

## BEFORE THE POWER SITING BOARD OF THE STATE OF OHIO

In the Matter of an Application by Hardin Wind )  
 Energy LLC for a Certificate of Environmental ) Case No. 09-0479-EL-BGN  
 Compatibility and Public Need for the Hardin )  
 Wind Farm )

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JOINT STIPULATION AND RECOMMENDATION

## I. INTRODUCTION

Applicant Hardin Wind Energy LLC ("Hardin Wind" or "Applicant") and the Staff of the Ohio Power Siting Board ("OPSB Staff"), at times collectively referred to as the parties, submit this Joint Stipulation and Recommendation ("Stipulation") for adoption by the Ohio Power Siting Board (the "Board"). This Stipulation is intended by the parties to resolve all matters pertinent to the certification and construction of a wind farm comprised of up to 200 wind turbines with a nameplate capacity of 1.5 MW or 1.6 MW each and other associated facilities (hereinafter referred to as the "Facility") located west of the city of Kenton in Hardin County. The Facility is more fully described in Hardin Wind's application filed with the Board on July 10, 2009, and amended on September 18, 2009 ("Amended Application"), in this proceeding.

The Staff Report was issued on December 21, 2009. A local public hearing was held at the Hardin County Courthouse in Kenton, Ohio on January 5, 2010 and the evidentiary hearing was held on January 12, 2010 at the offices of the Public Utilities Commission of Ohio in Columbus. The Ohio Farm Bureau Federation filed the only motion to intervene in this proceeding on July 14, 2009, which was granted at the evidentiary hearing on January 12, 2010.

This Stipulation results from discussions between the Staff and the Applicant who acknowledge that this agreement is amply supported by the record and thus is entitled to

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Careful consideration by the Board. Accordingly, the parties recommend that the Board issue a Certificate of Environmental Compatibility and Public Need for the Facility.

## **II. STIPULATION AND RECOMMENDATION**

### **A. Recommended Conditions**

The proposed project is located in Hardin County, west of the city of Kenton, and encompasses portions of the following townships: Cessna, Marion, Lynn, McDonald, Roundhead, and Taylor Creek. The entire project area includes approximately 36,000 acres of primarily agricultural land, of which the Applicant has leased about 20,000 acres for the Facility. The project itself involves the construction and operation of a wind farm comprised of up to 200 wind turbines with a nameplate capacity of 1.5 MW or 1.6 MW each—thereby providing an aggregate generating capacity of up to 300 MW.

Construction of the Facility will be completed in two phases, beginning in mid 2010. The first phase includes up to 156 of the 200 turbines. Although the Applicant has proposed 203 turbine locations, it will only construct up to 200 turbines in the final layout. The second phase includes up to 47 turbines.

The parties recommend that the Board issue the Certificate of Environmental Compatibility and Public Need requested by Hardin Wind subject to the following conditions:

- (1) That the Facility be installed at the Applicant's proposed site as presented in the amended application filed on September 18, 2009, and as modified and/or clarified by the Applicant's supplemental filings.
- (2) That the Applicant shall utilize the equipment and construction practices as described in the amended application and as modified and/or clarified in supplemental filings, replies to data requests, and recommendations OPSB Staff has included in this Staff Report of Investigation.
- (3) That the Applicant shall implement the mitigative measures as described in the amended application and as modified and/or clarified in supplemental filings, replies to data requests, and recommendations OPSB Staff has included in this Staff Report of Investigation.

- (4) That when the Applicant submits documents for OPSB Staff review and approval, OPSB Staff shall notify the Applicant of its approval decision within ten (10) business days of receipt, unless OPSB Staff notifies the Applicant within three (3) business days of the Applicant's submission that OPSB Staff requires additional time. This time constraint shall not apply to reviews conducted by staff of the Ohio Environmental Protection Agency or staff of the Ohio Department of Natural Resources ("ODNR") when the Applicant submits documents or permit applications to their agencies.
- (5) That the Applicant shall conduct a pre-construction conference prior to the start of each construction phase, which the OPSB Staff shall attend, to discuss how environmental concerns will be satisfactorily addressed.
- (6) That the Applicant shall properly install and maintain erosion and sedimentation control measures at the project site in accordance with the Ohio NPDES permit(s) obtained for the project, the approved SWPPP created for this project, and with the following requirements:
  - (a) During construction of the Facility, seed all disturbed soil, except within actively cultivated agricultural fields, within seven (7) days of final grading with a seed mixture acceptable to the appropriate County Cooperative Extension Service. Denuded areas, including spoils piles, shall be seeded and stabilized within seven (7) days, if they will be undisturbed for more than twenty-one (21) days. Reseeding shall be done within seven (7) days of emergence of seedlings as necessary until sufficient vegetation in all areas has been established.
  - (b) Inspect and repair all erosion control measures after each rainfall event of one-half of an inch or greater over a twenty-four (24) hour period, and maintain controls until permanent vegetative cover has been established on disturbed areas.
  - (c) Obtain NPDES permits for storm water discharges during construction of the Facility. A copy of each permit or authorization, including terms and conditions, shall be provided to the OPSB Staff within seven (7) days of receipt.
- (7) That the Applicant shall comply with the Ohio NPDES permit(s) obtained for the project, the approved SWPPP created for this project, and shall employ the following construction methods when engaging in construction activities in proximity to any watercourses:
  - (a) All watercourses, including wetlands, shall be delineated by fencing, flagging, or other prominent means.
  - (b) All construction equipment shall avoid watercourses, including wetlands, except at specific locations where construction has been approved.
  - (c) Storage, stockpiling, and/or disposal of equipment and materials in these sensitive areas shall be prohibited.

- (d) Structures shall be located outside of identified watercourses, including wetlands, except at specific locations where construction has been approved.
  - (e) All storm water runoff is to be diverted away from fill slopes and other exposed surfaces to the greatest extent possible, and directed instead to appropriate catchment structures, sediment ponds, etc., using diversion berms, temporary ditches, check dams, or similar measures.
- (8) That the Applicant shall employ best management practices when working near environmentally sensitive areas. This includes, but is not limited to, the installation of silt fencing or a similarly effective tool prior to initiating construction near streams and wetlands. The installation shall be done in accordance with the Ohio NPDES permit(s) obtained for the project, the approved SWPPP created for this project, and with generally accepted construction methods and shall be inspected regularly.
- (9) That the Applicant shall have an environmental specialist on site during construction activities, including vegetation clearing, being performed in sensitive areas such as a designated wetland, stream, river, or in the vicinity of identified mussels (common or federal or state listed threatened and endangered) and threatened and endangered species or their identified habitat. The environmental specialist shall be familiar with water quality protection issues, and able to field-identify mussels (common and federal or state listed threatened and endangered), and potential threatened and endangered species of plants and animals that may be encountered during project construction.
- (10) That, prior to construction, the Applicant shall conduct a presence/absence mussel survey within streams that will be impacted by culverts and potentially from frac-out during HDD. All findings from this survey shall be submitted to OPSB Staff and ODNR in coordination with USFWS for review, comment, and establishment of avoidance, minimization, and mitigation measures. For common mussel species, the Applicant may either relocate the Facility to avoid the identified species location, or include potential relocation of mussels in the required frac-out contingency plan. As part of this plan, the Applicant shall provide survey/relocation methods, details on the survey area(s) and relocation site(s), and establish post-relocation monitoring protocols. All surveys/relocations shall be conducted by an ODNR-approved malacologist. The post-relocation monitoring shall be for two consecutive years at the recipient relocation site(s) to determine survivorship. A survivorship report shall be submitted to OPSB Staff and ODNR by December 31 of each consecutive year for review. If federal or state listed threatened and endangered mussels are found during the survey, the Applicant must avoid the identified species location by relocating Facility components, subject to OPSB Staff and ODNR review and approval. If OPSB Staff and ODNR in coordination with USFWS determine that a significant adverse impact has occurred to threatened or endangered mussels, additional mitigation measures will be prescribed to the Applicant by OPSB Staff and ODNR.
- (11) That the Applicant shall not work in the types of streams listed below during fish spawning restricted periods (April 15 to June 30), unless a waiver is issued by the

ODNR and approved by OPSB Staff, releasing the Applicant from a portion of, or the entire restriction period.

- (a) Class 3 primary headwater streams (watershed  $\leq$  one mi<sup>2</sup>)
  - (b) Exceptional Warm Water Habitat (EWH)
  - (c) Cold Water Habitat (CWH)
  - (d) Warm Water Habitat (WWH)
  - (e) Streams potentially supporting threatened and endangered species
- (12) That the Applicant shall adhere to all avoidance, minimization, and mitigation measures established by OPSB Staff and ODNR, in coordination with the USFWS, as a result of review of the "Hardin Wind Farm. Hardin County, Ohio Wildlife Baseline Report" prepared by Western EcoSystems Technology, Inc. dated December 16, 2009 and sent to ODNR and USFWS on December 16, 2009.
- (13) That prior to construction, the Applicant shall develop a post-construction avian and bat mortality survey plan for OPSB Staff and ODNR in coordination with USFWS review and approval. The plan shall be implemented at the commencement of operation of the Facility. The Applicant shall adhere to all avoidance, minimization, and mitigation measures approved by the OPSB Staff and ODNR in coordination with USFWS, as a result of review of the final post construction avian and bat mortality surveys.
- (14) That the Applicant shall initiate formal consultation with the USFWS under provisions of Section 7 or Section 10 of the Endangered Species Act prior to construction of phase two of this project. If required as a result of the formal consultation process, the Applicant shall obtain all applicable permits and approvals prior to beginning phase two of construction. A copy of the USFWS Biological Opinion shall be provided to OPSB Staff prior to construction of phase two of this project. All conditions set forth in the Biological Opinion shall be adhered to during construction and post construction of phase two of this project. If provisions under Section 10 of the Endangered Species Act are invoked as a result of the formal consultation process, the Applicant shall develop a Habitat Conservation Plan and obtain the associated Incidental Take Permit from the USFWS regarding the potential take of Indiana bats for construction phase two. All avoidance, minimization, and mitigation measures to protect the Indiana bat that are identified in a Habitat Conservation Plan and Incidental Take Permit shall be implemented as described in said documents for construction phase two.
- (15) That the Applicant shall perform a plant survey within the study area prior to construction to determine the presence of the state listed *Setaria parviflora*. The results of this survey shall be provided to OPSB Staff and ODNR prior to start of construction. All populations found shall be marked for avoidance.
- (16) That the Applicant shall adhere to seasonal cutting dates of October 1 through March 31 for removal of suitable Indiana bat habitat trees unless otherwise pre-approved in writing by OPSB Staff and ODNR in consultation with USFWS.

- (17) That OPSB Staff, ODNR and the USFWS shall be contacted within twenty four hours if threatened or endangered species are encountered during construction activities. Activities that could adversely impact the identified plants or animals will be halted until an appropriate course of action has been agreed upon by the Applicant and OPSB Staff.
- (18) That the Applicant shall assure compliance with fugitive dust rules by the use of water spray or other appropriate dust suppressant measures whenever necessary.
- (19) That the Applicant shall coordinate with the appropriate authority regarding any vehicular lane closures due to construction.
- (20) That the Applicant conform to any drinking water source protection plan, if it exists, for turbines located within the drinking water source protection areas of the villages of Alger or McGuffey.
- (21) That the Applicant shall become a member of the Ohio Utilities Protection Service prior to commencement of operation of the Facility. Notification of membership shall be provided to OPSB Staff.
- (22) That the Applicant shall complete a full geotechnical investigation to confirm that there are no issues to preclude development of the wind farm. The geotechnical investigation shall include borings at each turbine location to provide subsurface soil properties and recommendations needed for the final design and construction of each wind turbine foundation, as well as the final location of the transformer substation and interconnection substation. All boreholes must be filled and borehole abandonment must comply with state and local regulations. The Applicant shall provide copies of all geotechnical boring logs to OPSB Staff and to the ODNR Division of Geological Survey.
- (23) That at least thirty (30) days before construction, the Applicant shall submit to the OPSB Staff, for review and approval, the final turbine foundation design for each turbine location.
- (24) That the Applicant shall provide the final delivery route plan and the results of any traffic studies to OPSB Staff and to the Hardin County Engineer thirty (30) days prior to the pre-construction conference. The Applicant shall complete a study on the final equipment delivery route to determine what improvements will be needed in order to transport equipment to the wind turbine construction sites. The Applicant shall make improvements to the final delivery route as outlined in the study and/or as mutually agreed upon by the Applicant and the Hardin County Engineer. The Applicant's study and delivery route plan shall consider, but not be limited to, the following:
  - (a) Perform a survey of the final delivery routes to determine the exact locations of vertical constraints where the roadway profile will exceed the allowable technical bump and dip specifications.
  - (b) Identify locations along the final delivery routes where overhead utility lines may not be high enough for over-height permit loads and coordinate with the appropriate utility company if lines are required to be raised.

- (c) Identify upgrades to any roads and bridges that are not able to support the projected loads from delivery of the wind turbines and other Facility components.
  - (d) Describe the restoration of locations where wide turns may impact the road facilities and surrounding areas, and where any roads or bridges are damaged, to their original condition.
- (25) That the Applicant or the Applicant's designee shall obtain all required Hardin County transportation permits and all necessary permits from ODOT. Any temporary or permanent road closures necessary for construction and operation of the proposed Facility shall be coordinated with the appropriate entities including, but not limited to, the Hardin County Engineer, ODOT, local law enforcement, and health and safety officials.
- (26) That any damage to roads, ditches, and/or bridges caused by construction activity shall be repaired to its pre-construction state by the Applicant or the Applicant's designee in compliance with all requirements of the Hardin County Engineer. The requirements shall be outlined in a written agreement between the Applicant and the Hardin County Engineer. If this cannot be agreed upon, the Applicant or Applicant's designee shall post a surety bond or other form of financial assurance mutually agreed upon by the Applicant and OPSB Staff to cover any damages to Interstate roads and all state, county, and township roads and bridges that may occur while transporting wind turbines and other Facility components to and from the wind farm site and during all construction activities.
- (27) That prior to construction, the Applicant shall prepare a Phase I cultural resources survey program for archaeological work at turbine locations, access roads, construction staging areas, and collection lines acceptable to OPSB Staff. If the resulting survey work discloses a find of cultural or archaeological significance, or a site that could be eligible for inclusion on the National Register of Historic Places, then the Applicant shall submit an amendment, modification, or mitigation plan for OPSB Staff's approval. Any such mitigation effort shall be developed in coordination with the Ohio Historic Preservation Office, with input from the Hardin County Historical Society, and submitted to OPSB Staff for review and approval.
- (28) That prior to the commencement of construction, the Applicant shall conduct an architectural survey of the project area. The Applicant shall submit to OPSB Staff a work program that outlines areas to be studied, with the focus starting in and around the villages of Alger, McGuffey, and Foraker, and the locations of the numerous schoolhouses identified in the application. If the architectural survey discloses a find of cultural or architectural significance, or a structure that could be eligible for inclusion on the National Register of Historic Places, then the Applicant shall submit an amendment, modification, or mitigation plan for OPSB Staff's. Any such mitigation effort shall be developed in coordination with the Ohio Historic Preservation Office, with input from the Hardin County Historical Society, and submitted to OPSB Staff for review and approval.
- (29) That the Applicant shall avoid, where possible, or minimize to the maximum extent practicable, any damage to field drainage systems resulting from construction,

maintenance, and operation of the Facility. Damaged field tile systems shall be repaired to at least original conditions at Applicant's expense. Excavated topsoil shall be segregated and restored upon backfilling. Severely compacted soils shall be plowed or otherwise de-compacted, if necessary, to restore them to original conditions.

- (30) That the Applicant shall remove all temporary gravel and other construction staging area and access road materials after completing construction, but no later than 60 days after the start of commercial operation, unless otherwise directed by the participating landowner, and substantially restore the impacted areas to pre-construction conditions, in compliance with the Ohio NPDES permit(s) obtained for the project and the approved SWPPP created for this project.
- (31) That the Applicant shall not dispose of gravel or any other construction material during or following construction of the Facility by spreading such material on agricultural land. All construction debris and all contaminated soil shall be promptly removed and properly disposed of in accordance with Ohio EPA regulations.
- (32) That no commercial signage or advertisements shall be located on any turbine, tower, or related infrastructure. If vandalism should occur, the Applicant shall remove or abate the damage immediately to preserve the aesthetics of the project. Any abatement other than the restoration to pre-vandalism condition is subject to approval by OPSB Staff.
- (33) That at least thirty (30) days prior to the pre-construction conference, the Applicant shall model shadow flicker within 1,000 meters, in the same manner as presented in the application, and in subsequent data requests and interrogatories, for OPSB Staff review and approval.
- (34) That any turbine forecasted prior to construction to create in excess of 30 hours per year of shadow flicker at a non-participating receptor within 1,000 meters shall be subject to mitigation prior to construction. Mitigation shall consist of either reducing the turbine's forecasted impact to 30 hours per year, or other measures acceptable to OPSB Staff, the Applicant and the affected receptor(s).
- (35) That during operation, and as part of a complaint resolution process, the Applicant shall perform on-site investigations of all reported complaints regarding shadow flicker and shall implement mitigation measures to reduce shadow flicker nuisances at residences where significant shadow flicker impacts are found to occur. Mitigation shall include providing wind shades or planting trees, depending on the specific situation or other measures acceptable to the OPSB Staff, the Applicant and the affected receptors.
- (36) That any turbine forecasted prior to construction to exceed the  $L_{eq}$  plus five (5) dBA (non-cumulative), at any non-participating residence under any operating conditions, shall be subject to further study of potential impact and possible mitigation. Mitigation, if required, shall consist of measures acceptable to OPSB Staff, the Applicant, and the affected receptor(s). The parties agree that each Project area is unique with respect to noise; that the model of turbine selected for the project



has a unique set of noise characteristics; and that therefore the agreed-upon noise condition applies exclusively to the Hardin Wind Farm.

- (37) That within fourteen (14) months following the start date of commercial operation, the Applicant shall provide OPSB Staff a report documenting the results of a post-construction noise monitoring study performed by a qualified noise expert that includes actual on-site measurements while the Project is operating and that is designed to show whether or not the Project is in compliance with the noise limits defined in Condition 36. If the post-construction noise study shows that the Project is not in compliance with the noise limits of Condition 36, then the Applicant shall meet the noise standards in Condition 36 or work with OPSB Staff to determine appropriate mitigations.
- (38) That general construction activities shall be limited to daylight hours. Impact pile driving and blasting operations, if needed, shall be limited to the hours between 8:00 a.m. to 5:00 p.m., Monday through Friday. Construction activities that do not involve noise increases above ambient levels at sensitive receptors are permitted outside daylight hours when necessary.
- (39) That at least thirty (30) days prior to the pre-construction conference and subject to OPSB Staff review and approval, the Applicant shall create and implement a complaint resolution procedure in order to address potential operational concerns experienced by the public. The Applicant shall work to mitigate and resolve any issues with those who file a complaint. Any complaint submitted must be immediately forwarded to the OPSB Staff.
- (40) That the Applicant must meet all recommended and prescribed FAA and ODOT Office of Aviation requirements to construct an object that may affect navigable airspace. This includes submitting all final turbine locations for ODOT Office of Aviation and FAA review prior to construction, and the non-penetration of any FAA *Part 77* surfaces.
- (41) That 90 days prior to any construction, the Applicant notify, in writing, any airport owner, whether public or private, whose operations, operating thresholds/minimums, landing/approach procedures and/or vectors are altered, or are expected to be altered by the siting, operation, maintenance, or decommissioning of a wind generation facility.
- (42) That all applicable structures be lit in accordance with FAA circular 70/7460-1 K Change 2, *Obstruction Marking and Lighting*; Chapters 4, 12, and 13 (Turbines); or as otherwise prescribed by the FAA.
- (43) That the Applicant must meet all recommended and prescribed FAA and federal agency requirements to construct an object that may affect local and/or long-range radar, and mitigate any effects or degradation caused by wind turbine operation, up to and including removal of afflicting turbine(s).
- (44) That the Applicant shall provide all real-time meteorological data observed by instruments on the Facility's meteorological towers to the National Weather Service offices in Cleveland and Wilmington, OH, to offset any possible Nexrad weather radar interference the wind farm may cause, if interference is predicted.

- (45) That, prior to construction, the Applicant shall submit the final layout and turbine locations to the National Telecommunications and Information Administration for review and approval.
- (46) That the Applicant must meet all recommended and prescribed Federal Communications Commission and other federal agency requirements to construct an object that may affect communications and, subject to OPSB Staff approval, mitigate any effects or degradation caused by wind turbine operation. For any residence that is shown to experience a total loss of TV reception due to the Facility operation, the Applicant shall provide, at its own expense, cable or direct broadcast satellite TV service.
- (47) That the Applicant conduct an in-depth vertical Fresnel-Zone analysis to determine if turbines 38 and 180 will cause microwave interference. Pursuant to OPSB Staff review and approval, the Applicant shall shift the location of, or eliminate, turbines 38 and 180, based on the results of the aforementioned study.
- (48) That the Applicant shall comply with the turbine manufacturer's safety manual and shall maintain a copy of the safety manual in the O&M building of the Facility.
- (49) That the Applicant shall restrict public access to the site with appropriately placed warning signs or other necessary measures.
- (50) That the Applicant shall instruct workers on potential hazards of ice conditions on wind turbines.
- (51) That the Applicant shall comply with the following conditions regarding decommissioning:
  - (a) Prior to any decommissioning activities that involve the disturbance of one or more acres, if applicable, the Applicant shall obtain and comply with an NPDES permit authorizing such activities.
  - (b) That pursuant to OAC 4906-17-08 (E)(6), the Applicant shall provide a decommissioning program to OPSB Staff and the Hardin County Engineer for review and for OPSB Staff approval, at least thirty (30) days prior to the pre-construction conference. In this plan, the Applicant shall:
    - (i) Identify lands in the application that a reconnaissance inspection suggests may be *Prime Farmlands*, a soil survey shall be made or obtained according to standards established by the Secretary of the United States Department of Agriculture and/or Ohio Department of Agriculture in order to confirm the exact location of the *Prime Farmlands*, if any. The results of this study shall be submitted to OPSB Staff for review and approval. Any confirmed *Prime Farmlands* should be reclaimed to such standards after site decommissioning.
    - (ii) Indicate the future use that is proposed to be made of the land following reclamation.
    - (iii) Describe the engineering techniques proposed to be used in decommissioning and reclamation and a description of the major

equipment; a plan for the control of surface water drainage and of water accumulation; a plan, where appropriate, for backfilling, soil stabilization, compacting and grading. This plan shall be subject to review and approval by OPSB Staff.

- (iv) Describe how the Applicant will implement best management practices to control impacts to surface or ground water resources. If necessary, Applicant will obtain permits from the Ohio EPA and/or the U.S. Army Corps of Engineers
  - (v) Provide a detailed timetable for the accomplishment of each major step in the decommissioning plan; the steps to be taken to comply with applicable air and water quality laws and regulations and any applicable health and safety standards; and a description of the degree to which the decommissioning plan is consistent with the local physical, environmental, and climatological conditions. This timetable shall be subject to OPSB Staff review and approval.
- (c) At the end of the project's life, the wind turbines may either be "re-powered" with new nacelles, towers, and/or blades; or, the wind-powered electric generating Facility shall be decommissioned at the expense of the Facility owner or operator. In the event that the Facility or individual wind turbines are decommissioned, such decommissioning shall be completed within twelve (12) months after the end of the useful life of the Facility or individual wind turbines. If no electricity is generated for a continuous period of twelve (12) months, or if the OPSB Staff deems the Facility or turbine to be in a state of disrepair warranting decommissioning, the wind energy facility or individual wind turbine will be decommissioned.
- (d) That decommissioning shall include the removal of all physical material pertaining to the wind energy facility to a depth of at least thirty-six (36) inches beneath the soil surface and restoration of the disturbed area to a condition reasonably similar to the same physical condition that existed before erection of the Facility. For non-riparian areas that were forested prior to construction, restoration shall include returning such land to a condition where trees can be planted; provided, however, that in no event shall Applicant be obligated to plant trees on the property, except in riparian areas or subject to landowner agreement. The foundation for each wind turbine shall be removed to the depth of thirty-six (36) inches or to the top of the foundation spread footing, whichever depth is greater. Decommissioning shall include the restoration of roads and bridges to substantially the same physical condition that existed before decommissioning; the removal and transportation of the wind turbines off-site; and removal of buildings, cabling, electrical components, access roads, and any other associated facilities. Disturbed earth shall be re-graded, re-seeded, and restored to substantially the same physical condition that existed immediately before erection of the Facility. Damaged field tile systems shall be repaired to at least original conditions. The participating landowner may request that the Applicant not decommission access roads.

- (e) That if the owner of the proposed wind-powered electric generating facility does not complete decommissioning within the period prescribed in these conditions, the Board may require forfeiture of financial securities. The entry into a participating landowner agreement constitutes agreement and consent of the parties to the agreement, their respective heirs, successors and assigns, that the Board may take action that may be necessary to implement the decommissioning plan, including the exercise by the Board, OPSB Staff, and contractors, of the right of ingress and egress for the purpose of decommissioning the wind-powered electric generating facility.
- (f) That the escrow agent shall release the decommissioning funds when the Facility owner has demonstrated, and the Board concurs, that decommissioning has been satisfactorily completed; or upon written approval of the Board in order to implement the decommissioning plan.
- (g) That during decommissioning, all recyclable materials salvaged and non-salvaged shall be recycled to the furthest extent possible. All other non-recyclable waste materials shall be disposed of in accordance with state and federal law.
- (h) That the Applicant shall leave intact any improvements made to the electrical infrastructure, pending approval by the concerned utility.
- (i) That subject to approval by OPSB Staff, and within five years after the start date of commercial operation, an independent and registered Professional Engineer, licensed to practice engineering in the State of Ohio, shall be retained by the wind generation facility owner to estimate the total cost of decommissioning in current dollars (*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 estimate shall include: (1) an analysis of the physical activities necessary to implement the approved reclamation plan, with physical construction and demolition costs based on ODOT's *Procedure for Budget Estimating and RS Means* material and labor cost indices; (2) the number of units required to perform each of the activities; (3) an amount to cover contingency costs, not to exceed 10 percent of the above calculated reclamation cost. Said estimate should be on a per-turbine basis and shall be submitted for OPSB Staff review and approval, after five years of Facility operation, and every fifth year thereafter. The Applicant shall post and maintain decommissioning funds in an amount equal to the following schedule:
  - (i) From years one through five: five thousand dollars (\$5,000) per constructed wind turbine.
  - (ii) From year six through the end of the life of the project: the greater of (a) ten thousand dollars (\$10,000) per constructed wind turbine, (b) fifteen (15) percent of the *Decommissioning Costs*, or (c) one hundred twenty (120) percent of the *Net Decommissioning Costs*.

The form of financial assurance will be a financial instrument mutually agreed upon by OPSB Staff and the Applicant and conditioned on the faithful performance of all requirements and conditions of this application's approved decommissioning and reclamation plan. Once the financial assurance is provided, the Applicant shall maintain such funds throughout the remainder of the applicable term and shall adjust the amount of the assurance, if necessary, to offset any increase in the decommissioning costs at the end of the applicable term. The value of salvaged steel and copper, at the end of the five-year term and for any other revisions of this report thereafter, shall be calculated based on the five-year annual average for the years preceding the anniversary of such reports.

- (52) That prior to the commencement of construction, the Applicant shall obtain and comply with all applicable permits and authorizations as required by federal and state laws and regulations for any activities where such permit or authorization is required, including, if applicable, the Ohio NPDES permit(s) for construction activities and for 401 Certificates. Copies of permits and authorizations, including all supporting documentation, within seven (7) days of receipt, shall be provided to OPSB Staff by the Applicant.
- (53) That the Applicant shall not commence construction of the Facility until it has a signed Interconnection Service Agreement with PJM, which includes construction, operation, and maintenance of system upgrades necessary to reliably and safely integrate the proposed generating Facility into the regional transmission system. The Applicant shall provide a letter stating that the Agreement has been signed or a copy of the signed Interconnection Service Agreement to the OPSB Staff.
- (54) That at least seven (7) days before the pre-construction conference, the Applicant shall submit to the OPSB Staff a copy of its approved Storm Water Pollution Prevention Plan (SWPPP), approved Spill Prevention Containment and Countermeasure (SPCC) procedures, and its erosion and sediment control plan for review and approval. Any soil issues must be addressed through proper design and adherence to the Ohio Environmental Protection Agency best management practices related to erosion and sedimentation control.
- (55) That at least thirty (30) days before the pre-construction conference, the Applicant shall submit to the OPSB Staff, for review, a fire protection and medical emergency plan, to be developed in consultation with the fire department having jurisdiction over the area.
- (56) That if any changes are made to the project layout after the submission of final engineering drawings, all changes shall be provided to OPSB Staff in hard copy and as geographically-referenced electronic data. All changes will be subject to OPSB Staff review and approval prior to construction.
- (57) That at least thirty (30) days before construction, the Applicant shall submit to the OPSB Staff, for review and approval, the following documents:
  - (a) One set of engineering drawings of the turbine final project design, including all locations, collection lines, access roads, permanent meteorological towers, substations, construction staging areas, and any other associated facilities and

access points, so that the OPSB Staff can determine that the final project design is in compliance with the terms of the certificate. The final project layout shall be provided in hard copy and as geographically-referenced electronic data. The plan shall include both temporary and permanent access routes, as well as the measures to be used for restoring the area around all temporary sections, and a description of any long-term stabilization required along permanent access routes. The plan shall consider the location of streams, wetlands, wooded areas, and sensitive plant species as identified by the Ohio EPA and/or ODNR-DNAP, and explain how impacts to all sensitive resources will be avoided or minimized during construction, operation, and maintenance.

- (b) A stream crossing plan including details on specific streams to be crossed, either by construction vehicles and/or Facility components (i.e., access roads, electric collection lines), as well as specific discussion of proposed crossing methodology for each stream crossing and post-construction site restoration. The stream crossing plan shall be based on final plans for the access roads and electric collection system.
  - (c) A detailed frac-out contingency plan for stream and wetland crossings that are expected to be completed via HDD. Such contingency plan can be incorporated within the required stream crossing plan.
  - (d) A tree clearing plan describing how trees and shrubs around turbines, along access routes, in electric collection line corridors, at construction staging areas, and in proximity to any other project facilities will be protected from damage during construction, and, where clearing cannot be avoided, how such clearing work will be done so as to minimize removal of woody vegetation. Priority should be given to protecting mature trees throughout the project area, and all woody vegetation in wetlands and riparian areas, both during construction and during subsequent operation and maintenance of all facilities.
- (58) That within six (6) months after completion of construction, the Applicant shall submit to the OPSB Staff a copy of the as-built specifications for the entire Facility to the extent they have been completed. The Applicant may request of the OPSB Staff additional time to complete the as-built drawings if they have not been completed within the six (6) month period.
- (59) That the certificate shall become invalid if the Applicant has not commenced a continuous course of construction of the proposed Facility within five (5) years of the date of journalization of the certificate.
- (60) That the Applicant shall provide to the OPSB Staff the following information as it becomes known:
- (a) The date on which construction will begin;
  - (b) The date on which construction was completed;
  - (c) The date on which the Facility began commercial operation.

**B. Exhibits**

Subject to the terms and conditions of this Stipulation, the Applicant and OPSB Staff agree, stipulate and recommend that the following exhibits submitted in this docket be marked and admitted into the record in this proceeding, and that cross-examination is waived thereon:

1. Company Exhibit 1, the Amended Application as filed on September 18, 2009, and certified as complete as of October 9, 2009;
2. Company Exhibit 2, a copy of the Proof of Service of the amended application on local public officials and libraries along with the list of property owners and adjacent property owners filed on October 9, 2009;
3. Company Exhibit 3, Proofs of Publication dated June 23, 2009 for the proof of publication made on June 11, 2009 in *The Kenton Times* and *The Ada Herald*, as well as proof of publication of a revised notice published on June 17, 2009 in *The Kenton Times* and on June 18, 2009 in *The Ada Herald*, of the informal public meeting held in accordance with Ohio Administrative Code ("OAC") Rule 4906-05-08.
4. Company Exhibit 4 Proofs of Publication filed on October 26, 2009 for the first publication of the description of the application and hearing dates published in October 17, 2009 publication in *The Kenton Times* on October 17, 2009 and in the *Ada Herald* published on October 22, 2009.
5. Company Exhibit 5, Proofs of Publication filed on January 4, 2010 for the second publication of the description of the application and hearing dates published in *The Kenton Times* on December 21, 2009 and in *The Ada Herald* on December 34, 2009.
6. Staff Exhibit 1, "Staff Report of Investigation," issued December 21, 2009; and
7. Joint Exhibit 1, this "Joint Stipulation and Recommendation" signed on behalf of the Staff and Hardin Wind.

**C. Other Terms and Conditions**

- (1) This Stipulation is expressly conditioned upon its acceptance by the Board without material modification. In the event the Board rejects or materially modifies all or part of this Stipulation or imposes additional conditions or requirements upon the parties, each party shall have the right, within thirty (30) days of the Board's order, to file an application for rehearing with the Board. Upon rehearing by the Board, each party shall have the right, within ten (10) days of the Board's order on rehearing, to file a notice of termination of, and

withdrawal from, the Stipulation. Upon notice of termination and withdrawal of the Stipulation by any party, pursuant to the above provisions, the Stipulation shall immediately become null and void. In such an event, a hearing shall go forward, and the parties shall be afforded the opportunity to present evidence through witnesses, to cross-examine all witnesses, to present rebuttal testimony, and to file briefs on all issues.

- (2) The parties agree and recognize that this Stipulation has been entered into only for the purpose of this proceeding. Each party agrees not to assert against another party in any proceeding before the Board or any court, other than in a proceeding to enforce the terms of this Stipulation, that party's participation in this Stipulation as support for any particular position on any issue. Each party further agrees that it will not use this Stipulation as factual or legal precedent on any issue. The parties request that the Board recognize that its use of this Stipulation in any proceeding other than this proceeding is contrary to the intentions of the parties in entering into this Stipulation.

### **III. FINDINGS**

The parties agree that the record in this case, provided the Board approves the conditions in this Stipulation, contains sufficient probative evidence for the Board to find and determine, as findings of fact and conclusions of law, that:

#### **A. Findings of Fact**

- (1) Hardin Wind Energy, LLC is a wholly-owned subsidiary of Invenergy, LLC, and a foreign limited liability company organized under the laws of the State of Delaware, and licensed to do business in the State of Ohio.
- (2) The Facility qualifies as a major utility facility defined in Section 4906.01(B)(1) of the Ohio Revised Code and as a wind powered generation facility defined in under OAC Rule 4906-17-01.
- (3) On June 5, 2009, the Applicant filed a motion for waivers of certain filing requirements in OAC Chapter 4906-17, as well as for a waiver of the requirement to file an application two years prior to commencement of construction under Section 4906.06(A)(6) of Ohio Revised Code.
- (4) Also on June 5, 2009, the Applicant filed a pre-application notice of a public informational meeting.
- (5) The Applicant held the public informational meeting in Hardin County on June 23, 2009.
- (6) On June 23, 2009, the Applicant filed Proofs of Publication made on June 11, 2009 in *The Kenton Times* and *The Ada Herald*, as well as proof of



publication of a revised notice published on June 17, 2009 in *The Kenton Times* and on June 18, 2009 in *The Ada Herald*, of the informal public informational meeting held on June 23, 2008 in accordance with OAC Rule 4906-05-08.

- (7) The Applicant formally submitted its application for a certificate to construct the proposed wind-powered electric generating facility in Hardin County, Ohio on July 10, 2009.
- (8) The Administrative Law Judge, by Entry dated July 17, 2009, granted the Applicant's waiver requests subject to some clarifications.
- (9) On August 27, 2009, the Applicant filed a motion for waiver of the 60-day completeness review period so that additional information could be filed and reviewed by Staff; and the Ohio Farm Bureau subsequently filed a letter indicating it had no objection to the Applicant's motion for waiver of the 60-day completeness review period.
- (10) On September 18, 2009, the Applicant filed an amended application.
- (11) On October 9, 2009, the Chairman of the Board issued a letter to the Applicant stating that the application, as filed on July 10, 2009 and subsequently amended on September 18, 2009, was found to comply with OAC Chapter 4906.
- (12) On October 9, 2009, the Applicant filed a Proof of Service of the amended application on local public officials and libraries.
- (13) On October 13, 2009, the Administrative Law Judge issued an Entry scheduling a local public hearing for this case on January 5, 2010 at the Hardin County Courthouse in Kenton, Ohio, 43226, and an adjudicatory hearing for January 12, 2010 at the offices of the PUCO; and accepting the Application for filing for purposes of publication.
- (14) On October 26, 2009, the Applicant filed the first Proofs of Publication for made in *The Kenton Times* on October 17, 2009 and in the *Ada Herald* on October 22, 2009 describing the amended application and listing the hearing dates in accordance with OAC Rule 4906-5-08(B)(1).
- (15) On November 12, 2009, the Applicant filed information on ten additional turbine locations.
- (16) On November 19, 2009, the Applicant filed information regarding a plan to construct the Facility in two phases. A map of the two phases was filed on December 4, 2009
- (17) The Staff Report was filed on December 21, 2009.

- (18) On January 4, 2010, the Applicant filed the Applicant filed the second Proofs of Publication for made in *The Kenton Times* on December 21, 2009 and on December 24, 2009 in the *Ada Herald* describing the amended application and listing the hearing dates in accordance with OAC Rule 4906-5-08(B)(2).
- (19) On January 4, 2010, the Applicant filed a copy of the letter sent to property owners and adjacent property owners mailed October 19, 2009. The complete list of property owners was included as Attachment 1 of Exhibit 1 to the Proof of Service filed on October 9, 2009 in accordance with OAC Rule 4906-5-08(C)(3).
- (20) A local public hearing was held on January 5, 2010 in Kenton, Hardin County, Ohio.
- (21) An adjudicatory hearing was held on January 12, 2009, in Columbus, Ohio.
- (22) The basis of need requirement in Section 4906.10(A)(1) of the Ohio Revised Code is inapplicable to this project.
- (23) Adequate data on the project has been provided to determine the nature of the probable environmental impact as required by Section 4906.10(A)(2) of the Ohio Revised Code.
- (24) Adequate data on the project has been provided to determine that the Facility described in the Amended Application represents the minimum adverse environmental impact, considering the available technology and nature and economics of the various alternatives, and other pertinent considerations as required by Section 4906.10 (A)(3) of the Ohio Revised Code.
- (25) Adequate data on the project has been provided to determine that, because the project is an electric generation facility, the proposed electric generating facility is consistent with regional plans for expansion of the electric power grid of the electric systems serving the State of Ohio and interconnected utility systems, that the Facility will serve the interests of electric system economy and reliability, and the requirements of Section 4906.10(A)(4) of the Ohio Revised Code are met.
- (26) Adequate data on the project has been provided to determine that the wind farm project will either comply with, or is not subject to, the requirements in the Ohio Revised Code regarding air and water pollution control, withdrawal of waters of the state, solid and hazardous wasters, and air navigation, and all regulations thereunder, as required by Section 4906.10(A)(5) of the Ohio Revised Code.

- (27) Adequate data on the project has been provided to determine that the Facility will serve the public interest, convenience, and necessity, as required by Section 4906.10(A)(6) of the Ohio Revised Code.
- (28) Adequate data on the project has been provided to determine what the Facility's impact will be on the viability as agricultural land of any land in an existing agricultural district established under Chapter 929 of the Ohio Revised Code that is located within the site of the proposed Facility, as required by Section 4906.10(A)(7) of the Ohio Revised Code.
- (29) Adequate data on the project has been provided to determine that the Facility as proposed incorporates maximum feasible water conservation practices considering available technology and the nature and economics of the various alternatives as required by Section 4906.10(A)(8) of the Ohio Revised Code.
- (30) The record evidence in this matter provides sufficient factual data to enable the Board to make an informed decision.

**B. Conclusions of Law**

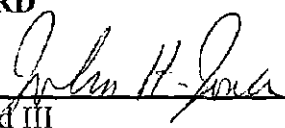
- (1) Hardin Wind Energy, LLC is a "person" under Section 4906.01(A) of the Ohio Revised Code.
- (2) The proposed Facility is a major utility facility as defined in Section 4906.01(B)(1) of the Ohio Revised Code.
- (3) Hardin Wind's Amended Application complies with the requirements of OAC Chapter 4906-17.
- (4) The requirement for the need for the Facility under Section 4906.10(A)(1) of the Ohio Revised Code is inapplicable.
- (5) The record establishes the nature of the probable environmental impact from construction, operation and maintenance of the Facility under Section 4906.10(A)(2) of the Ohio Revised Code.
- (6) The record establishes that the Facility represents the minimum adverse environmental impact, considering the state of available technology and the nature and economics of the various alternatives, and other pertinent considerations under Section 4906.10(A)(3) of the Ohio Revised Code.
- (7) The record establishes that the Facility is consistent with regional plans for expansion of the electric power grid of the electric systems serving the State of Ohio and interconnected utility systems, and will serve the interests of electric system economy and reliability as required by Section 4906.10(A)(4) of the Ohio Revised Code.

- (8) The record establishes, as required by Section 4906.10(A)(5) of the Ohio Revised Code, that to the extent that any of them are applicable, construction of the proposed Facility will comply with the requirements in the Ohio Revised Code regarding air and water pollution control, withdrawal of waters of the state, solid and hazardous wasters, and air navigation, and all rules and standards adopted under the relevant Chapters of the Ohio Revised Code.
- (9) The record establishes that the Facility will serve the public interest, convenience and necessity under Section 4906.10(A)(6) of the Ohio Revised Code.
- (10) The Facility's impact on the viability as agricultural land of any land in an existing agricultural district has been determined under Section 4906.10(A)(7) of the Ohio Revised Code.
- (11) The record establishes that the Facility would incorporate maximum feasible water conservation practices under Section 4906.10(A)(8) of the Ohio Revised Code.
- (12) Based on the record, the parties recommend that the Board issue a Certificate of Environmental Compatibility and Public Need for construction, operation and maintenance of the Facility.

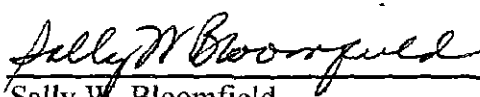
The undersigned hereby stipulate and agree and they represent that they are authorized to enter into this Joint Stipulation and Recommendation on this \_\_ day of January, 2010.

Respectfully submitted on behalf of,

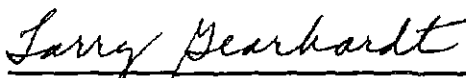
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