considered a perimeter or boundary). Such setback distance of 1,500 feet shall be enforced unless the property owner of such residential dwelling provides written consent or approval to the location of such Wind Energy Accessory Building or Structure. Above ground Wind Energy Accessory Buildings or Structures shall be setback a distance of no less than 150 feet from any road right of way, public right of way, railroad right of way or public utility facility, unless the owner of such facilities or such right of way or the applicable public utility facility owner provides written consent or approval to the location of such above ground Wind Energy Accessory Building or Structure.

ARTICLE V
Roads

Costs of repair from damage or maintenance of County roads, rights of way or any County infrastructure resulting from the construction, repair or removal of a WECS shall be the responsibility of the Owner/Developer of such WECS. A separate road agreement which clearly lays out the rights and obligations of the County and the

Owner/Developer with respect to the construction, maintenance and use of County roads in connection with the development of the WECS will be required prior to the start of construction by the Owner/Developer of any Wind Turbines and related devices and equipment and distribution and transmission facilities comprising a Wind Energy Conversation System or the installation of a Meteorological Tower.

ARTICLE VI
Sound

Sound produced by any Wind Energy Device(s) under normal operating conditions as measured at the exterior wall of a Permanent Residential Dwelling shall not exceed 50 dBA. Sound levels, however, may be exceeded during short term events out of the Owner/Developer's control, such as utility outages and/or severe wind or weather conditions.

ARTICLE VII
Decommissioning at End of Serviceable Life or Discontinuance or Abandonment

Prior to the Owner/Developer commencing the construction and/or installation of a Wind Energy Conversation System or a Meteorological Tower, the Owner/Developer shall enter into a decommissioning plan for the WECS with Iowa County outlining the anticipated means and cost of removing each Wind Energy Device at the end of its serviceable life or upon becoming a discontinued use. The Owner/Developer will obtain a cost estimate to be made by a professional engineer licensed in the state of Iowa agreeable to the County. The decommissioning plan shall also outline proposed financing methods adequate for the decommissioning of the WECS. The County and the Owner/Developer shall enter into a decommissioning agreement that shall clearly lay out the rights and obligations of the County and the Owner/Developer with respect to the management and potential decommissioning and removal of the Wind Energy Devices, either at the end of their serviceable life or upon becoming a discontinued use.

A Wind Energy Device shall be considered discontinued or abandoned after one year without energy production unless a timely plan is developed and submitted within such one year period to the County outlining the steps and schedule for returning the Wind Energy Device to active service.

All Wind Energy Devices and accessory facilities shall be removed to a depth of four (4) feet below grade within 180 days of becoming a discontinued use.

ARTICLE VIII
Change of Ownership

The Owner/Developer shall submit notification to the County upon change of ownership of all or part of any WECS. The ownership of the WECS shall not be assigned without the written consent of the Iowa County Board of Supervisors and such consent shall not be unreasonably withheld.

ARTICLE IX
Interpretation and Regulations

In their interpretation and application, the provisions of this Ordinance shall be held to be minimum requirements. Where this Ordinance imposes a greater restriction than is imposed or required by other provisions of law, other rules, regulations or ordinances, the provisions of this Ordinance shall govern. This Ordinance is not intended to abrogate or annul any easement, covenant or other private agreement provided that where any provision of this Ordinance is more restrictive or imposes a higher standard requirement than such easement, covenant or other private agreement, the provisions of this Ordinance shall govern.

ARTICLE X
Penalty

It shall be unlawful for any person, firm or corporation to construct, install or operate any Commercial Grade WECS or Meteorological Tower that is not in compliance with this Ordinance. This Ordinance, however, shall not apply to or regulate the development and location of Wind Turbines or Wind Energy Projects in what is referred to as the Diamond Trail Wind Project in Iowa County to be installed and operated by MidAmerican. Also exempt from this Ordinance are any and all other Wind Energy Devices installed prior to the adoption of this Ordinance.

Any person who fails to comply with any provision of this Ordinance shall be deemed subject to a county infraction and punishable by a civil penalty of not less than $200.00 but not to exceed $750.00 plus court costs for the first offense and not less than $400.00 but not to exceed $1,000.00 plus court costs for each repeat offense. Iowa County, Iowa may seek all relief prescribed by State law for county infractions. The County Auditor and the Iowa County Attorney and his or her assistants are the officers designated and authorized to enforce this ordinance by issuance of civil citations for county infractions. Each Wind Energy Device determined to be in violation will be considered a separate infraction. Each day that a violation occurs or continues to exist constitutes a separate offense.

ARTICLE XI
Repealer

Sec. 1. All ordinances or parts of ordinances in conflict herewith are hereby repealed.

Sec. 2. The invalidity of any section, clause, sentence, or provision of this ordinance shall not affect the validity of any other part of this ordinance which can be given effect without such invalid part or parts.

ARTICLE XII
Ordinance in Force

Sec. 1. This ordinance shall be in full force and effect from and after its passage, approval, and publication as provided by law.

Sec. 2. Passed and adopted by Iowa County Board of Supervisors, Iowa County, Iowa

PASSED AND ADOPTED by the Iowa County Board of Supervisors on this 19 day of November, 2019.