UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
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MAR 02 2010

Ref: 8EPR-N

Western Area Power Administration
Attention: Liana Reilly
P.O. Box 281213
Lakewood, CO 80228-8213

Re: Comments on the South Dakota PrairieWinds Project Draft Environmental Impact Statement
CEQ # 20100000

Dear Ms. Reilly:

The U.S. Environmental Protection Agency (EPA) Region 8 has reviewed the Draft Environmental Impact Statement (EIS) for the South Dakota PrairieWinds Project (Project) prepared by the Western Area Power Administration (Western) and Rural Utilities Service (RUS). Our comments are provided for your consideration pursuant to our responsibilities and authority under Section 102(2)(C) of the National Environmental Policy Act (NEPA), 42 U.S.C. Section 4332(2)(C), and Section 309 of the Clean Air Act, 42 U.S.C. Section 7609. It is EPA's responsibility to provide an independent review and evaluation of the potential environmental impacts of this project, which includes a rating of the environmental impact of the proposed action and the adequacy of the NEPA document.

In accordance with our policies and procedures for reviews under NEPA and Section 309 of the Clean Air Act, EPA has rated this Draft EIS as "Environmental Concerns - Insufficient Information" (EC-2). Our environmental concerns are due to potential for wetland impacts, surface disturbance, sediment runoff, and cumulative impacts to water resources and wildlife habitat. Additional information regarding air quality impacts, water resources, and wetlands in the project area is needed to ensure that environmental effects are properly evaluated in accordance with NEPA. A copy of EPA's rating criteria is attached.

PROJECT BACKGROUND

PrairieWinds SD1, Incorporated, a wholly owned subsidiary of Basin Electric Power Cooperative (Basin Electric), proposes to construct a new 151.1-megawatt nameplate capacity wind energy facility in south-central South Dakota. Two alternative locations are proposed: the Crow Lake Alternative project area covers 37,000 acres located 15 miles north of White Lake, SD, and the Winner Alternative project area covers 83,000 acres located 8 miles south of Winner, SD. Each alternative includes 101 turbines, 30-40 miles of new access road, 30-40

miles of upgraded existing road, crane walks, 60 miles of underground collector system, and 10-11 miles of new transmission line.

EPA CONCERNS

EPA commends Basin Electric for making wind-powered electricity a part of their energy portfolio. We also thank Western and RUS for recognizing that, while the use of renewable rather than conventional energy technologies can be a great benefit on the global or regional scale, effects to the local environment must still be carefully considered. An explanation of our primary concerns with the project is contained in the following paragraphs. Our primary concerns include surface disturbance, impacts to wetlands and other water resources, and cumulative impacts. Additional information pertaining to the project is found in the enclosed Detailed Comments.

Surface Disturbance

EPA is concerned with the amount of surface disturbance estimated for the proposed project. Although the majority of the surface disturbance associated with the proposed project, and wind projects in general, is temporary, this disturbance should be minimized to the maximum extent practicable. Temporary surface disturbances create potential for long-term environmental impacts including erosion, invasive plant species growth, and loss of habitat. We recommend Western and RUS consider ways to reduce temporary surface disturbance from the proposed project, and require of all contractors that surface disturbance be reduced to the maximum extent practicable. We particularly note that crane walks present an opportunity for significant disturbance, creating 40-foot wide pathways. For the Crow Lake alternative, temporary disturbance due to crane walks is greater than that of access roads. EPA recommends Western and RUS look for ways to maximize use of access roads for crane movement, and minimize cross-country crane walks, after final turbine layout is determined. Minimization of disturbance due to crane walks should be specifically required of contractors.

Water Quality

The Draft EIS identifies organic loading as a concern for both proposed project alternatives, signified by the listed impairments for total suspended solids (TSS) of streams and water bodies in the project area. EPA is concerned that surface disturbances associated with project construction have the potential to result in increased sediment loading. We recommend that the Stormwater Pollution Prevention Plan (SWPPP) be included as an appendix to the Final EIS. Additionally, the Final EIS should disclose who will be responsible for implementing the SWPPP. Runoff of sediments is a potential concern beyond the construction phase. Western and RUS should develop an operational plan for finding and solving runoff problems, such as from erosion of an access road or turbine pad.

Wetland Impacts

Additional information regarding wetland locations and avoidance measures needs to be included in the EIS to support the conclusion in the Draft that "impacts would be less than significant." A wetland delineation for the proposed project has not yet been completed, nor has a permit been sought under Section 404 of the Clean Water Act. We recommend that a jurisdictional determination be obtained from the U.S. Army Corps of Engineers (USACE) prior

to completion of the Final EIS. We note that USACE can only permit the least environmentally damaging practicable alternative (LEDPA) in accordance with 40 CFR Part 230, the Section 404(b)(1) Guidelines. Further, we note that Executive Order 11990 directs Federal Agencies to "take action to minimize the destruction, loss or degradation of wetlands, and to preserve and enhance the natural and beneficial values of wetlands in carrying out the agency's responsibilities" and agencies are further directed, to the extent permitted by law, to "avoid undertaking or providing assistance for new construction located in wetlands unless the head of the agency finds (1) that there is no practicable alternative to such construction, and (2) that the proposed action includes all practicable measures to minimize harm to wetlands which may result from such use…." In addition, national wetlands policy has established an interim goal of "No Overall Net Loss of the Nation's Remaining Wetlands" and a long-term goal of increasing quantity/quality of the Nation's wetlands resource base ("Presidential Wetland Policy of 1993"). In accordance with the intent of the order and national policy, EPA suggests a mitigation commitment that indirect draining of, or direct disturbance of, all wetland areas will be avoided if at all possible.

The Draft EIS provides estimated permanent and temporary wetland impacts for each Alternative, but does not indicate how these estimated acreages were calculated. Please include further detail on how permanent and temporary impacts are defined and quantified for the project in the Final EIS. These impacts should take into account specific proposed locations for turbine pads, access roads, and communication lines as much as possible, rather than be generalized estimates.

Cumulative Impacts

In accordance with CEQ regulations defining cumulative effects, we recommend that the discussion of past, present, and reasonably foreseeable future actions in the Draft EIS be expanded to include a wider range of actions that have occurred or are likely to occur in the project area. This includes analysis and disclosure of the impacts of activities on private adjacent land irrespective of what agency/entity has decision-making authority or analysis responsibility. For example, cumulative impacts to resources of concern for the proposed project may be contributed to by agriculture or construction, maintenance, and use of roads. In addition, cumulative effects should be addressed for all resource categories for which the project has potential to directly or indirectly impact. EPA believes the project has potential to impact water resources, including water quality and wetlands, and that these resources should be added to the cumulative impacts section of the Final EIS.

Additional Project Area

At the February 11, 2010, interagency meeting on the Draft EIS, we were informed that, since completion of the document, South Dakota Wind Partners, LLC, a locally owned cooperative, had approached Western with a request to add seven turbines inside the Crow Lake Alternative area. The proposed location for these additional turbines is in the northwest corner of the proposed Crow Lake Alternative project area. A 5-6 mile underground collector line would connect the South Dakota Wind Partners' turbines to the proposed collector substation. Operations and maintenance would be provided by Basin Electric. This additional proposed action will be included in the Final EIS for PrairieWinds.

Although ten additional turbine locations were analyzed in the Draft EIS, in case of future project expansion or need for an alternate turbine site, EPA does not feel that this analysis adequately covers the addition of the South Dakota Wind Partners' proposed action. There was no analysis for turbines, access roads, collector lines, etc. in the portion of the project area proposed for this addition. The Final EIS should include a location-specific analysis of impacts to all resources of concern resulting from the proposed addition. This analysis may be added as a separate subsection of the document or included in the Crow Lake Alternative analysis.

Thank you for the opportunity to comment on this Draft EIS. We hope that our comments regarding potential for wetland impacts, surface disturbance, sediment runoff, and cumulative impacts will be of value to Western and RUS in preparing the Final EIS. We also look forward to additional information regarding air quality, water quality, and wetlands in the project area. If you have any questions on the comments provided in this letter, please contact me at 303-312-6004, or you may contact Molly Brodin of my staff at 303-312-6577.

Sincerely,

Larry Svoboda
Director, NEPA Compliance and Review Program
Office of Ecosystems Protection and Remediation

Enclosures: Detailed Comments
EPA's Rating System Criteria

cc: Dennis Rankin, Rural Utilities Service

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EPA'S DETAILED COMMENTS FOR THE SOUTH DAKOTA PRAIRIEWINDS PROJECT DRAFT EIS

Wetland Impacts

Under section 4.2.2 – Significance Criteria, the final bullet point should be expanded to include both jurisdictional and non-jurisdictional wetlands. We also recommend that the wetlands mitigation efforts be more fully defined in the Final EIS. For example, the document could identify potential locations for mitigating non-jurisdictional wetland impacts or clarify whether the mitigation will occur in one location or throughout the project area. There may be opportunities in this area for Basin Electric to mitigate wetland losses in the same area by returning nearby historic wetlands that have been farmed to functioning wetlands. Wetland mitigation efforts should include the upland area associated with wetland hydrology and habitat values. EPA notes that, in accordance with the CWA Section 404(b)(1) Guidelines, wetland impacts should be avoided and minimized, to the maximum extent practicable, and then unavoidable wetland impacts should be compensated for through wetland restoration, creation, or enhancement.

Additional information regarding the location of wetlands in the project area should be included in the Final EIS. If project timing does not permit a field delineation to be completed prior to release of the Final EIS (such as if the project area is still snow covered) the document should include National Wetlands Inventory (NWI) maps. Contractors should be required to avoid all wetlands included in the NWI maps and any field delineated wetlands. We recommend that Basin Electric coordinate in the field during project construction with USACE, in the case of jurisdictional wetlands, or U.S. Fish and Wildlife Service (FWS), in the case of non-jurisdictional wetlands, to ensure that wetland impacts are avoided to the maximum extent practicable.

Water Resources

EPA appreciates figures 3.2-1 and 3.2-2, depicting the major water bodies and subbasins in the project area for the Crow Lake and Winner Alternatives, respectively. However, due to the scale of the maps, it is difficult to anticipate the likelihood of direct impacts due to runoff from roads, turbine pads, etc. We recommend the Final EIS include a map at project-area scale for each of the proposed alternatives, including all anticipated areas of proposed surface disturbance as well as all known water bodies. Addition of these figures will inform a better understanding of potential for runoff impacts to surface water resources.

Air Quality

As was noted in EPA's scoping comments for the Project (sent on May 14, 2009), dust particulates from construction and ongoing operations on roadways are important concerns. Airborne dust may not only be a visual nuisance, but can be potentially dangerous to asthma sufferers. Additionally, sedimentation run-off can severely impact the aquatic environment, and blowing dust may impact the flora and fauna of the area. It is unclear from the Draft EIS how Western and RUS determined that near-field particulate matter emissions from the Project would be within National Ambient Air Quality Standards (NAAQS). The Final EIS should include a quantification of emissions and determination of potential air quality impacts of the project. A

specific list of Best Management Practices (BMPs) that will be employed to minimize fugitive dust emissions should be provided in the Final EIS; this list should provide greater detail than what is currently presented in Table 2.2 and Table 2.3.

EPA recommends that dust control measures be required of contractors for the Project. Effective dust control may include additional road treatment, such as dust suppression agents. Reduced vehicle speeds in the project area may also be effective in mitigating particulate matter emissions. EPA does not agree with the conclusion in the Draft EIS that dust impacts would be restricted to short periods during construction or decommissioning. Access roads will remain open and carry operations and maintenance traffic throughout the life of the project, and specific dust control mitigation strategies should be part of the operating requirements to minimize air quality impacts.

Climate Change

We thank Western and RUS for quantifying the estimated greenhouse gas emission reduction associated with the proposed project relative to South Dakota's average emissions from fossil fueled generating stations. Further, EPA is pleased to see Western's plans to minimize leaks of sulfur hexafluoride (SF_6) at Substations used for interconnection of the proposed Project. We recommend providing additional detail on specific mitigation and monitoring measures to be employed to ensure complete documentation of SF_6 emission reduction efforts. This detail could be provided in a SF_6 Handling and Use Policy as an appendix to the Final EIS. If any SF_6 will be used in facilities operated and maintained by the project proponent (i.e., collector substation or transmission line), discussion of Basin Electric's plans to minimize leaks of SF_6 should be included in the Final EIS. Additionally, we recommend Basin Electric join EPA's SF_6 Emission Reduction Partnership for Electric Power Systems. This partnership is a collaborative effort between EPA and the electric power industry to identify and implement cost-effective solutions to reduce emissions.

Surface Disturbance

EPA is concerned with the amount of temporary surface disturbance estimated for the proposed project, which creates potential for long-term environmental impacts including erosion, invasive plant species growth, and loss of habitat. Permanent surface disturbance also presents a potential environmental impact to the project area. In addition to the best management practices identified in Table 2.2, we recommend that permanent surface disturbance associated with access roads be reduced to the maximum extent practicable, by utilizing transportation planning to establish proper road location and design, and using primitive two-track roads where possible.

We are particularly alarmed by the number of temporary acres of disturbance associated with access roads for the Winner alternative. The temporary disturbance of 1,710 acres for access roads in this alternative is almost 7 times the permanent disturbance. By contrast, the temporary disturbance for access roads in the Crow Lake alternative is only 2 times the permanent impacts. If the figure of 1,710 acres is correct, please explain in the Final EIS what factors are resulting in the need for such significant temporary disturbance, and consider ways to minimize this disturbance.

EPA is pleased to see inclusion of provisions to reduce introduction of noxious weed seed during Project construction in the Draft EIS. We recommend the Final EIS include further detail regarding follow-up monitoring and control strategies. Specifically, please define who will implement post-construction noxious weed control and how it will be financed. Western and RUS may want to consider including a Weed Management Plan as an appendix to the Final EIS. This plan should identify the noxious weeds and exotic plants likely to occur in the project area and detail a strategy for prevention, early detection of invasion, and control procedures for each species.

Cumulative Impacts

As identified in the Draft EIS, the proposed Project "would likely result in avian and bat mortalities, mainly as a result of habitat fragmentation, and potential collisions with new overhead transmission lines and wind turbines." Further, the document notes that the presence of turbines along with operation and maintenance activities could result in avoidance and abandonment of habitats in the project area. These potential project impacts, when added to all other past, present, and reasonably foreseeable activities in the project area, are of particular concern for Special Status species including Whooping Crane, Greater Prairie Chicken, and Sharp-tailed Grouse. We recommend that the cumulative impacts analysis for these species be expanded to discuss in greater detail how past activities have affected species habitat, and how the proposed project is likely to contribute to this impact. This discussion should include the relevant Region of Influence (ROI) for each species and should attempt to quantify the extent to which suitable habitat has already been affected as well as the incremental additional impact predicted to result from the proposed Project.

National Historic Preservation Act

EPA commends Western's commitment to identifying and avoiding adverse impacts on historic properties. We have the following concerns and recommendations:

1. We could find no rationale for the selection of federally recognized tribes to receive the consultation letter at Appendix F. We recommend that the Oglala Sioux tribe be included in the process, and that the Final EIS include an explanation of how Western chose which tribes would be consulted.

2. We recommend that the Final EIS include a separate summary of the National Historic Preservation Act (NHPA) Section 106 consultation process, including the steps completed to date and those remaining to be accomplished.

3. Section 5.4.3 – Cultural Resources states that a memorandum of agreement (MOA) is being developed to ensure compliance with Section 106 requirements. Because the MOA has not yet been developed, it should be made publicly available as soon as it is signed, and should be included in the Final EIS.

4. The sixth row in Table 1.1, regarding NHPA Section 106, should list Tribes in addition to Western, RUS, and the State Historic Preservation Office.

Endangered Species Act

The biological assessment (BA) addressing potential impacts to Federally-listed species was not completed prior to release of the Draft EIS. The Draft EIS (p. 88) states, "More detailed information (i.e. legal status, species ecology, local distribution) from the BA will be presented in the FEIS". EPA recommends that further information from the BA be included in the Final EIS. Beyond additional information on the species, we recommend Western include specific information on potential impacts to listed species and critical habitat, any mitigation measures, and other relevant information based on further assessment and communications with FWS. We request that the BA and FWS response be included in the Final EIS.

Western System Modifications

The Draft EIS discusses potential need for modification to Western's transmission system to accommodate the proposed project. However, details of these modifications, including environmental impacts, are not provided because all transmission system studies have not been completed. EPA recognizes the difficulty of quantifying these impacts at the Draft EIS stage for the Project, however, we believe that these modifications should be considered connected actions to the proposed project. Any additional details for the connected system modifications available should be provided in the Final EIS. If there is not enough information yet known to quantify environmental impacts, a qualitative approximation should be provided.

U.S. Environmental Protection Agency Rating System for Draft Environmental Impact Statements

Definitions and Follow-Up Action*

Environmental Impact of the Action

LO - - Lack of Objections: The Environmental Protection Agency (EPA) review has not identified any potential environmental impacts requiring substantive changes to the proposal. The review may have disclosed opportunities for application of mitigation measures that could be accomplished with no more than minor changes to the proposal.

EC - - Environmental Concerns: The EPA review has identified environmental impacts that should be avoided in order to fully protect the environment. Corrective measures may require changes to the preferred alternative or application of mitigation measures that can reduce these impacts.

EO - - Environmental Objections: The EPA review has identified significant environmental impacts that should be avoided in order to provide adequate protection for the environment. Corrective measures may require substantial changes to the preferred alternative or consideration of some other project alternative (including the no-action alternative or a new alternative). EPA intends to work with the lead agency to reduce these impacts.

EU - - Environmentally Unsatisfactory: The EPA review has identified adverse environmental impacts that are of sufficient magnitude that they are unsatisfactory from the standpoint of public health or welfare or environmental quality. EPA intends to work with the lead agency to reduce these impacts. If the potential unsatisfactory impacts are not corrected at the final EIS stage, this proposal will be recommended for referral to the Council on Environmental Quality (CEQ).

Adequacy of the Impact Statement

Category 1 - - Adequate: EPA believes the draft EIS adequately sets forth the environmental impact(s) of the preferred alternative and those of the alternatives reasonably available to the project or action. No further analysis of data collection is necessary, but the reviewer may suggest the addition of clarifying language or information.

Category 2 - - Insufficient Information: The draft EIS does not contain sufficient information for EPA to fully assess environmental impacts that should be avoided in order to fully protect the environment, or the EPA reviewer has identified new, reasonably available alternatives that are within the spectrum of alternatives analyzed in the draft EIS, which could reduce the environmental impacts of the action. The identified additional information, data, analyses or discussion should be included in the final EIS.

Category 3 - - Inadequate: EPA does not believe that the draft EIS adequately assesses potentially significant environmental impacts of the action, or the EPA reviewer has identified new, reasonably available alternatives that are outside of the spectrum of alternatives analyzed in the draft EIS, which should be analyzed in order to reduce the potentially significant environmental impacts. EPA believes that the identified additional information, data, analyses, or discussions are of such a magnitude that they should have full public review at a draft stage. EPA does not believe that the draft EIS is adequate for the purposes of the National Environmental Policy Act and/or Section 309 review, and thus should be formally revised and made available for public comment in a supplemental or revised draft EIS. On the basis of the potential significant impacts involved, this proposal could be a candidate for referral to the CEQ.

* From EPA Manual 1640 Policy and Procedures for the Review of Federal Actions Impacting the Environment. February, 1987.