



*Protecting endangered species and wild places through science, policy, education, and environmental law.*

---

## **FACT SHEET ON ALTAMONT PASS BIRD KILLS**

As an environmental organization, the Center for Biological Diversity supports the development of alternative energy sources as a way to reduce our impact on the environment, including reducing greenhouse emissions and protecting wildlife habitat. However, some wind power facilities, such as the Altamont Pass Wind Resource Area (APWRA) in eastern Alameda and Contra Costa Counties, California, are causing severe environmental impacts to raptor populations due to bird kills from collisions with turbines and electrocution on power lines. We have a strong interest in making wind power cleaner and believe there are numerous changes that could be easily implemented at Altamont Pass by the wind power industry to significantly reduce these massive raptor kills.

### **UNACCEPTABLE NUMBERS OF BIRDS OF PREY ARE KILLED AT WIND TURBINES**

The APWRA was established in 1982 and contains 5,400 wind turbines. The APWRA has the highest numbers and rates of raptor kills of any wind facility in the world. The bird kill fiasco at Altamont Pass is a result of poor planning that allowed wind turbines to be built along a major raptor migration corridor in an area with high wintering concentrations of raptors and in the heart of the highest concentration of golden eagles in North America. Wind turbines at Altamont Pass kill an estimated 880 to 1,300 birds of prey each year, including up to 116 golden eagles, 300 red-tailed hawks, 380 burrowing owls, and additional hundreds of other raptors including kestrels, falcons, vultures, and other owl species. The APWRA is an ecological sink for golden eagles and other raptor species and may be having significant impacts on populations of birds that are rare and reproduce infrequently.

These astronomical levels of raptor mortality continue unabated, due in part to the failure of federal and state wildlife protection agencies to take any regulatory action. Bird kills at Altamont Pass occur in violation of federal and state wildlife protection laws, including the Bald Eagle and Golden Eagle Protection Act, Migratory Bird Treaty Act, and numerous California Fish and Game Codes. The wind power industry has been aware of the magnitude of the impacts to birds of prey at Altamont Pass since at least 1988, when the first of numerous studies of raptor mortality was published. To date, the industry has not implemented a single meaningful mitigation measure to reduce raptor kills or to compensate for removing significant numbers of birds from populations of imperiled species. In fact some efforts, such as the rodent control program at Altamont, have actually increased the risk to raptors while threatening endangered species such as the San Joaquin kit fox, California red-legged frog and California tiger salamander. Recent research by the California Energy Commission has shown the mortality risk to raptors at Altamont Pass has significantly increased over the past 15 years.

## **METHODS TO REDUCE BIRD KILLS ARE KNOWN**

The issue at Altamont Pass is not wind power versus birds, but rather whether the wind power industry is willing to take simple steps to reduce bird kills and mitigate for their impacts to bird populations. The California Energy Commission and raptor experts with extensive research experience at Altamont Pass have recommended re-powering projects (replace thousands of outdated turbines with fewer, larger turbines) that have the potential to greatly reduce the bird mortality. The CEC has also proposed measures to reduce avian mortality at existing turbines at Altamont Pass, including: relocating or retiring particularly lethal turbines; siting and configuring turbines to avoid bird flight paths; retrofitting power poles to prevent bird electrocutions; increasing the visibility of turbines to birds; discontinuing the rodent poisoning program; and managing grazing to encourage rodent prey away from turbines. Regulatory agencies, raptor experts, and conservationists have also proposed protecting off-site raptor nesting habitat by purchasing land or conservation easements to compensate for ongoing losses of rare birds of prey.

## **FAILURE TO ADDRESS BIRD KILLS HAS HAMPERED WIND DEVELOPMENT**

The failure of wind power companies to address the high levels of bird kills at Altamont Pass has “delayed and even significantly contributed to blocking the development of some wind plants in the U.S.,” according to a 2001 report commissioned by the National Wind Coordinating Committee, an advocacy group funded by the wind power industry. According to a 2002 report by the California Energy Commission:<sup>1</sup>

“Public perception, state and federal protection laws, and potential fines and lawsuits have resulted in delays, modifications, and stoppages of new wind energy projects in California and other states. For example, Alameda County will not approve additional permit applications to increase current electrical production (~580 MW) at Altamont Pass Wind Resource Area until significant progress toward solving the bird fatality issue is demonstrated.”

According to a 2002 report prepared for the Bonneville Power Administration:<sup>2</sup>

“Primarily due to concerns generated from observed raptor mortality at the Altamont Pass (CA) wind plant, one of the first commercial electricity generating wind plants in the U.S., new proposed wind projects both within and outside of California have received a great deal of scrutiny and environmental review...In the mid 1990’s, development of wind projects were delayed, sometimes to a point that the project was not developed, due in part to avian collision concerns.”

According to a 2004 report by the California Energy Commission:<sup>3</sup>

“Two factors heighten the urgency and importance of resolving this issue. First, one goal of California’s renewable portfolio standard is meeting 20% of the State’s electricity needs through renewable energy sources by 2010. Second, Alameda County placed a moratorium on issuing permits to increase electrical production capacity in the APWRA beyond the existing 580 MW permitted capacity until there is demonstrable progress toward significantly reducing bird mortality...By identifying and implementing new methods and technologies to reduce or resolve bird mortality in the APWRA, power producers may be able to increase wind turbine electricity production at the site and apply the mortality-reduction methods at other sites around the state and country.”

---

<sup>1</sup> California Energy Commission. 2002. A Roadmap for PIER Research on Avian Collisions with Wind Turbines in California. CEC Energy Related Environmental Research, December 2002.

<sup>2</sup> West, Inc. 2002. Synthesis and Comparison of Baseline Avian and Bat Use, Raptor Nesting and Mortality Information from Proposed and Existing Wind Developments. Prepared for the Bonneville Power Administration.

<sup>3</sup> Smallwood, K.S. and C.G. Thelander. 2004. Developing methods to reduce bird mortality in the Altamont Pass Wind Resource Area. Final Report by BioResource Consultants to the California Energy Commission, Public Interest Energy Research-Environmental Area, Contract No. 500-01-019.