Introduction

1.1 Project Overview

Hatchet Ridge Wind LLC (HRW), an affiliate of RES Americas Inc. (RES) and Renewable Energy Systems LTD, filed a Conditional Use Permit application with the Shasta County Department of Resource Management on June 6, 2006. RES proposes to construct and operate a wind energy project in eastern Shasta County. The proposed project site is located approximately 7 miles west of the town of Burney and 34 miles northeast of Redding (Figure 1-1) on private land owned by Sierra Pacific Industries and the Fruit Growers Supply Company. HRW has a long-term lease agreement with Sierra Pacific Industries and is negotiating a long-term lease with Fruit Growers Supply Company for the parcels where the wind energy project would be developed.

HRW proposes to construct between 42 and 68 three-bladed wind turbines along a 6.5-mile turbine string corridor on Hatchet Ridge. Each wind turbine would be installed on a tubular steel tower up to 262 feet (80 meters) tall. Each turbine/tower combination would have a maximum height of approximately 420 feet (128 meters), measured from the ground to the turbine blade tip at its highest point. The exact height and placement of the turbines and associated facilities within the development corridor would be determined by such factors as equipment manufacturer and environmental constraints. The final permanent combined project footprint of the Hatchet Ridge Wind Energy project would encompass approximately 75 acres.

The proposed project would be constructed in one or more phases and would include construction of an interconnection with an existing Pacific Gas and Electric Company (PG&E) transmission line that crosses the leased property; the interconnection switching station would be owned by PG&E. This line is part of the PG&E system grid and is controlled by the California Independent System Operator Corporation, a not-for-profit public benefit corporation that operates the state's wholesale power grid. Electricity would be delivered to the energy market in California through utilities, municipalities, and cooperatives.

1.2 Purpose and Background

HRW undertook a comprehensive analysis to select an appropriate site for the proposed project. This analysis considered several key factors: suitable conditions to generate quantities of wind energy to support the project's needs; proximity to existing transmission with capacity available to convey renewable power to purchasing utilities; consistency with existing land uses; and lack of major environmental constraints. In the development of this analysis, HRW conducted a year-long monitoring program to confirm velocity of wind speed and frequency and direction of prevailing winds, as well as a year-long monitoring program to establish a baseline for analyzing

potential impacts on avian and bat species. Following selection of the desired site, HRW initiated the permitting process for the proposed project.

The overarching objective of the proposed project is to harness wind power in order to generate and deliver electricity derived from renewable energy to one or more electric utilities. Chapter 2 of this document provides more detailed information on the project objectives and the proposed project components.

The conditional use permit authorizing the project would cover the installation, operation, and eventual decommissioning of the proposed project, which is anticipated to have a lifetime of more than 20 years and to employ approximately 6–10 full-time people.

1.3 California Environmental Quality Act Process

This environmental document has been prepared in compliance with the California Environmental Quality Act (CEQA) of 1970, as amended, and the State CEQA Guidelines. These regulations require that all state and local government agencies consider the environmental consequences of projects over which they have discretionary authority prior to taking action on those projects.

The Shasta County Department of Resource Management, as lead agency, has determined that an environmental impact report (EIR) is the appropriate level of documentation for compliance with CEQA for the proposed project in accordance with the provisions of the *Guidelines for Implementation of the California Environmental Quality Act* (State CEQA Guidelines) of 1970, as amended.

This EIR has been prepared pursuant to CEQA (Public Resources Code [PRC] 21000 et seq.) and the State CEQA Guidelines (14 California Code of Regulations [CCR] Chapter 3, Section 15000 et seq.) The overall purposes of the CEQA process are listed below.

- Ensure that the environment and public health and safety are protected in the face of discretionary projects initiated by public agencies or private concerns.
- Provide for full disclosure of the project's environmental effects on the public, the agency decision makers who will approve or deny the project, and responsible and trustee agencies charged with managing resources (e.g., aesthetics, biological resources) that may be affected by the project.
- Provide a forum for public participation in the decision-making process with respect to environmental effects.

As defined by Section 15378 of the State CEQA Guidelines, a *project* is any action that "has a potential for resulting in either a direct physical change in the environment, or a reasonably foreseeable indirect physical change in the environment." Section 15093 of the State CEQA Guidelines requires the decision makers to balance the benefits of a proposed project against any unavoidable environmental effects it may have. If the benefits of the project outweigh the unavoidable adverse environmental impacts, the decision makers may adopt a statement of

overriding considerations, finding that the environmental effects are acceptable in light of the project's benefits to the public.

The environmental review process as set forth under CEQA is outlined below.

1.3.1 Scoping Process

The process of determining the scope, focus, and content of an EIR is known as *scoping*. The purpose of scoping is to solicit input from experts and the public, including agencies, organizations, and individuals, to identify the range of actions, alternatives, environmental effects, methods of assessment, and mitigation measures to be analyzed in depth in the EIR. The scoping process for this EIR comprised three major components: preparing an Initial Study, issuing a Notice of Preparation (NOP), and holding a public scoping meeting near the project site.

Pursuant to Section 15082 of the State CEQA Guidelines, as amended, Shasta County Department of Resource Management circulated an NOP for preparation of an EIR to public agencies, special districts, and members of the public for an NOP comment period beginning April 11, 2007, and ending May 14, 2007. The purpose of the NOP was to convey formally to all responsible and interested agencies and parties that Shasta County Department of Resource Management, as lead agency, was soliciting input regarding the scope and content of the environmental information to be included in the EIR. A preliminary project description and a copy of the Initial Study documentation were attached to the NOP. The public scoping meeting was held on April 25, 2007, at the Burney Veteran's Hall in Burney, California, 7 miles east of the project site. Approximately 80 members of the public attended. During the meeting, attendees were given the opportunity to listen to a presentation about the proposed project's components and the environmental review process, review maps and other information about the process and the project, and provide input on alternatives, issues, and mitigation measures to be addressed in the EIR. As part of the scoping meeting, participants also learned about other opportunities for public input during the CEQA process and were invited to sign up for the project mailing list. The issues of greatest concern raised at the scoping meeting were aesthetics, biological impacts (particularly avian mortality), and impacts on cultural resources.

A summary of the comments received during scoping is provided in Appendix A.

1.3.2 Draft Environmental Impact Report

Contents

After the scoping phase, the next step in the CEQA EIR process is preparation of the Draft EIR. CEQA has established requirements addressing the analyses that must be presented in an EIR. These are summarized below.

- All significant effects on the environment that would result from the proposed project.
- Any significant effects on the environment that cannot be avoided if the project is implemented.
- Any significant effect on the environment that would be irreversible if the project is implemented.

- The growth-inducing impacts of the proposed project.
- Cumulative impacts of the proposed project.
- An explanation supporting the exclusion from analysis in the EIR of any effects that were determined to be less than significant.
- Mitigation measures proposed to minimize the significant effects on the environment, including measures to reduce the wasteful, inefficient, and unnecessary consumption of energy.
- Alternatives to the proposed project.

1.3.3 Public Review

As required by CEQA, the Draft EIR for this project is being made available for review and comment for a period of at least 45 days. Copies were sent to the State Clearinghouse in Sacramento for circulation to interested state agencies, and copies were sent directly to responsible, trustee, and local agencies. Copies are also available for review by members of the public at the Shasta County Department of Resource Management office during normal working hours.

Please submit any written comments on the Draft EIR to the address shown below.

Bill Walker, Senior Planner Shasta County Department of Resource Management Planning Division 1855 Placer Street Redding, CA 96001

1.3.4 Final Environmental Impact Report

After the end of the draft EIR's public review period, Shasta County Department of Resource Management will prepare a Final EIR for consideration by the public and the Shasta County Planning Commission. The Final EIR will include the components listed below.

- Comments received on the Draft EIR.
- Written responses to the comments.
- A list of commenters.
- A discussion of revisions to the EIR made in response to the comments.

The Planning Commission will review and consider the Final EIR before it takes action on the proposed project.

1.3.5 Findings of Fact

The final step in the CEQA EIR process is to develop findings of fact to support the lead agency's decision on whether to certify the Final EIR and whether to approve the project.

Specifically, the lead agency must make findings for each significant impact that the project has been changed (including the adoption of mitigation measures) to avoid or substantially reduce the magnitude of the impacts.

1.4 Document Organization

This Draft EIR is organized as shown below.

- The Executive Summary presents a brief summary of the findings of the EIR.
- Chapter 1, *Introduction*, introduces the proposed project.
- Chapter 2, *Project Description*, describes the project location, characteristics, and alternatives.
- Chapter 3, *Environmental Analysis*, describes the setting of the proposed project, analyzes potential effects of the proposed project, and presents mitigations measures to reduce those effects to a less-than-significant level.
- Chapter 4, Other Analyses Required by CEQA, presents analyses of cumulative impacts, growth-inducing impacts, significant irreversible environmental changes, and project alternatives.
- Chapter 5, References Cited, lists the bibliographic and expert authorities cited in the text.
- Chapter 6, List of Preparers, presents a list of individuals and organizations responsible for preparing the Draft EIR.
- Appendix A, Scoping Summary, contains the NOP for the Draft EIR, the CEQA Initial Study Checklist, and a summary of the comments received during the scoping meeting and public NOP review period.
- Appendix B, *Air Quality Monitoring Data*, presents the data that support the air quality impact analysis in Chapter 3.
- Appendix C, *Biological Resources Materials*, contains the baseline ecological studies, biological assessment, and wetlands and other surface waters report prepared by WEST Inc; the CNDDB plant and wildlife species lists; and the U.S. Fish and Wildlife Service species list that provided the baseline data for the analysis of impacts on biological resources.
- Appendix D, *Consultations with the Pit River Tribe*, summarizes the results of consultation efforts conducted by Pacific Legacy, Inc.
- Appendix E, Licensed Microwave Search & Worst Case Fresnel Zone, is a copy of the Comsearch report presenting information on existing microwave communications in the project area.
- Appendix F, *Preliminary Alternatives Screening Report*, is a report describing the screening process used to select project alternatives for further analysis.