Pacific Seabird Group

DEDICATED TO THE STUDY AND CONSERVATION OF PACIFIC SEABIRDS AND THEIR ENVIRONMENT

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Mr. Peter Goldmark Commissioner of Public Lands Washington Department of Natural Resources 1111 Washington Street SE Olympia, Washington 98504-7041

Re: Impacts to the Marbled Murrelet from the Radar Ridge Wind Energy Project

Dear Mr. Goldmark,

On behalf of the Pacific Seabird Group (PSG), we are providing comments on a proposal to locate a wind energy facility on state land at Radar Ridge in Pacific County, Washington, which is located within the Nemah Marbled Murrelet Management Area (MMMA). We are concerned that this project could significantly impact the Marbled Murrelet (*Brachyramphus marmoratus*), which is listed as threatened under the federal Endangered Species Act. Locating a wind power project at this location will likely result in direct mortality of murrelets nesting adjacent to the facility. There is also significant risk of long-term adverse effects to Marbled Murrelet conservation and recovery on a landscape identified as critical for species recovery. Most of the surrounding forestland is identified as critical nesting habitat, and has been designated by the federal recovery plan and Washington Department of Natural Resources (WDNR) Marbled Murrelet. Most of these lands are administered by the WDNR. Although we recognize the benefits of developing alternative sources of "green energy," including wind power, we strongly oppose locating wind turbines in this area.

PSG is an international, non-profit organization that was founded in 1972 to promote the knowledge, study, and conservation of Pacific seabirds. It has a membership drawn from the entire Pacific basin, including Canada, Mexico, Russia, Japan, China, Australia, New Zealand, and the USA. Among PSG's members are biologists and scientists who have research interests in Pacific seabirds, government officials who manage seabird refuges and populations, and individuals who are interested in marine conservation. For two decades, PSG has taken an active

lead in resolving many scientific aspects of the biology and conservation of Marbled Murrelets. PSG has served as an unbiased forum for government, university, and private sector biologists to discuss and resolve such issues.

The U.S. Fish & Wildlife Service listed the Marbled Murrelet as threatened in 1992 primarily because of significant losses of nesting habitat through logging and development in coastal forests of Washington, Oregon, and California (USFWS 1992). An objective of the Marbled Murrelet recovery plan (USFWS 1997) is to stabilize the population at or near current levels by maintaining and/or increasing productivity and removing and/or minimizing threats to survivorship. Protecting terrestrial habitat, including maintaining essential nesting habitat and occupied sites, minimizing the loss of suitable but unoccupied habitat, creating and maintaining large blocks of contiguous forest cover, and maintaining and enhancing buffer habitat, is essential for the long-term recovery of this species (USFWS 1997:131-146).

Marbled Murrelet Nesting Habitat

The amount of mature and old-growth habitat suitable for murrelet nesting in coastal areas is significantly below historic minima. Booth (1991) determined there has been a reduction of more than 80% of the remaining old-growth forest in Oregon and western Washington from prelogging levels. Timber harvest has primarily occurred at low elevations in the Coast Range of Oregon and Washington resulting in an uneven distribution of older forest across the landscape (Thomas et al. 1990). A major gap in Marbled Murrelet population distribution occurs in southwest Washington and northwest Oregon because of the reduced amount of remaining suitable nesting habitat. This gap in suitable habitat could result in reduced population dispersal creating a "genetic bottleneck."

The WDNR Marbled Murrelet Science Report entitled *Recommendations and supporting analysis of conservation opportunities for the Marbled Murrelet long-term conservation strategy* (Raphael et al. 2008) uses a landscape-level approach to meet federal recovery objectives of stabilizing and increasing the population size, and improving future habitat conditions in order to support a viable population. WDNR's science-based approach places emphasis on conserving geographic areas where it is "most effective in meeting the biological goals and gaining the largest benefits for Marbled Murrelet habitat conservation." Four years of work and extensive state resources have been used to develop a scientifically defensible rationale for long-term Marbled Murrelet conservation in southwest Washington. As part of this process, MMMAs were identified and ranked throughout lands administered under WDNR's Habitat Conservation Plan (WDNR 1997). The WDNR Science Team rated the Nemah MMMA as the highest-scoring area for murrelet conservation on State Lands in southwest Washington.

Federal critical habitat should be well-distributed to reduce the probability that natural or humancaused catastrophe threatens the survival of the species (USFWS 1996, 2006). Additionally, large contiguous blocks of nesting habitat are important features of critical habitat. The Marbled Murrelet critical habitat designation within the Nemah MMMA was created to protect the remaining older-aged forests that are crucial for nesting Marbled Murrelets, and foraging and breeding habitat for other old-growth dependent species. Existing unsuitable forests will be

adaptively managed to enhance and accelerate the development of future suitable nesting habitat. This MMMA would comprise over 13,000 acres of occupied murrelet nesting habitat and future suitable habitat. The murrelet recovery plan (USFWS 1997:126) clearly states that non-federal forestlands in Recovery Zone 2, which includes southwest Washington, support a limited amount of suitable habitat, but have the potential to be managed to increase the amount of future nesting habitat. Without a long-term strategy for Marbled Murrelet habitat conservation on state lands, the demise of the murrelet population in southwest Washington will likely be accelerated. Allowing this proposed wind energy project to proceed may result in unacceptable losses that could prevent the recovery of the Marbled Murrelet in southwest Washington.

Continued Loss of Marbled Murrelet Habitat

Despite the listing of the Marbled Murrelet as threatened in 1992, and implementation of the WDNR Habitat Conservation Plan in 1997, the amount of suitable murrelet habitat has continued to decline throughout the range. The loss and degradation of habitat has resulted from: (1) harvesting on private and state lands; (2) federal/private land exchanges; (3) thinning in suitable and occupied habitat, and buffers to suitable habitat; (4) habitat conservation plans; (5) fragmentation effects from adjacent harvests and thinnings; and (6) a variety of natural and anthropogenic causes including fire, windthrow, and disturbance. The total loss of suitable nesting habitat between 1992 and 2003 was estimated to be about 10% or 226,000 acres of the estimated of 2.2 million acres of suitable habitat in the states of California, Oregon and Washington (2003 estimate; McShane et al. 2004). Hundreds of acres of known Marbled Murrelet nesting habitat was lost in southwest Washington alone from a December 2007 wind storm. Under the Northwest Forest Plan (USDA and USDI 1994a, 1994b), habitat conservation plans, and other habitat management plans, new murrelet habitat will not be suitable for 50 to 200 years or more. The inability to create new murrelet habitat in the short term combined with the continued harvesting of occupied and suitable habitat ensures a downward trend in suitable murrelet habitat into the future. For these reasons it is imperative that current nesting habitats be managed to avoid or minimize adverse impacts to the species.

Marbled Murrelet Populations Continue to Decline

The Washington, Oregon, and California murrelet population is estimated to be 22,000 birds (McShane et al. 2004). Population modeling indicates that this population is declining and will be extinct in parts of Washington, Oregon and California within 100 years without changes in the amount and quality of nesting habitat, and in demographic trends (McShane et al. 2004). Low fecundity levels across Washington, Oregon, and California as measured by nest success indicate a population that cannot currently maintain itself (McShane et al. 2004, Beissinger and Peery 2003). Lower nest success is caused primarily by nest predation, which in turn is affected by forest fragmentation and proximity to human developments (McShane et al 2004, Raphael et al. 2002). Thus, in order to diminish the threat of nest predation, and increase murrelet reproduction, the forest landscape and its surroundings must be protected to provide large, contiguous blocks of suitable nesting habitat. Currently the South Nemah Natural Resource Conservation Area constitutes one of the most significant breeding sites for Marbled Murrelets in this nation according to the WDNR Science Team.

Management efforts are also needed to ensure adult survivorship by avoiding and minimizing anthropogenic activities and actions that could be detrimental to the species. A wind energy project on Radar Ridge is inconsistent with federal and state Marbled Murrelet recovery objectives. Such a project at this location can pose a long-term repeated threat to survival of the local population. Because Marbled Murrelets are marine birds they feed almost exclusively along coastal waters. Unlike migratory birds that may fly through a wind energy facility for a short duration twice each year, during the breeding season adult Marbled Murrelets make multiple daily flights between their inland nesting area and coastal foraging areas. Marbled Murrelets breed in Washington from early April to mid September. This repeated exposure to wind turbines elevates the risks to murrelets nesting in the area. Impacts to wildlife at most existing wind projects have only been evaluated for seasonal migrants. Presumably as more surrounding forest becomes suitable as a result of land management, more birds will utilize the habitat, thus increasing the bird strike probability. Current impact assessments are unlikely to reflect a change in the level of risk associated with an expanding population.

In summary: (1) murrelet populations continue to decline through low fecundity, high nest predation rates, and low adult survival; (2) most current recovery efforts rely on a system of reserves on federal land that is extremely limited in southwest Washington, and with the loss of occupied and suitable murrelet habitat continuing, state lands managed under WDNR's habitat conservation plan (not yet defined) play a crucial role in maintaining nesting habitat and future murrelet recovery; and (3) land uses contrary to recovery objectives must be avoided within and adjacent to critical Marbled Murrelet habitats, especially ones significant to the stability and recovery of regional populations of imperiled species. Continued loss and fragmentation of habitat will increase the risk of extinction of this unique seabird. We agree with the Evaluation Report on the 5-Year Status Review for the murrelet that:

"It is unrealistic to expect that the species will recover before there is significant improvement in the amount and distribution of suitable nesting habitat" (McShane et al. 2004:6-34).

We believe the proposed WDNR long-term conservation strategy will help address the habitat availability issue. However, the lease with Energy Northwest for development of a wind energy project on Radar Ridge is inconsistent with WDNR's habitat conservation plan and circumvents federal and state Marbled Murrelet recovery objectives. Furthermore it is inappropriate to develop such a project at this location considering the current status of the species and threats posed to the population. WDNR has responsibility for protecting the public interest, and as such should ensure that the location and operation of new facilities on state managed lands will have minimal adverse effects on the environment and the ecology of the state's land, water and wildlife. Although we recognize the benefits of developing alternative sources of "green energy," including wind power, a project of this nature is not suited to this particular location. Therefore, in order to ensure the survival and recovery of the Marbled Murrelet, it is essential that WDNR reconsider its decision regarding this matter. PSG is willing to assist WDNR in evaluating the appropriateness of siting future coastal wind energy projects. Without protection from further loss of suitable habitat and removing and/or minimizing threats to survivorship to

allow for increased productivity, the Marbled Murrelet is likely to become extirpated in southwest Washington in the foreseeable future.

Sincerely,

Craig S. Ham

Craig S. Harrison, Esq. Vice Chair for Conservation, Pacific Seabird Group

 cc: The Honorable Patty Murray, U.S. Senator The Honorable Maria Cantwell, U.S. Senator The Honorable Brian Baird, Congressman WA 3rd District The Honorable Christine Gregoire, Washington State Governor The Honorable Brian Hatfield, State Senator 19th Legislative District The Honorable Dean Takko, State Representative 19th Legislative District The Honorable Brian Blake, State Representative 19th Legislative District The Honorable Brian Blake, State Representative 19th Legislative District Jim Luce, Chair, Washington Energy Facility Site Evaluation Council Ken Berg, Manager, US Fish and Wildlife Service Western Washington Office Larry Peck, Interim Director, Washington Department of Fish and Wildlife

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