

Wind Energy Facility Ordinance

**Town of
Holden, Maine**

Adopted June 9, 2010

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1.0 Title

This Ordinance shall be known as the Wind Energy Facility Ordinance for the Town of Holden.

2.0 Authority

This Ordinance is adopted pursuant to the enabling provisions of Article VIII, Part 2, Section 1 of the Maine Constitution; the provisions of 30-A M.R.S. § 3001 (Home Rule), and the provisions of the Planning and Land Use Regulation Act, 30-A M.R.S. § 4312, *et seq.*

3.0 Purpose

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

4.0 Definitions

Applicant is the person or entity, including successors and assigns, that files an application under this Ordinance.

Abandonment of an Operational License means that the Owner/Operator has failed to operate a wind turbine or wind turbine project to convert wind to electricity for a period of twelve consecutive months, whether the reason for not producing electricity is within the Owner/Operators control or not.

Abandonment of an Application means the Applicant has failed to provide the necessary information required for an application within the deadlines outlined in Section 9.

Ambient Noise means the all-encompassing sound associated with a given environment, at a specified time, being usually a composite of sounds from many sources at many directions, near and far, including the specific development of interest.

Approved Residential Subdivision means a residential subdivision for which all applicable land use permits have been issued, provided that the time for beginning construction under such permits has not expired.

Associated Facilities means elements of a Wind Energy Facility other than its Generating Facilities that are necessary to the proper operation and maintenance of the Wind Energy Facility, including but not limited to buildings, access roads, Generator Lead Lines and substations.

Blade Reflection means the intermittent reflection of the sun off the surface of the blades of a Wind Turbine.

DEP Certification means a certification issued by the Department of Environmental Protection pursuant to 35-A M.R.S. § 3456 for a Wind Energy Facility.

Enforcing Authority means either the Code Enforcement Officer or the Town attorney.

Escrow Agent a bonding company or Federal or State-chartered lending institution chosen by the Owner/operator and Participating Landowner posting the financial security, provided that the bonding company or lending institution is authorized to conduct such business within the State and is approved by the Holden Town Council.

Generating Facilities means Wind Turbines and electrical lines, not including Generator Lead Lines, that are immediately associated with the Wind Turbines.

Generator Lead Line means a "generator interconnection transmission facility" as defined by 35-A M.R.S. § 3132 (1-B).

Good Utility Practice means any of the practices, methods and acts with respect to the safe operation of the Wind Turbine or Wind Turbine Project engaged in or approved by a significant portion of the electric utility industry and, in particular, those portions of the industry with experience in the construction, operation, and maintenance of wind turbines during the relevant period; or any of the practices, methods and acts which, in the exercise of reasonable judgment in light of the facts known at the time the decision was made, could have been expected to accomplish the desired result at a reasonable cost consistent with good business practices, reliability and safety.

Historic Site means any site, structure, district or archaeological site which has been officially included on the National Register of Historic Places and/or on the Maine Historic Resource Inventory, or which is established by qualified testimony as being of historic significance.

Ice Throw means accumulated ice buildup on the blades of a Wind Turbine that is or can be thrown during normal spinning or rotation.

Locally Designated Passive Recreation Area means any site or area designated by a municipality for passive recreation that is open and maintained for public use and which: a) has fixed boundaries, b) is owned in fee simple by a municipality or is accessible by virtue of public easement, c) is identified and described in a local comprehensive plan and, d) has been identified and designated at least nine months prior to the submission of the Applicant's Wind Energy Facility permit application.

Meteorological Tower (MET Tower) means a Tower used for the measurement and collection of wind data that supports various types of equipment, including but not limited to anemometers, data recorders, and solar power panels. MET Towers may also include wildlife related equipment such as ANABAT detectors, bird diverts and wildlife entanglement protectors.

Mitigation Waiver means a legally enforceable, written agreement between the Applicant and a Non-participating Landowner in which the non-participating landowner waives certain setback, noise or other protections afforded in the Ordinance.

Nacelle means the frame and housing at the top of the Tower that encloses the gearbox and generator.

Nameplate Capacity means the electrical power rating of an individual wind turbine as certified by the manufacturer and normally expressed in watts, kilowatts (kW), or megawatts (MW).

Noise means any sound produced by a Wind Turbine Project. Noise does need to be loud to constitute an interference with the health and well-being of residents.

Non-Participating Landowner means any landowner, other than a Participating Landowner whose land is located within the Town of Holden.

Occupied Building means a residence, school, hospital, house of worship, public library or other building that is occupied or in use as a primary residence or is customarily frequented by the public at the time when the permit application is submitted.

Owner/Operator means the person or entity with legal or equitable ownership of a Wind Energy Facility, including successors and assigns, that has the authority and responsibility to operate and maintain the Facility on a day-to-day basis.

Participating Landowner means one or more Persons that hold title in fee or a leasehold interest with sublease rights to property on which Generating Facilities or Associated Facilities are proposed to be located pursuant to an agreement with the Applicant or an entity that has entered into an appropriate agreement with the Applicant allowing the Applicant to demonstrate the requisite right, title and interest in such property.

Person means an individual, corporation, partnership, firm, organization or other legal entity.

Planned Residence means a Residence for which all-applicable building and land use permits have been issued, provided that the time for beginning construction under such permits has not expired.

Protected Location means any location that is:

- 1) accessible by foot, on a parcel of land owned by a Non-Participating Landowner containing a residence or planned residence, or an approved residential subdivision, house of worship, academic school, college, library, duly licensed hospital or nursing home near the development site at the time an application for a Wind Energy Facility is submitted under this Ordinance;
- 2) within a nature preserve owned by a land trust, the Maine Audubon Society or the Maine chapter of the Nature Conservancy, a federally designated wilderness area, a state wilderness area designated by statute, a municipal park or a locally-designated passive recreation area or;
- 3) a hotel, motel, campsite or duly licensed campground that the municipal authority responsible for review and approval of the pending application under this ordinance has designated a Protected Location after making a determination that the health and welfare of the guests or the economic viability of the establishment will be unreasonably impacted by noise in excess of that allowed under this ordinance.

Residence means a building or structure, including manufactured housing, maintained for permanent or seasonal residential occupancy providing living, cooking and sleeping facilities and having permanent indoor or outdoor sanitary facilities, excluding recreational vehicles, tents and watercraft.

Setback means the minimal allowable horizontal distance as measured from the center of a Wind Turbine to a defined point (i.e., a property line or an Occupied

Building).

Setback Area means the entire land base that falls within a specified setback.

Scenic Resource means either a Scenic Resource of state or national significance, as defined in 35-A M.R.S § 3451(9) or a scenic resource of local significance located within the municipality and identified as such in a comprehensive plan, open space plan or scenic inventory adopted by the municipal legislative body.

Shadow Flicker means alternating changes in light intensity caused by the movement of Wind Turbine blades casting shadows on the ground or a stationary object.

Shadow Flicker Receptor means any Occupied Building on a Non-participating Landowner's property plus an additional 100 foot boundary surrounding the exterior of the Occupied Building, the entire outdoor public area surrounding schools, churches and public buildings, and public roads with a posted speed limit greater than 25 mph.

Short Duration Repetitive Sounds means a sequence of repetitive sounds which occur more than once within an hour, each clearly discernible as an event and causing an increase in the sound level of at least 6 dBA on the fast meter response above the sound level observed immediately before and after the event, each typically less than ten seconds in duration, and which are inherent to the process or operation of the development and are foreseeable.

Sight Line Representation means a profile drawing showing prominent features, including but not limited to topography, buildings, and trees, along and in relation to a line of sight extending from an observer's eye to the lowest point visible on a proposed Tower.

Significant adverse effect, with regard to wildlife protection, means an increase in species morbidity or mortality, or habitat fragmentation, which is deemed by a qualified wildlife biologist to be of concern for a particular species.

Significant Wildlife Habitat means a Significant Wildlife Habitat as defined in 38 M.R.S. § 480-B (10).

Sound is a fluctuation of air pressure which is a propagation as a wave through air.

Structure has the same meaning as in 38 MRSA § 482.

Substantial Start means that construction shall be considered to be substantially commenced when any work beyond excavation, including but not limited to, the pouring of a slab or footings, the installation of piles, the construction of columns, or the placement of a Tower on a foundation has begun.

Tower means the free-standing structure on which a wind measuring or energy

conversion system is mounted.

Turbine Height means the distance measured from the surface of the Tower foundation to the highest point of any turbine rotor blade measured at the highest arc of the blade.

Wind Energy Facility means a facility that uses one or more Wind Turbines to convert wind energy to electrical energy. A Wind Energy Facility includes Generating Facilities and Associated Facilities.

Wind Energy Facility, Type 1 Also known as a Small Wind Energy System (SWES) means a wind energy conversion system consisting of a wind turbine, a tower, and associated control or conversion electronics, which has a rated capacity of not more than 100kW, a maximum of one Wind Turbine and a maximum Turbine Height of 60 feet, and which is intended to primarily reduce on-site consumption of utility power.

Wind Energy Facility, Type 2 means a Wind Energy Facility having one or more of the following: generating capacity of greater than 100kW, and either more than one Wind Turbine, or one or more Wind Turbines with a Turbine Height greater than 60 feet.

Wind Turbine means a system for the conversion of wind energy into electricity which is comprised of a Tower, generator, Nacelle, rotor and transformer.

5.0 Applicability

- 5.1 This Ordinance applies to any Wind Energy Facility proposed for construction in the Town of Holden after the effective date of this Ordinance. This Ordinance does not apply to Associated Facilities unless the Generating Facilities are located within the Town of Holden, in which case this Ordinance applies to both the Generating Facilities and the Associated Facilities.
- 5.2 A Wind Energy Facility that is the subject of an application determined to be complete by the Town of Holden prior to the effective date of this Ordinance shall not be required to meet the requirements of this Ordinance; provided that any physical modifications after the effective date of the Ordinance shall be subject to the permitting requirements of this ordinance.

6.0 Conflict and Severability

- 6.1 If there is a conflict between provisions in this Ordinance, the more stringent shall apply. If there is a conflict between a provision in this Ordinance and that of another Town of Holden ordinance, the provision of this Ordinance shall apply.
- 6.2 The invalidity of any part of his Ordinance shall not invalidate any other part of this ordinance.

7.0 Effective Date

This Ordinance becomes effective on June 9, 2010

8.0 Classification of Wind Energy Facilities

All Wind Energy Facilities shall be classified as:

Wind Energy Facility, Type 1 Also known as a Small Wind Energy System (SWES) means a Wind Energy Facility having a maximum generating capacity of not more than 100kW, a maximum of one Wind Turbine and a maximum Turbine Height of 60 feet.

Wind Energy Facility, Type 2 means a Wind Energy Facility having a generating capacity of greater than 100kW and either more than one Wind Turbine, or one Wind Turbines with a Turbine Height greater than 60 feet.

9.0 Administration

9.1 Review and Approval Authority

1. The Code Enforcement Officer is authorized to review all applications for Type 1 Wind Energy Facilities and MET Towers and may approve, deny or approve with conditions in accordance with the standards of the Ordinance.
2. The Planning Board is authorized to review all applications for Type 2 Wind Energy Facilities and may approve, deny or approve with conditions in accordance with this Ordinance.

9.2 Permit Required

1. No Wind Energy Facility shall be constructed or located within the Town of Holden without a permit issued in accordance with this Ordinance.
2. Any physical modification to an existing Wind Energy Facility that materially alters the location or increases the area of development on the site or that increases the Turbine Height or the level of sound emissions of any Wind Turbine shall require a permit modification under this Ordinance. Like-kind replacements and routine maintenance and repairs shall not require a permit modification.

9.3 Permit Applications

1. Application components. A Wind Energy Facility permit application shall consist of the application form, application fee, and supporting documents, as described below:
 - a. Application Forms. The municipality shall provide the application

form which shall be signed by: 1) a Person with right, title and interest in the subject property or; 2) a Person having written authorization from a Person with right, title and interest in the subject property. The signature shall be dated and the signatory shall certify that the information in the application is complete and correct and that the proposed facility will be constructed and operated in accordance with the standards of this ordinance and all approval and permit conditions, if any.

b. Application Fees. Application fees shall be assessed and paid upon submission. Type 1 no charge. Type 2 application fee shall be \$500.

c. Supporting Documents. The application shall include all additional documents necessary to satisfy the applicable submission requirements under section 10 of this Ordinance.

2. Application Submission. The Applicant shall submit its application for a Wind Energy Facility permit to the Code Enforcement Officer who shall note on the application the date on which it was received.

3. Changes to a Pending Application

a. The Applicant shall promptly notify the Code Enforcement Officer of any changes the Applicant proposes to make to information contained in the application.

b. If changes are proposed to a pending application after a public hearing has been held, the Planning Board may consider those changes and continue with the review and approval process without a renewed public hearing if it determines that the changes do not materially alter the application. If the Planning Board determines that the proposed changes do materially alter the application it shall schedule and conduct another public hearing within 30 days of that determination. In making its determination, the Planning Board shall consider whether the proposed changes involve potential adverse effects different than or in addition to those addressed in the initial application.

9.4 Permit Application Procedures

9.4.1. Type 1 Wind Energy Facility Application

a. Within 10 days after receiving an application, the Code Enforcement Officer shall notify the Applicant in writing either that the application is complete or, if the application is incomplete, the specific additional material needed to complete the application. The Code Enforcement Officer may waive any submission requirement if the Code Enforcement Officer issues a written finding that, due to special circumstances of the application,

adherence to that requirement is not necessary to determine compliance with the standards of this Ordinance.

- b. Within 30 days after determining the application to be complete, the Code Enforcement Officer shall issue a written order: 1) denying approval of the proposed Wind Energy Facility, 2) granting approval of the proposed Wind Energy Facility or, 3) granting approval of the proposed Wind Energy Facility with conditions. In making the decision, the Code Enforcement Officer shall make findings on whether the proposed Wind Energy Facility meets the applicable criteria of this Ordinance.
- c. With the agreement of the applicant, the Code Enforcement Officer may extend the procedural time frames of this section.

9.4.2. Type 2 Wind Energy Facility Applications

- a. The Applicant is strongly encouraged to meet with the Code Enforcement Officer before submitting an application. At this pre-application meeting, the Code Enforcement Officer will explain the Ordinance's provisions, application forms, and submission requirements. The Applicant should provide photos of the proposed site and written descriptions of the proposed facility and the proposed site, including its location and lot area.
- b. An application shall be eligible for consideration at a regularly scheduled meeting of the Planning Board only if the applicant submits it at least 30 days prior to the meeting.
- c. Within 30 days after receipt of the application by the Code Enforcement Officer, the Planning Board shall review the application for completeness and notify the Applicant in writing either that the application is complete or, if the application is incomplete, the specific additional material needed to complete the application. The Planning Board may waive any submission requirement if it issues a written finding that, due to special circumstances of the application, adherence to that requirement is not necessary to determine compliance with the standards of this Ordinance.
- d. The Holden Planning Board shall hold a public hearing for Type 2 Wind Energy Facilities within 60 days after determining that the application is complete.
- e. Within 90 days after determining that an application for a Type 2 Wind Energy Facility is complete the Planning Board shall issue a written order: 1) denying approval of the proposed Wind Energy Facility, 2) granting approval of the proposed Wind Energy Facility or, 3) granting approval of the proposed Wind Energy Facility with conditions. In making its decision, the Planning Board shall make

findings on whether the proposed Wind Energy Facility meets the applicable criteria of this Ordinance.

- f. With the agreement of the applicant, the Planning Board may extend the procedural time frames of this section.
- g. Failure to comply with any of the foregoing deadlines shall not be construed as approval of the application.

9.5 Notice of Meetings

Seven days prior to any meeting at which an application for a Type 2 Wind Energy Facility is to be considered, the Planning Board shall send notice by first class mail, to the applicant and all owners of property abutting the property on which the Wind Energy Facility is proposed to be located. The notice shall state the date, time and place of the meeting and the proposed location and the classification of the proposed Wind Energy Facility.

9.6 Public Hearings

The Planning Board shall give notice of the date, time, and place of any public hearing and the proposed location and the classification of the proposed Wind Energy Facility:

1. Published at least once in a newspaper having general circulation within the municipality. The date of the first publication shall be at least 10 days before the hearing.
2. Mailed by first class mail to the Applicant and to owners of property within 300 feet of the property on which the Wind Energy Facility is proposed to be located, at least 10 days before the public hearing. The Planning Board shall maintain a list of property owners to whom notice is mailed in the application file. Failure of any of these property owners to receive a notice shall not invalidate the public hearing, nor shall it require the Planning Board to schedule another hearing.

9.7 Technical Review Fee

In addition to the Application Processing Fee, the applicant shall pay a separate fee of one thousand dollars (\$1,000) to be used to reimburse the time and expenses incurred by the Town's Planning Consultant, if the Town has retained the services of such a Consultant, and/or such other independent consultant(s) the Board may deem necessary to assist it with its review of the application. Such other consultants shall be fully qualified to provide the required assistance, and may include:

- An Attorney;
- A registered Professional Engineer;
- A Registered Architect;

A Registered Landscape Architect;
A Registered Geologist;
A Licensed Soil Scientist;
A Registered Land Surveyor; or
Any other Registered/Licensed Professional or independent Expert Witness deemed fully qualified and mutually acceptable to the Board and the applicant.

This Technical Review Fee shall be paid prior to the start of the Planning Board's review of any application.

This fee shall be paid in the form of a check made payable to the Town of Holden and the purpose of the fee shall be clearly indicated on the check.

If the balance of the unexpended funds is drawn down by fifty percent (50%) or more, the applicant shall be notified and required to pay an additional five hundred dollars (\$500). The applicant shall continue to be notified and required to pay the additional amounts as necessary whenever the balance of the funds is drawn down by 50% of the original amount. Failure to pay the required amount within 30 days shall also be a violation of this Ordinance and be cause to stop the review process.

Any balance remaining, after the completion and inspection of required improvements, shall be returned to the applicant.

9.8 Expiration of Permits

Permits shall expire: 1) 12 months after the date of approval unless a substantial start on construction has occurred and; 2) 18 months after the date of approval unless construction of the Wind Energy Facility has been completed. If a permit for a Type 2 Wind Energy Facility expires, the Applicant shall implement pertinent provisions of the approved decommissioning plan. Upon the Applicant's written request, the Planning Board may extend either or both expiration time limits by one year.

9.9 Access

The Code Enforcement Officer shall have access to the site at all times to review the progress of the work and shall have the authority to review all records and documents directly related to the design, construction and operation of the facility.

9.10 Complaints/ Violations/ Enforcement

9.10.1 General Standard

It shall be unlawful for any person, firm or corporation to violate or fail to comply with or take any action that is contrary to the terms of this Ordinance, or any permit or Operational License issued under this Ordinance, or cause another to violate or fail to comply or take any action which is contrary to the terms of this Ordinance or any permit issued under

this Ordinance.

9.10.2 Enforcing Authority

The CEO will serve as the Enforcing Authority for all Wind Turbine Projects.

9.10.2.1. It shall be the duty of the Code Enforcement Officer to enforce this ordinance. If the Code Enforcement Officer shall find that any provision of this Ordinance is being violated, he or she shall notify in writing the person or entity responsible for such violation, indicating the nature of the violation and order the action necessary to correct it, including discontinuance or unlawful use of land, buildings, structures, or work being done. A copy of such notices shall be filed with the Town Clerk, to be maintained as a permanent record.

9.10.2.2. The Code Enforcement Officer shall conduct on-site inspections to ensure compliance with all applicable laws and conditions attached to permit or license approvals. The Code Enforcement Officer shall investigate all complaints in a timely manner.

9.10.2.3. The Code Enforcement Officer shall issue all Operational Licenses and renewals, consistent with the terms and conditions as provided herein.

9.10.2.4. The Municipal Officers are hereby authorized to enter into consent agreements for the purpose of eliminating violations of this Ordinance and recovery of appropriate fines prior to or during Court actions.

9.10.2.5. The Code Enforcement Officer shall appoint qualified representatives to investigate complaints. The reasonable costs and fees for the qualified representative will be paid by the Owner/operator and as a condition of licensing and may include engineers, consultants, and other professionals.

9.10.3 Enforcement & Penalties

9.10.3.1 Standards in this Ordinance will be enforced through a series of enforcement options including but not limited to 1) Emergency shutdown; 2) 5 day response to serious violations with a 10 day mitigation period; 3) 30 day complaint resolution with a 30 day mitigation period; 4) suspension or revocation of Operational License; and 5) 30-A M.R.S.A. § 4452.

9.10.3.2 Any person or entity that violates the terms or conditions of this Ordinance, or the terms and conditions of any permit or license issued pursuant to this Ordinance shall pay the reasonable attorney fees incurred by the Town of Holden to prosecute said violation, including filing fees, expert fees and costs.

9.10.3.3 Each day of violation shall be a separate violation, for which penalties pursuant to 30-A MRSA 4452, as amended, may be assessed.

9.10.3.4 The Code Enforcement Officer, or the Town's legal counsel, may seek temporary and/or permanent injunctive relief as he or she deems appropriate, consistent with Maine law, in any prosecution for unlawful use of property, or for violation of the terms and conditions of a permit or license, or for any violation of the terms and conditions of this Ordinance.

9.10.4 Emergencies and Emergency Shutdown

The Owner/operator shall be required to immediately cease operations for the duration of any Emergency. Emergency shall mean a proven condition or situation as determined by the Enforcing Authority caused by the Wind Turbine or Wind Turbine Project that present an imminent physical threat of danger to life or significant threat to property. A Wind Turbine Project that is found to present an imminent physical threat of danger to life or significant threat of damage to property shall be immediately shut down and repaired or otherwise made safe and certified so by a professional engineer prior to resumption of operation. The Enforcing Authority shall have the right to access all Wind Turbines to verify conditions and/or repair progress with reasonable notice to the Wind Turbine owner/operator. Within 24 hours of an occurrence of a tower collapse, turbine failure, property damage or contamination, fires, thrown blade or hub, collector or feeder line failure, injured Wind Turbine worker or private person, the Owner/operator shall notify the Code Enforcement Officer of the occurrence and proposed remedial action.

9.10.5 Serious Violations of Standards

The Owner/operator of the Wind Turbine Project shall respond within five business days to any complaints of serious violations of standards, deemed by the Code Enforcement Officer to have merit. Serious violations shall include but not be limited to: 1) 3 verified noise complaints within a period of 1 month or less with a measurable noise level greater than a.) for Type 1, greater than 45 dBA daytime and 40 dBA nighttime; b.) for Type 2, 10 dBA above pre-construction ambient noise at an Occupied building or 50 dBC

at an Occupied Building; 2) serious violations of Shadow Flicker or Blade Reflection standards projected to be in excess of 20 hours annually at an Occupied Building; 3) any Shadow Flicker or Blade Reflection complaints affecting vehicles on Public Ways; 4) contamination of potable groundwater sources used for domestic or livestock water supplies, 5) complaints of communication/electromagnetic interference; and 6) any complaints of hazardous waste spills. Testing, paid for by the Owner/operator, will commence within ten working days of the complaint. Except as noted for interference with emergency communications, the Owner/operator is responsible for mitigating the problem within ten business days from the final determination of any cause attributed to the operation of the Wind Turbine Project. Interference with emergency communications must be responded to in one day and mitigated within 2 days.

9.10.6 Other Violations

If the Enforcing Authority determines that a violation of the Ordinance or the permit has occurred, and the violation is determined neither to be an emergency pursuant to Section 9.10.4, nor a serious violation pursuant to Section, 9.10.5 the Enforcing Authority shall provide written notice to the Owner/operator alleged to be in violation of this Ordinance or permit. The Enforcing Authority and the involved parties shall engage in good faith attempts to resolve the issues. Such attempts shall be conducted within thirty (30) days of the written notice of violation. The Owner/operator shall pay for any necessary testing if the Owner/operator is subsequently determined to be in non-compliance. The Owner/operator is responsible for mitigating the problem within 30 days from the final determination of any cause attributed to the operation of the Wind Generating Facility. Mitigation involving significant construction or physical modification may have up to 90 days to be completed.

9.10.7 Other Remedies

The Enforcing Authority may require other remedies as it deems necessary to assure the safe operation of the Wind Turbine Project.

9.10.8 Identifying Violations and Registering Complaints

9.10.8.1 The Owner/operator will report to the Enforcing Authority all extraordinary events within 24 hours of their occurrence.

9.10.8.2 For Type 1 Wind Turbines the Code Enforcement Officer will receive complaints. Complaints will be forwarded to the Code Enforcement Officer in a timely manner.

9.10.8.3 For Type 2 Wind Energy Facilities Turbines the Town will maintain, at the Owner/operator's expense, a system for recording and investigating all complaints related to the Wind Turbine Project. The system must be able to receive complaints 24 hours a day, 365 days a year. A permanent record of all complaints, investigations and outcomes will be maintained. The Owner/operator will designate a representative and method to receive and respond to complaints from the Town 24 hours a day, 365 days a year.

9.11 Appeals Procedure

9.11.1 Time Limit

An administrative appeal may be taken to the Board of Appeals by an aggrieved party from any decision of the Code Enforcement Officer, except for enforcement-related matters. Such appeal shall be taken within thirty (30) days of the date of the official written decision appealed from, and not otherwise, except that the Board, upon a showing of good cause, may waive the thirty (30) day requirement. The appeal shall not be de novo.

9.11.2 Written Notice

Applications for appeals shall be made by filing with the Board of Appeals a written notice of appeal which includes:

9.11.2.1 A concise written statement indicating what relief is requested and why the appeal should be granted; and

9.11.2.2 A sketch drawn to scale showing lot lines, location of existing buildings and structures and other physical features of the lot pertinent to the relief requested.

9.11.3. Record of Case

Upon receiving an application for an administrative appeal, the Code Enforcement Officer shall transmit to the Board all of the papers constituting the record of the decision or action being appealed.

9.11.4 Public Hearing

The Board of Appeals shall hold a public hearing on an administrative appeal within thirty-five (35) days of its receipt of a complete written application, unless this time period is extended by the parties.

9.11.5 Decision by Board

9.11.5.1 A majority of the full voting membership of the Board of appeals shall constitute a quorum for the purpose of deciding an appeal.

9.11.5.2 The person filing the appeal shall have the burden of proof.

9.11.5.3 Following the public hearing on an appeal, the Board may reverse the decision, or failure to act, of the Code Enforcement Officer only upon a finding that the decision, or failure to act, was clearly contrary to specific provisions of this Ordinance.

9.11.5.4 The Board of Appeals shall decide all administrative appeals within thirty-five (35) days after the close of the hearing, and shall issue a written decision within seven (7) days of the Board's decision.

9.11.5.5 Board of Appeals decisions shall only be made by voting at a public meeting. In order to grant an administrative appeal, a majority of the members of the Board present and voting must vote in favor of the appeal. The Board of Appeals shall state the reasons and basis for its decision, including a statement of the facts found and conclusions reached by the Board. The Board shall cause written notice of its decision to be mailed or hand-delivered to the applicant within seven (7) days of the Board's decision. Copies of written decisions of the Board of Appeals shall be given to the Planning Board, Code Enforcement Officer, and the municipal officers.

9.12. Planning Board Appeals

9.12.1 An appeal may be taken within thirty (30) days after any decision is rendered by the Planning Board, by an aggrieved person to Superior Court pursuant to Rule 80B of the Maine Rules of Civil Procedure.

10.0 Application Submission Requirements

10.1 Type 1 Wind Energy Facility - Small Wind Energy System

10.1.1 Applicant and landowner's name and contact information.

10.1.2 Address of SWES location including tax map and lot number, existing use, and parcel acreage.

- 10.1.3 Description of the project including specific information on the type, size, rotor material, rated power output, performance, safety and noise characteristics of the system including name and address of the manufacturer, model and serial number.
- 10.1.4 A Sketch Plan showing the planned location of the SWES and location of and distance to setback lines, property lines, roads, driveways, buildings and any overhead utility lines both on the subject property and adjacent properties within 300 feet of the SWES.
- 10.1.5 Certification by a master electrician that all work is in conformance with the National Electrical Code.
- 10.1.6 If a roof-mounted system is proposed, evidence by a structural engineer that the applicant's roof is sufficiently sturdy to hold a roof-mounted wind generator in winds 100 miles per hour for an hour.
- 10.1.7 Structural drawings of the Tower foundation and anchoring system: a) prepared by the Wind Turbine or Tower manufacturer, b) prepared in accordance with the manufacturer's specifications or, c) prepared and stamped by a Maine-licensed professional engineer.
- 10.1.8 A written statement, signed by the Applicant, that certifies that the proposed facility is designed to meet the applicable noise control standards under section 13 and acknowledges the Applicant's obligation to take remedial action should it be determined by the Code Enforcement Officer that the equipment is in non-compliance.

10.2 Type 2 Wind Energy Facility

- 10.2.1. A completed application form including:
 - a. The Applicant and Participating Landowner(s)' name(s) and contact information.
 - b. The address, tax map number, zone and owner(s) of the proposed facility site and any contiguous parcels owned by Participating Landowners.
- 10.2.2. Receipt showing payment of application fee.
- 10.2.3 A copy of a deed, easement, purchase option or other comparable documentation demonstrating that the Applicant has right, title or interest in the proposed facility site.

- 10.2.4 Location map showing the boundaries of the proposed facility site and all contiguous property under total or partial control of the Applicant or Participating Landowner(s) and any Open Space, Scenic Resource or Historic Site within 2500 feet of the proposed development.
- 10.2.5 Description of the proposed Wind Energy Facility that includes the number and aggregate generating capacity of all Wind Turbines, the Turbine Height and manufacturer's specifications for each Wind Turbine (including but not limited to the make, model, maximum generating capacity, sound emission levels and types of overspeed controls) and a description of Associated Facilities.
- 10.2.6. Site plan showing the proposed location of each Wind Turbine and Associated Facilities and any of the following features located within 500 feet of any Wind Turbine: parcel boundaries, required setbacks, topographic contour lines (maximum 20-foot interval), roads, rights-of-way, overhead utility lines, buildings (identified by use), land cover including location and average height of tree cover to be retained and the location, variety, planting height and mature height of proposed trees, wetlands, streams, water bodies and areas proposed to be re-graded or cleared of vegetation.
- 10.2.7 Written evidence that the Environmental Coordinator of the Maine Department of Inland Fisheries and Wildlife (MDIFW) and that the Maine Natural Areas Program (MNAP) have both been notified of the pending application and the location and Turbine Height of all proposed Wind Turbines.
- 10.2.8. Written evidence that the provider of electrical service to the property has been notified of the intent to connect an electric generator to the electricity grid, if such connection is proposed.
- 10.2.9. Description of emergency and normal shutdown procedures.
- 10.2.10. Photographs of existing conditions at the site.
- 10.2.11 Structural drawings of the Tower foundation and anchoring system: a) prepared by the Wind Turbine or Tower manufacturer, b) prepared in accordance with the manufacturer's specifications or, c) prepared and stamped by a Maine-licensed professional engineer.
- 10.2.12. A written statement, signed by the Applicant, that certifies that the proposed facility is designed to meet the applicable noise control standards of this Ordinance and acknowledges the Applicant's obligation to take remedial action if the Code Enforcement Officer determines those standards are not being met.
- 10.2.13. An Application for Type 2 Wind Energy Facility shall also include

the following sight line, photographic and, if applicable, screening information:

- a. Sight Line Representations of each Wind Turbine from the nearest Occupied Building and from at least one other representative location within 500 feet of the Wind Turbine, such as a Scenic Resource or another Occupied Building. Each Sight Line Representation shall be drawn at a scale sufficiently large to make it legible. If screening is proposed, the proposed screening device, such as trees, shrubs or fencing, shall be depicted on the drawing along with the sight line as altered by the screening.
- b. A current four-inch by six-inch color photograph of the proposed site of the Wind Turbine(s) taken from viewpoints corresponding to each of the Sight Line Representations.
- c. One copy of each of the photographs described in b, above, onto which is superimposed an accurately-scaled and sited representation of the Wind Turbine(s).

10.3 Additional Submission Requirements for an Application for a Type 2 Wind Energy Facility

1. Certificates of design compliance obtained by the equipment manufacturers from Underwriters Laboratories, Det Norske Veritas, or other similar certifying organizations.
2. Decommissioning plan in conformance with Appendix B.
3. Written summary of operation and maintenance procedures for the Wind Energy Facility and a maintenance plan for access roads, erosion and sedimentation controls and storm water management facilities.
4. Standard boundary survey of the subject property stamped by a Maine-licensed surveyor. The Holden Planning Board may waive this requirement if it determines that the Applicant has provided information sufficient to identify property boundaries to the extent necessary.
5. Visual impact assessment, if required pursuant to section 14.5.
6. Storm water management plan stamped by a Maine-licensed professional engineer.
7. Sound level analysis, prepared by a qualified engineer, which addresses the standards of Section 13.
8. Shadow Flicker analysis based on WindPro or other modeling software approved by the Department of Environmental Protection.

9. Foundation and anchoring system drawings that are stamped by a Maine-licensed professional engineer.
10. Other relevant studies, reports, certifications and approvals as may be reasonably requested by the Holden Planning Board to ensure compliance with this Ordinance.

11.0 General Standards Type 1 & 2 Facilities

11.1 Safety Setbacks

Wind Turbines shall meet the minimum setback standards of Section 13.1

11.2 Natural Resource Protection

A Wind Energy Facility shall not have an unreasonable adverse effect on rare, threatened, or endangered wildlife, significant wildlife habitat, rare, threatened or endangered plants and rare and exemplary plant communities.

11.3 Building Code

All components of the Wind Energy Facility shall conform to relevant and applicable local and state building codes.

11.4 Overspeed Controls and Brakes

Each Wind Turbine shall be equipped with an overspeed control system that includes an aerodynamic control such as stall regulation, variable blade pitch, or other similar system, and a mechanical brake that operates in fail safe mode.

11.5 Electrical Components and Interconnections

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

11.6 Access

All ground-mounted electrical and control equipment and all access doors to a Wind Turbine shall be labeled and secured to prevent unauthorized access. A Wind Tower shall not be climbable up to a minimum of fifteen (15) feet above ground surface.

11.7 Blade Clearance

The minimum distance between the ground and all blades of a Wind Turbine shall be 25 feet as measured at the lowest arc of the blades.

11.8 Signal, Communications and Electromagnetic Interference Standards

The Applicant shall make reasonable efforts to avoid and mitigate to the extent practicable any disruption or loss of radio, telephone, television, or similar signals caused by the Wind Energy Facility.

11.8.1 Type 2 Wind Generation Facilities shall be sited and operated so that they do not interfere with emergency (fire, police/sheriff, ambulance) radio two way communications (base stations, mobile, and hand held radios, including digital) and/or paging, television, telephone (including cellular and digital), microwave, satellite (dish), navigational, internet or radio reception to neighboring areas. The Owner/operator of the project shall be responsible for the full cost of any remediation necessary to provide equivalent alternate service or correct any problems, including relocation or removal of the Wind Turbine, and any and all related transmission lines, transformers, and other components related to the interference.

11.8.2 The Owner/operator of the Type 2 Wind Generation Facility shall respond within one day to any request for communications interference investigation by any emergency agency (fire, police/sheriff, ambulance). Testing will commence within two days of the request. The Owner/operator is responsible for mitigating within two days from the determination of interference attributed to the operation of the Wind Turbine.

11.8.3 The Owner/operator of the Type 2 Wind Generation Facility shall respond within five business days to any request for communications interference investigation by a property owner or resident within a three-mile radius of the Wind Turbine Project. Testing will commence within ten business days of the request. The owner/operator is responsible for mitigating within ten business days from the determination of interference attributed to the operation of the Wind Turbine.

11.9 Structure Type

Type 2 Towers shall be monopoles with no guy wires.

11.10 Erosion Control

Erosion of soil and sedimentation shall be minimized by employing "best management practices" in the "*Maine Erosion Control Handbook for Construction: Best Management Practices*", March 2003.

11.11 Building-Mounted Wind Turbines

Building-mounted Wind Turbines are not permitted except for Type 1.

11.12 Visual Appearance

1. A Wind Turbine shall be a non-obtrusive color such as white, off-white or gray, or as may otherwise be required by another governmental agency with jurisdiction over the Wind Energy Facility.
2. A Wind Turbine shall not be lighted artificially, except to the extent consistent with Federal Aviation Administration recommendations or other applicable authority that regulates air safety or as is otherwise required by another governmental agency with jurisdiction over the Wind Energy Facility.
3. A Wind Turbine shall not be used to support signs and shall not display advertising except for reasonable and incidental identification of the turbine manufacturer, facility owner and operator, and for warnings.

11.13 Visibility of Wind Turbine

The following requirements apply, to the extent practicable, to Type 2 Wind Energy Facilities:

1. To the extent that doing so does not inhibit adequate access to the wind resource, each Wind Turbine shall be located to maximize the effectiveness of existing vegetation, structures and topographic features in screening views of the Wind Turbine from Occupied Buildings and Scenic Resources.
2. When existing features do not screen views of a Wind Turbine from Residences and Scenic Resources, screening may be required, where feasible and effective, through the planting of trees and/or shrubs. In order to maximize the screening effect and minimize wind turbulence near the Wind Turbine, plantings should be situated as near as possible to the point from which the Wind Turbine is being viewed. Such plantings shall be of native varieties.

11.14 Discontinued Use Type 1 Wind Energy Facility

A Type 1 Wind Energy Facility that is not generating electricity for twelve (12) consecutive months shall be deemed a discontinued use and shall be removed from the property by the Applicant within 120 days of receipt of notice from the Code Enforcement Officer, unless the Applicant provides information that the Code Enforcement Officer deems sufficient to demonstrate that the project has not been discontinued and should not be removed. If the Wind Energy Facility is not removed within this time period, the municipality may remove the turbine at the Applicant's expense. The Applicant shall pay all site reclamation costs deemed necessary and reasonable to return the site to its pre-construction condition, including the removal of roads and reestablishment of vegetation.

12.0 Operational License for Type 2 Wind Generation Facilities

- 12.1 An Operational License is required for the operation of all Type 2 Wind Energy Facilities.
- 12.2 Applications for an Operational License shall be submitted to the Town Council.
- 12.3 An Operational License shall be valid for five years with an annual review by the Council of the operation of the facility.
- 12.4 The granting of an Operational License is conditional upon the following criteria:
 - 12.4.1 For the initial Operational License, the Wind Turbine Project must successfully pass an inspection for structural and operational integrity conducted by a Maine licensed professional engineer. The inspection shall be conducted after construction is completed but before operations begin. Success will be demonstrated by submission of a copy of the engineer's inspection report to the Town Council. If the report specifies that repairs, maintenance or changes to safety procedures are necessary, the owner shall provide the Town Council with proof that the repairs have been completed, a written schedule for any recommended maintenance, and documentation of any updated safety procedures.
 - 12.4.2 For a renewal of an Operational License, the inspection procedure and criteria specified in Section 12.4.1 shall be completed six months prior to the expiration of the current Operational License.
- 12.5 Applications for Operational License renewals shall be submitted to the Town Council 6 months prior to their expiration.
- 12.6 Failure to comply with the provisions of this Ordinance may result in the suspension or revocation of the Operational License.
- 12.7 An Operational License shall be deemed abandoned if its operation has ceased for twelve consecutive months. An Operational License expires immediately upon abandonment.
- 12.8 An Operational License shall automatically transfer upon transfer of ownership of the Wind Turbine Project, provided that notice of the transfer is provided to the Code Enforcement Officer.
- 12.9 An Operational License shall automatically terminate upon any amendment to a permit.

12.10 Fees

12.10.1 The application fee for an Operational License is \$1,000.

12.10.2 The annual review fee for an existing Operational License is \$250.00.

13.0 Standards for Setbacks, Noise, Shadow Flicker, and Mitigation Waivers.

Setback, Noise, Shadow Flicker and Mitigation Waiver standards for Wind Turbines and Wind Generating Facilities located and operated in the Town of Holden shall apply to Occupied Buildings, property lines, and roads irrespective of Town boundaries. For the purpose of this section a resident of Brewer, Bucksport, Dedham, Eddington or Orrington is afforded the same protections as a resident of Holden.

13.1 Setback Standards

13.1.1 Setback standards for Type 1 Wind Turbines:

- a. Non-participating Landowner Property Lines –Type 1 Wind Turbines will be set back from the property line of any Non-participating Landowner a distance of no less than 1.5 times the turbine height. Non-participating property owners may waive this setback with a written Mitigation Waiver. (See Section 13.4 -Mitigation Waiver).
- b. Public and private rights of ways_ - Type 1 Wind Turbines will be set back from any public road a distance no less than 1.5 times the turbine height.

13.1.2 Setback standards for Type 2 wind turbines:

- a. Non-participating Landowner Property Lines – Type 2 Wind Turbines will be set back from the property line of any non-participating landowner a distance of no less than 13 times the turbine height. Non-participating property owners may waive this setback with a written Mitigation Waiver (see Section 13.4 - Mitigation Waiver).
- b. Public Roads - Type 2 Wind Turbines will be set back from any public road a distance no less than 4 times the turbine height.

13.1.3 Setbacks from Scenic or Special Resources

All Wind Turbines exceeding 60 feet or tree height on site, whichever is greater, must be set back a minimum of 2,500 feet from any Scenic or Special Resource as defined in Section 4.

Table 3: Summary of Setback Standards

Turbine Type	Non-participating Property Line	Public Roads	Scenic or Special Resources
Type 1 ≤60'	1.5x Turbine Height	1.5x Turbine Height	2500' if greater than tree height
Type 2	13x Turbine Height	4x Turbine Height	2500' if greater than 60' or tree height

13.2 Noise Standards

13.2.1 Noise Limits at Non-participating Property Lines

For Type 1 audible noise levels (dBA) at the property line due to wind turbine operations shall not exceed 35 dB(A) from 6 AM (8 AM on Sundays) to 8:30 PM and 30 dB(A) from 8:30 PM to 6 AM (8 AM on Sundays). Property owners may waive this noise restriction with a written Mitigation Waiver. (see Section 13.4 - Mitigation Waiver).

13.2.2 Noise Standards for Type 2 wind turbines:

- a. Audible noise levels (dBA) due to wind turbine operation will not exceed:

The pre-construction ambient noise level by more than 5dBA as measured at any property line. Pre-construction ambient noise studies shall be conducted, by the applicant, for all properties located within 2 times the setback of proposed wind turbine site.

Non-participating property owners may waive these noise restrictions with a written Mitigation Waiver. (see Section 13.4 -Mitigation Waiver).

- b. Low frequency noise levels (dBC) due to wind turbine operation as measured inside an occupied building or at any property line will not exceed:

i. 20 decibels (measured as dBC) above the pre-construction ambient noise level (measured as dBA). Pre-construction ambient noise studies shall be conducted, by the applicant, for all properties located within 2 times the setback of proposed wind turbine site.

ii. 50 dBC.

Property owners may waive these noise restrictions with a written Mitigation Waiver. (see Section 13.4 Mitigation Waiver)

- c. Noise measurement standards and procedures that must be used are contained in Appendix A.

13.2.3 Violations and Enforcement

13.2.3.1 A serious noise violation is defined as three (3) verified noise complaints as defined by a written or verbal complaint received by the Enforcing Authority attributed to the operation of a Wind Turbine within a period of one month or less with a measurable noise level greater than: 1) 10 dBA above the noise limits listed in section 13.2.1 for Type 1 and Type 2 Turbines; or 2) 10 dBA above pre-construction ambient noise levels or 50 dBC inside or at an Occupied Building. For serious violations the Owner/operator will respond within five (5) days of the complaint. Testing, if necessary, will be paid for by the Owner/operator and hired independently by the Town, and will commence within ten working days of the complaint. Testing will be conducted for a minimum of a one-month period according to the measurement standards and procedures in Appendix A. The Owner/operator is responsible for mitigating the problem within ten (10) days from a final determination of any cause attributed to the operation of the Wind Turbine. Failure to mitigate the problem will result in the Wind Turbine being declared unsafe and emergency shutdown procedures will be implemented per Section 9.10.4 of this Ordinance.

13.2.3.2 Noise violations not determined to be an emergency, or not determined to be a serious violation pursuant to Section 13.2.3.1, shall be managed pursuant to Section 9.10.6. Testing, if necessary, will be hired by the Enforcing Authority and will be paid for from the testing escrow account. Testing will be conducted for an appropriate period of time and conducted according to the measurement standards and procedures set forth in Appendix A. The Owner/operator is responsible for mitigating the problem within 30 days from a final determination of any cause attributed to the operation of the Wind Turbine Project. Mitigation involving significant construction or physical modification may have up to 90 days to be completed.

13.3 Shadow Flicker and Blade Reflection

13.3.1 Wind Turbines shall be designed and sited so that shadow flicker and/or blade reflection will not fall on a shadow flicker receptor as defined in Section 4 The flicker or reflection shall not exceed 10 hours per year for any given shadow flicker receptor.

13.3.2 Violations and Enforcement

13.3.2.1 A serious shadow flicker or blade reflection violation is defined as: 1) three (3) days of shadow flicker or blade reflection, in any one month falling on an Occupied Building receptor that, if annualized, will be estimated to be more than 20 hours per year. The predictive annualized calculation for Occupied Buildings shall assume clear weather, but take into account seasonal tracking of the sun. For serious violations the Owner/operator will respond within five (5) days of the complaint. The Owner/operator is responsible for mitigating the problem within ten (10) days from a final determination of any cause attributed to the operation of the Wind Turbine. Failure to mitigate the problem will result in the Wind Turbine being declared unsafe and emergency shutdown procedures will be implemented per Section 9.10.4 of this Ordinance.

13.3.2.2 Shadow flicker and blade reflection not determined to be a serious violation pursuant to Section 13.3.1, shall be managed pursuant to Section 9.10.6. Field verification and modeling, if necessary, will be hired by the Enforcing Authority and paid for from the testing escrow account. The Owner/operator is responsible for mitigating the problem within 30 days from a final determination of any cause attributed to the operation of the Wind Turbine Project. Mitigation involving significant construction or physical modification may have up to 90 days to be completed.

13.4 Mitigation Waiver

Non-participating Landowners may waive specified protections of setbacks, noise and shadow flicker in this Ordinance using the Mitigation Waiver negotiated between the Applicant and the Non-participating Landowner. The form of any proposed Mitigation Waiver shall be submitted to the Enforcing Authority for review and approval prior to the execution of the document. Copies of executed Mitigation Waivers must be included with the submission of the wind turbine application. The Mitigation Waiver must be recorded in the Penobscot County Register of Deeds, describe the benefited and burdened properties and run with the land. The deed must advise all subsequent owners of the burdened property.

14.0 Special Standards for Type 2 Wind Energy Facilities

14.1 Control of Noise

Noise emanating from a Type 2 Wind Energy Facility shall be controlled in accordance with the provisions of Section 13.2.2

14.2 Use of Public Roads

1. The Applicant shall identify all state and local public roads to be used within the Town of Holden to transport equipment and parts for construction, operation or maintenance of a Type 2 Wind Energy Facility.
2. The Town Engineer, Road Commissioner or a qualified third-party engineer reasonably acceptable to both the Town of Holden and the Applicant and paid for by the Applicant pursuant to Section 9 of the Ordinance, shall document road conditions prior to construction. The Town Engineer, Road Commissioner or third-party engineer shall document road conditions again thirty (30) days after construction is complete or as weather permits.
3. The Applicant shall demonstrate, to the satisfaction of the Town Manager that it has financial resources sufficient to comply with subsection 4, below, and the Town of Holden may require the Applicant to post a bond or other security in order to ensure such compliance.
4. Any road damage caused by the Applicant or its contractors shall be promptly repaired at the Applicant's expense.

14.3 Warnings

A clearly visible warning sign concerning voltage must be placed at the base of all pad-mounted transformers and substations.

14.4 Artificial Habitat

To the extent practicable, the creation of artificial habitat for raptors or raptor prey shall be minimized. In making its determination under this subsection the Planning Board shall consider comments and recommendations, if any, provided by the Maine Department of Inland Fisheries and Wildlife.

14.5 Effect on Scenic Resources

1. Except as otherwise provided in this subsection, if a Type 2 Wind Energy Facility is proposed for location in or is visible from a Scenic Resource, the Applicant shall provide the Planning Board a visual impact assessment that addresses the evaluation criteria in subsection

14.5.3.

2. The Planning Board shall determine, based on consideration of the evaluation criteria in subsection 14.5.3, whether the Type 2 Wind Energy Facility significantly compromises views from a Scenic Resource such that the proposed facility has an unreasonable adverse effect on the scenic character or existing uses related to scenic character of that Scenic Resource.
3. In making its determination the Planning Board shall consider:
 - a. The significance of the potentially affected Scenic Resource;
 - b. The existing character of the surrounding area;
 - c. The expectations of the typical viewer;
 - d. The Type 2 Wind Energy Facility's purpose and the context of the proposed activity;
 - e. The extent, nature and duration of potentially affected public uses of the Scenic Resource and the potential effect on the public's continued use and enjoyment of the Scenic Resource; and
 - f. The scope and scale of the potential effect of views of the Wind Energy Facility on the Scenic Resource, including but not limited to issues related to the number and extent of Wind Turbines visible from the Scenic Resource, the distance from the Scenic Resource and the effect of prominent features of the Wind Energy Facility on the landscape.

A finding by the Planning Board that the Type 2 Wind Energy Facility is a highly visible feature in the landscape is not a solely sufficient basis for determination that it has an unreasonable adverse effect on the scenic character and existing uses related to scenic character of a Scenic Resource.

14.6 Light Pollution

The Wind Turbine Project shall be designed to minimize the amount of nighttime light pollution. The Applicant shall provide a plan showing lighting on and around all Wind Turbines and Associated Facilities. Lighting on Wind Turbines shall be illuminated to Federal Aviation Administration (FAA) minimal standards using only red rather than white lights, if possible. The minimum number of Wind Turbines will be illuminated, per FAA rules. Lighting shall be shielded from ground view to FAA maximum standards.

14.7 Relationship to DEP Certification and Permitting

1. The Planning Board may, as a condition of approval of a Type 2 Wind Energy Facility, deem DEP's issuance of a permit for the development sufficient to meet, in whole or in part, as applicable, the requirements of this Ordinance requiring protection of Scenic Resources of state or national significance.

14.8 Local Emergency Services

1. The Applicant shall provide a copy of the project summary and site plan to local emergency service providers.
2. Upon request, the Applicant shall cooperate with emergency service providers to develop and coordinate implementation of an emergency response plan for a Type 2 Wind Energy Facility.
3. A Wind Turbine shall be equipped with an appropriate fire suppression system to address fires within the Nacelle portion of the turbine or shall otherwise address the issue of fire safety to the satisfaction of the Planning Board.

14.9 Liability Insurance

The Applicant or an Applicant's designee acceptable to the Planning Board shall maintain a current general liability policy for the Type 2 Wind Energy Facility that covers bodily injury and property damage with limits in an amount commensurate with the scope and scale of the Facility. The Applicant or its designee shall make certificates of insurance available to the Planning Board upon request.

14.10 Design Safety Certification

Each Wind Turbine shall conform to applicable industry standards including those of the American National Standards Institute (ANSI) and at least one of the following: Underwriters Laboratories, Det Norske Veritas, Germanischer Lloyd Wind Energies, or other similar certifying organization.

14.11 Public Inquiries and Complaints

1. The Applicant or its designee shall maintain a phone number and identify a responsible Person for the public to contact with inquiries and complaints throughout the life of the Wind Energy Facility.
2. The Applicant or its designee shall make reasonable efforts to respond to the public's inquiries and complaints and shall provide written copies of all complaints and the company's resolution or response to the Code Enforcement Officer upon request.

14.12 Decommissioning

The Applicant shall prepare a decommissioning plan in conformance with Appendix B.

Appendix A - Noise Measurement Standards and Procedures

1. A qualified independent acoustical consultant shall conduct all noise studies. The acoustical consultant shall be hired by and report to the Planning Board or Enforcing Authority.
2. Sound level meters and calibration equipment must comply with the latest version of the American National Standards Institute "American Standard Specifications for General Purpose Sound Level Meters" (ANSI Standard S1.4) and shall have been calibrated at a recognized laboratory within one month prior to the initiation of the study.
3. Except as specifically noted otherwise, measurements shall be conducted in compliance with ANSI Standard S12.18-1994 "Outdoor Measurements of Sound Pressure".
4. Prior to permit application approval, a pre-construction ambient noise level study shall be conducted at each Occupied Building within 2 miles of any proposed wind turbine.
5. The tests shall be conducted using both an A-weighting scale (dBA) and low frequency C-weighting scale (dBC).
6. Tests shall be reflective of seasonal changes to vegetation and atmospheric conditions. At a minimum one set of tests shall be performed during each of the four (4) calendar seasons of the year.
7. All measuring points shall be located in consultation with the property owners and such that no significant obstruction blocks noise and vibration to the site.
8. Outdoor noise level measurements must be taken at 6 feet above the ground and at least 15 feet from any reflective surface.
9. Duration of measurements shall be a minimum of ten continuous minutes for each criterion at each location.
10. Measurements must be made when the wind levels are less than 4.5 mph and with appropriate wind screening for the recording device.
11. Measurements should be obtained during representative weather conditions when the Wind Turbine noise is most noticeable, including periods of temperature inversion most commonly occurring at night.
12. Measurements shall be taken at each of the following three time periods:
 - Day (10 a.m. – 2p.m.)
 - Evening (7p.m. -11 p.m.)
 - Night (12 midnight – 4 a.m.)

13. Each measurement shall be replicated during the same time period over three different days within the same season for a total of 9 measurements per location per season (i.e., three daytime measurements in the winter, three evening measurements in the winter, three night time measurements in the winter). The lowest of the three measurements per time period, per season, will be used to determine the pre-construction ambient noise for that time period and season.
14. For each measurement the following minimum criteria will be recorded:
 - L_{max} , L_{eq} , L_{10} and L_{90} in dBA¹
 - L_{max} , L_{eq} , L_{10} and L_{90} in dBC
 - A narrative description of any intermittent noises registered during each measurement
 - Wind speed and direction at time of measurement
 - Description of weather conditions at time of measurement
 - Description of topography and contours relative to proposed or actual Wind Turbines
15. A 5 dBA and/or a 5 dBC penalty shall be applied for short duration repetitive noise or repetitive impulse noise. This is a characteristic “thumping” or “whooshing” sometimes exhibited by larger Wind Turbines.
16. A 5 dBA penalty shall be applied for tonal noise. This is a single or limited frequency noise (vs. broadband noise) associated with mechanical noise artifacts (i.e. high pitched whining, screeching, buzzing).
17. For sites being measured with existing Wind Turbines two sets of measurements are required: 1) one set with the Wind Turbine(s) off and; 2) one set with the Wind Turbine(s) running.
18. For nuisance complaints after the Wind Turbines are operational, the measurement points, season, time, and duration of measurements shall be selected in consultation with the affected property owner. If requested by the property owner, continuous measurements may be taken for longer periods of time to capture intermittent nuisance noise patterns.
19. When conducting their pre-construction noise prediction analysis, the Applicant shall make specific reference to: 1) the unique aspects of the mountainous contours and terrain of the area and its effect on noise predictability and; 2) line source noise predictions (emanating from a line of Wind Turbines) in addition to the traditional single point source predictions.
20. Any noise level falling between two (2) whole decibels shall be deemed the higher of the two.

¹ L_{\max} - the maximum noise level measured; L_{eq} – average noise level for a given period of time; L_{10} – Sound level exceeded 10% of the time; L_{90} Sound level exceeded 90 % of the time, generally equivalent to ambient noise.

Appendix B - Decommissioning Standards for Type, 2 Wind Generation Facilities.

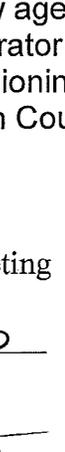
- 1 The Owner/operator shall, at its expense, complete decommissioning of the Wind Turbine Project within: 1) twelve months (12) after the end of the useful life of the Wind Turbine as determined by the Owner/operator or; 2) as specified in the materials provided at the time of application or; 3) pursuant to remedies described in Section 9.10. The Wind Turbine or Wind Turbine Project 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.
- 2 Decommissioning shall include removal of wind turbines and foundations to a depth of 36 inches. All buildings, cabling, electrical components, roads, and any other associated facilities shall be removed unless, at the end of the Turbine or Wind Turbine Project's useful life, as determined in accordance with section 1 of this appendix, the Applicant provides written evidence of plans for continued beneficial use of these components of the Wind Turbine Project.
- 3 Except as otherwise provided by section 2 of this appendix, disturbed earth shall be graded and re-seeded, unless the Participating Landowner of the affected land requests otherwise in writing. Any alterations to Town roads or property during decommissioning must be approved by the Town.
- 4 An independent and Licensed 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 the Holden Town Council after the first year of operation and every fifth year thereafter.
- 5 The Owner /operator shall post and maintain decommissioning funds in an amount equal to Net Decommissioning Costs; provided that at no point shall decommissioning funds be less than twenty five percent (25%) of Decommissioning Costs. The decommissioning funds shall be posted and maintained with a bonding company or Federal or State-chartered lending institution chosen by the Owner/operator and Participating Landowner posting the financial security, provided that the bonding company or lending institution is authorized to conduct such business within the State and is approved by the Holden Town Council, whose approval shall not be unreasonably withheld.
- 6 Decommissioning funds may be in the form of a performance bond, surety bond or other similar form of financial assurance as may be acceptable to the Holden Town Council, whose approval shall not be unreasonably withheld.
- 7 If the Owner/operator fails to complete decommissioning within the period prescribed by Section 1, then the Participating Landowner shall have an additional six (6) months to complete decommissioning.
- 8 If neither the Owner/operator, nor the Participating Landowner completes

decommissioning within the periods prescribed by Sections 1 and 7 the Wind Generation Facility shall be deemed to be in violation of this Ordinance and the Town of Holden may take such measures as necessary, including court action, to ensure the completion of decommissioning.

- 9 The escrow agent shall release the decommissioning funds when the Owner/operator has demonstrated and the Town Council concurs that the decommissioning has been satisfactorily completed, or upon written approval of the Town Council in order to implement the decommissioning plan.

Approved at Town Meeting

On June 9, 2010


John W. Butts, Town Manger