1. TITLE

This Ordinance shall be known as the Wind Energy Facility Ordinance for Catharine Township.

2. PURPOSE

The purpose of the Ordinance is to provide for the construction and operation of Wind Energy Facilities in Catharine Township, subject to reasonable conditions that will protect the public health, safety and welfare.

- 3. DEFINITIONS
 - A. "Applicant" is the person or entity filing an application under this Ordinance.
 - B. "Facility Owner" means the entity or entities having an equity interest in the Wind Energy Facility, including their respective successors and assigns.
 - C. "Operator" means the entity responsible for the day-to-day operation and maintenance of the Wind Energy Facility.
 - D. "Occupied Building" means a residence, school, hospital, church, public library, commercial building, industrial building, agricultural building or other building used for the gathering of persons that is occupied, in use, under construction or for which a building permit has been issued when the permit application is submitted.
 - E. "Turbine Height" means the distance measured from the surface of the tower foundation to the highest point of the turbine rotor plane.
 - F. "Wind Turbine" means a wind energy conversion system that converts wind energy into electricity through the use of a wind turbine generator, and includes the nacelle, rotor, tower, and pad transformer, if any.
 - G. "Wind Energy Facility" means an electric generating facility, whose main purpose is to supply electricity, consisting of one or more Wind Turbines and other accessory structures and buildings, including substations, meteorological towers, electrical infrastructure, transmission lines and other appurtenant structures and facilities.
 - H. "Non-Participating Landowner" means any landowner except those on whose property all or a portion of a Wind Energy Facility is located pursuant to an agreement with the Facility Owner or Operator.

4. APPLICABILITY

- A. This Ordinance applies to all Wind Energy Facilities proposed to be constructed after the effective date of the Ordinance, except that this Ordinance is not intended to apply to stand-alone Wind Turbines constructed primarily for residential or farm use.
- B. Wind Energy Facilities constructed prior to the effective date of this Ordinance shall not be required to meet the requirements of this Ordinance; provided that any physical modification to an existing Wind Energy Facility that materially alters the size, type and number of Wind Turbines or other equipment shall require a permit under this Ordinance.

5. PERMIT REQUIREMENTS

- A. No Wind Energy Facility, or addition of a Wind Turbine to an existing Wind Energy Facility, shall be constructed or located within Catharine Township unless a permit has been issued to the Facility Owner or Operator approving construction of the facility under this Ordinance.
- B. The permit application or amended permit application shall be accompanied with a fee in the amount of \$_____.
- C. Any physical modification to an existing and permitted Wind Energy Facility that materially alters the size, type and number of Wind Turbines or other equipment shall require a permit under this Ordinance.
- D. The issuance of a permit under this ordinance does not eliminate the necessity for the issuance of other permits, such as, building permits, highway access permits, vehicle size and weight permits and/or bonds or other applicable permits or authorizations.
- E. Any permit issued under this ordinance shall be valid so long as the facility continues to meet the requirements of this ordinance and shall continue to be valid for up to thirty (30) years from issuance. After thirty (30) years from issuance, the permit shall terminate and it shall be necessary to reapply for the permit.
- F. In addition to the application for a permit under this Ordinance, each applicant must enter into a wind energy developer's agreement with the Board of Supervisors of Catharine Township before beginning any construction of any wind energy facility and before a permit will be issued.
- G. The Board of Supervisors of Catharine Township, its employees, agents, consultants, engineers, and attorneys shall have the authority to review all applications; to have access to all plans, specifications, documents, tests, and any other materials of the applicants, its employees and agents

for the purpose of reviewing the applications and confirming any parts of the application.

H. The applicant shall pay to Catharine Township the cost for review of the application including but not limited to all engineering and legal costs.

6. PERMIT APPLICATION

- A. The permit application shall demonstrate that the proposed Wind Energy Facility will comply with this Ordinance.
- B. Among other things, the application shall contain the following:
 - A narrative describing the proposed Wind Energy Facility, including an overview of the project; the project location; the approximate generating capacity of the Wind Energy Facility; the approximate number, representative types and height or range of heights of Wind Turbines to be constructed, including their generating capacity, dimensions and respective manufactures, and a description of ancillary facilities.
 - 2. A copy of the agreement between the property owner and the Facility Owner or Operator demonstrating that the Facility Owner or Operator has the permission of the property owner to apply for necessary permits for construction and operation of the Wind Energy Facility.
 - 3. Identification of the properties on which the proposed Wind Energy Facility will be located, and the properties adjacent to where the Wind Energy Facility will be located.
 - 4. A site plan showing the planned location of each Wind Turbine, property lines, setback lines, access road and turnout locations, substation(s), electrical cabling from the Wind Energy Facility to the substation(s), ancillary equipment, buildings, and structures, including permanent meteorological towers, associated transmission lines, and layout of all structures within the geographical boundaries of any applicable setback.
 - 5. Documents related to decommissioning.
 - 6. Other relevant studies, reports, certifications and approvals as may be reasonably requested by Catharine Township to ensure compliance with this Ordinance.
- C. Within thirty (30) days after receipt of a permit application, Catharine Township will determine whether the application is complete and advise the applicant accordingly.
- D. Within sixty (60) days of a completeness determination under Section 6 of

this ordinance, Catharine Township will schedule a public hearing. The applicant shall participate in the hearing and be afforded an opportunity to present the project to the public and municipal officials, and answer questions about the project. The public shall be afforded an opportunity to ask questions and provide comment on the proposed project. Prior to said public hearing the applicant shall publish at least one time, not less than seven (7) days before said hearing a public notice of the hearing in a newspaper of general circulation within Catharine Township. Said public notice must be approved in advance by Catharine Township. In addition to said public notice, the applicant must provide written notice, in form approved in advance by Catharine Township, to each owner of real estate where the real estate is within 2000 feet from the boundary of the property proposed for construction of any wind energy facility; said written notice shall be provided by certified United States mail, return receipt requested or by personal service with an affidavit of service by the person serving the notice.

- E. Within forty-five (45) days after the close of any hearing, Catharine Township will make a decision whether to issue or deny the permit application.
- F. Throughout the permit process, the Applicant shall promptly notify Catharine Township of any changes to the information contained in the permit application.
- G. Changes to the pending application that do not materially alter the initial site plan may be adopted without a renewed public hearing.
- 7. DESIGN AND INSTALLATION
 - A. Design Safety Certification

The design of the Wind Energy Facility shall conform to applicable industry standards, including those of the American National Standards Institute. The Applicant shall submit certificates of design compliance obtained by the equipment manufacturers from Underwriters Laboratories, Det Norske Veritas, Germanishcer Llloyd Wind Energies, or other similar certifying organizations

B. Uniform Construction Code

To the extent applicable, the Wind Energy Facility shall comply with the Pennsylvania Uniform Construction Code, 34 Pa. Code §§ 403.1-403.142.

C. Controls and Brakes

All Wind Energy Facilities shall be equipped with a redundant braking

system. This includes both aerodynamic overspeed controls (including variable pitch, tip, and other similar systems) and mechanical brakes. Mechanical brakes shall be operated in a fail-safe mode. Stall regulation shall not be considered a sufficient braking system for overspeed protection.

D. Electrical Components

All electrical components of the Wind Energy Facility shall conform to relevant and applicable local, state and national codes, and relevant and applicable international standards.

- E. Visual Appearance; Power Lines
 - 1. Wind Turbines shall be a non-obstrusive color such as white, off-white or gray.
 - 2. Wind Energy Facilities shall not be artificially lighted, except to the extent required by the Federal Aviation Administration or other applicable authority that regulates air safety.
 - 3. Wind Turbines shall not display advertising except for reasonable identification of the turbine manufacturer, Facility Owner and Operator.
 - 4. On-site transmission and power lines between Wind Turbines shall, to the maximum extent practicable, be placed underground.
- F. Warnings
 - 5. A clearly visible warning sign concerning voltage must be placed at the base of all pad-mounted transformers and substations.
 - 6. Visible, reflective, colored objects, such as flags, reflectors, or tape shall be placed on the anchor points of guy wires and along the guy wires up to a height of ten feet from the ground.
- G. Climb Prevention/Locks
 - 7. Wind Turbines shall not be climbable up to fifteen (15) feet above ground surface.
 - 8. All access doors to Wind Turbines and electrical equipment shall be locked or fenced, as appropriate, to prevent entry by non-authorized persons.

8. SETBACKS

- A. Occupied Buildings
 - 1. All Wind Turbines shall be set back from all Occupied Buildings a distance of at least 1.1 times the Turbine Height. The setback

distance shall be measured from the center of the Wind Turbine base to the nearest point on the foundation of the Occupied Building.

- 2. All Wind Turbines shall be set back from the nearest Occupied Building located on a Non-participating Landowner's property a distance of at least five (5) times the Turbine Height, as measured from the center of the Wind Turbine base to the nearest point on the foundation of the Occupied Building.
- B. Property lines: All Wind Turbines shall be set back from the nearest property line a distance of at least 1.1 times the Turbine Height. The setback distance shall be measured to the center of the Wind Turbine base.
- C. Public Roads: All Wind Turbines shall be set back from the nearest public road a distance of not less than 1.1 times the Turbine Height, as measured from the right-of-way line of the nearest public road to the center of the Wind Turbine base. For the purposes of Section 8C of this ordinance, the term public road shall mean any road which is a part of the roadway system of the Commonwealth of Pennsylvania or Catharine Township or any other municipality of the Commonwealth of Pennsylvania, Catharine Township or any other municipality of the Commonwealth of Pennsylvania which is under construction.
- 9. WAIVER OF SETBACKS
 - A. Property owners may waive the setback requirements in 8(A)(2) (Occupied Buildings on Non-participating Landowner's property) and 8(B) (Property Lines) by signing a waiver that sets forth the applicable setback provision(s) and the proposed changes.
 - B. The written waiver shall notify the property owner(s) of the setback required by this Ordinance, describe how the proposed Wind Energy Facility is not in compliance, and state that consent is granted for the Wind Energy Facility to not be setback as required by this Ordinance.
- 10. USE OF PUBLIC ROADS
 - A. The Applicant shall identify all state and local public roads to be used within Catharine Township to transport equipment and parts for construction, operation or maintenance of the Wind Energy Facility.
 - B. Some Catharine Township roads and some state highways have restrictions concerning the size and weight of vehicles. The applicant should contact state and/or municipal authorities to determine if any permits and/or bonds may be required.
- 11. LOCAL EMERGENCY SERVICES
 - A. The Applicant shall provide a copy of the project summary and site plan to local emergency services, including paid or volunteer Fire Department

(s).

- B. Upon request, the Applicant shall cooperate with emergency services to develop and coordinate implementation of an emergency response plan for the Wind Energy Facility.
- 12. NOISE AND SHADOW FLICKER
 - A. Audible sound from a Wind Energy Facility shall not exceed fifty-five (55) dBA, as measured at the exterior of any Occupied Building on a Non-participating Landowner's property. Methods for measuring and reporting acoustic emissions from Wind Turbines and the Wind Energy Facility shall be equal to or exceed the minimum standards for precision described in AWEA Standard 2.1-1989 titled *Procedures for the Measurement and Reporting of Acoustic Emissions from Wind Turbine Generation Systems Volume I: First Tier.*
 - B. The Facility Owner and Operator shall make every effort to eliminate shadow flicker to any Occupied Building on a Non-participating Landowner's property.
- 13. WAIVER OF NOISE AND SHADOW FLICKER PROVISIONS
 - A. Property owners may waive the noise and shadow flicker provisions of this Ordinance by signing a waiver of their rights.
 - B. The written waiver shall notify the property owner(s) of the sound or flicker limits in this Ordinance, describe the impact on the property owner (s), and state that the consent is granted for the Wind Energy Facility to not comply with the sound or flicker limit in this Ordinance.

14. SIGNAL INTERFERENCE

The Applicant shall not cause or contribute to any disruption or loss of radio, telephone, television or similar signals. If the Applicant does cause or contribute to any disruption or loss of the herein identified items, then the Applicant shall immediately eliminate any disruption or loss and shall mitigate any harm caused by the Wind Energy Facility.

15. INSURANCE-Developer/Permitee shall maintain the following insurance coverage:

- A. A commercial general liability insurance policy with a financially responsible insurance company providing for: (i) a limit of not less than \$1,000,000 for personal or bodily injury or death to any one person; and (ii) for a limit of not less than \$3,000,000 for personal or bodily injury or death in the aggregate; and (iii) for a limit of not less than \$1,000,000 for any instance of property damage;
- B. Umbrella liability insurance with coverage to be in excess of the insurance required above, Limits of liability shall not be less than \$3,000,000 for each occurrence and \$3,000,000 in aggregate; and

C. The Township shall be identified as an additional insured on all insurance policies referenced herein. No policy of insurance shall be cancelled without first providing the Township with at least 30 days prior written notice of intent to cancel.

Certificates of insurance evidencing compliance with these requirements shall be provided to the Township. All policies shall be written on an occurrence and not on a claims made basis.

16. DECOMMISSIONING

- A. The Facility Owner and Operator shall, at its expense, complete decommissioning of the Wind Energy Facility, or individual Wind Turbines, within twelve (12) months after the end of the useful life of the Facility or individual Wind Turbines. The Wind Energy Facility or individual Wind Turbines will be presumed to be at the end of its useful life if no electricity is generated for a continuous period of twelve (12) months.
- B. Decommissioning shall include removal of Wind Turbines, buildings, cabling, electrical components, roads, foundations to a depth of 36 inches, and any other associated facilities.
- C. Disturbed earth shall be graded and re-seeded, unless the landowner requests in writing that the access roads or other land surface areas not be restored.
- D. An independent and certified Professional Engineer shall be retained to estimate the total cost of decommissioning ("Decommissioning Costs") without regard to salvage value of the equipment, and the cost of decommissioning net salvage value of the equipment ("Net Decommissioning Costs"). Said estimates shall be submitted to Catharine Township after the first year of operation and every fifth year thereafter.
- E. The Facility Owner or Operator shall post and maintain Decommissioning Funds in an amount equal to Net Decommissioning Costs; Provided, that there at no point shall the Decommissioning Funds be less than fifty percent (50%) of Decommissioning Costs. The Decommissioning Funds shall be posted and maintained with a bonding company or Federal or Commonwealth chartered lending institution chosen by the Facility Owner or Operator and participating landowner posting the financial security, provided that the bonding company or lending institution is authorized to conduct such business within the Commonwealth and is approved by Catharine Township.
- F. Decommissioning Funds may be in the form of a performance bond, surety bond, letter of credit, corporate guarantee or other form of financial assurance as may be acceptable to Catharine Township.
- G. If the Facility Owner or Operator fails to complete decommissioning within

the period prescribed by Paragraph 16(A), then the landowner shall have six (6) months to complete decommissioning.

- H. If neither the Facility Owner or Operator, nor the landowner complete decommissioning within the periods prescribed by Paragraphs 16(A) and 16(G), then Catharine Township may take such measures as necessary to complete decommissioning. The entry into and submission of evidence of a Participating Landowner agreement to Catharine Township shall constitute agreement and consent of the parties to the agreement, their respective heirs, successors and assigns that Catharine Township may take such action as necessary to implement the decommissioning plan.
- I. The escrow agent shall release the Decommissioning Funds when the Facility Owner or Operator has demonstrated and the municipality concurs that decommissioning has been satisfactorily completed, or upon written approval of the municipality in order to implement the decommissioning plan.

17. PUBLIC INQUIRIES AND COMPLAINTS

- A. The Facility and Operator shall maintain a telephone number and identify a responsible person for the public to contact with inquiries and complaints throughout the life of the project. Said telephone number and the name and address of the responsible person shall be provided to Catharine Township and shall be available to the general public.
- B. The Facility Owner and Operator shall make reasonable efforts to respond to the public's inquiries and complaints.

18. VIOLATIONS

It shall be unlawful for any person, firm, or corporation to violate or fail to comply with or take any action which is contrary to the terms of the ordinance, or any permit issued under the ordinance or the developer's agreement, or cause another to violate or fail to comply, or to take any action which is contrary to the terms of the ordinance or any permit issued under the ordinance.

19. ABATEMENT

In addition to any other remedies provided in this ordinance, any violation of this ordinance may be abated by the Township of Catharine by either seeking mitigation or appropriate equitable or legal relief from a court of competent jurisdiction.

20. PENALTIES

Any Person failing to comply with any provision of this ordinance shall be in

violation of this ordinance and shall be subject to a fine of One Thousand (\$1,000.00) Dollars for each violation. Each day that a violation continues unabated shall constitute a separate violation. In the event of nonpayment of the above mentioned fine, the Catharine Township Board of Supervisors may institute civil proceedings in from of a magisterial district judge for collection of all fines, costs and fees allowed pursuant to the Second Class Township Code, more specifically, 53 P.S. 66601, as supplemented and amended.

21. REPEAL

All ordinances or resolutions or parts of ordinances or resolutions, insofar as they are inconsistent herewith, are hereby repealed.

22. SEVERABILITY.

If any sentence, clause, section or part of this ordinance is for any reason found to be unconstitutional, illegal or invalid, such unconstitutionality, illegality or invalidity shall not affect or impair any of the remaining provisions, sentences, clauses, sections, or parts of this ordinance, it being the intent of the Board of Supervisors of the Township of Snyder that such remainder shall be and shall remain in full force and effect.