



**ALAMEDA COUNTY CDA  
PLANNING DEPARTMENT**

**STAFF REPORT**

**TO: EAST COUNTY BOARD OF ZONING ADJUSTMENTS  
HEARING DATE: FEBRUARY 2, 2015**

**GENERAL INFORMATION**

**APPLICATION: MODIFICATIONS TO 16 EXISTING CONDITIONAL USE PERMITS  
(APPROVED YEAR 2005, AS MODIFIED IN 2013), PLN2014-00028**

**APPLICANT: ALTAMONT WINDS, INC.**

**REQUEST:** To extend 16 conditional use permits (CUPs) for three (3) years, through October 31, 2018, under specified conditions, beyond their current expiration date of October 31, 2015, for operation of an estimated 828 existing utility-scale wind turbines with a combined existing (current) generation capacity of 85.8 megawatts (MW).

**LOCATION, SPECIFIC PERMITS, OPERATORS, PROPERTY OWNERS AND PARCEL NUMBERS:** The existing turbines are located throughout the approximately 14,436-acre Alameda County portion of the Altamont Pass Wind Resource Area (APWRA), in the eastern portion of Alameda County, bisected by Interstate I-580, on up to 58 parcels bearing 58 separate Assessor's Parcel Numbers.

Conditional Use Permit Numbers, Facility Permittee/Land Owner family names and Assessor's Parcel Numbers (APNs) as follows:

- C-8036, Altamont Infrastructure Company/Frick & Costa, APN: 099B-5680-015-00;
- C-8037, Altamont Infrastructure Company/Pombo, APNs: 099B-6300-002-01, 099B-6300-002-02, 099B-6325-002-03, 099B-6325-002-04 and 099B-6425-001-06;
- C-8134, Altamont Infrastructure Company/Rooney, APN: 099B-6125-002-00;
- C-8137, Altamont Infrastructure Company/Mulqueeney, APNs: 099A-1800-002-03, 99A-1800-002-04, 99b 7890-002-04, 99B-7890-002-05, 99B-7900-001-05, 99B-7900-001-07, 99B-7910-001-01, 99B-7925-001-03, 99B-7925-001-04, 99B-7925-002-04, 99B-7925-002-05, 99B-7975-001-00, 99B-7980-001-00, 99B-7985-001-03, 99B-7985-001-04, 99B-7985-001-05, 99B-7985-001-06 and 99B-8050-001-00;
- C-8191, WindWorks Inc./Mulqueeney, APN: 099B-7910-001-01;
- C-8216, WindWorks Inc./Alameda County Waste Management Authority, APN: 099A-1810-001-00;
- C-8232, Altamont Infrastructure Company/ Egan, APN: 099B-6125-003-00;
- C-8233, Altamont Infrastructure Company/Elliott, APN: 099B-6125-004-00;
- C-8235, Altamont Infrastructure Company/Corbett, APNs: 099A-1785-001-14 and 099B-5650-001-04;
- C-8236, Altamont Infrastructure Company/Dunton, APN: 099B-5680-001-00;
- C-8237, Altamont Infrastructure Company/Valhalla Enterprises, APNs: 099B-5610-001-00 and 099B-6075-003-00;
- C 8238, Altamont Infrastructure Company/Ralph Properties II, APNs: 099B-7375-001-07 and 099B-7300-001-05;
- C-8241, Altamont Infrastructure Company/Walker Family Trust, APNs: 099B-6100-002-10, 099B-6100-002-12, 099B-6100-002-12, 099B-6100-003-10, 099B-6100-003-11, and 099B-6100-003-13;
- C-8242, Altamont Infrastructure Company/Marie Gomes Farms, APNs: 099B-6150-

002-07, 099B-6150-003-00 and 099B-6150-004-10;

C-8243, Altamont Infrastructure Co./Alameda County Waste Management Authority: APNs: 099A-1770-002-01, 099A-1770-002-02, 099A-1770-002-03, 099A-1780-001-04, 099A-1790-003-00 and 099A-1810-001-00;

C-8244, Altamont Infrastructure Company/Marie Gomes Farms, APNs: 099A-1795-001-00, 099A-1790-002-00 and 099B-6425-002-03;

**ZONING:** A-BE 160 and A-BE-320 (Agriculture, Minimum Building Site Area 160 and 320 acres, respectively) Districts, intended to promote implementation of general plan land use proposals (or designations) for agricultural and other non-urban uses, to conserve and protect existing agricultural uses, and to provide space for and encourage such uses in places where more intensive development is not desirable or necessary. (Section 17.06.010). Permitted uses include a variety of agricultural and agricultural support uses, including crop, vine and tree farms, animal husbandry, wineries, fish hatcheries, trails, and on qualified building sites, single family and secondary dwelling units. Conditionally permitted uses include privately-owned wind electric generators.

**GENERAL PLAN DESIGNATION:** The site is subject to the East County Area Plan (ECAP), adopted in 1994 and amended substantially in November 2000 by the voter-approved Ordinance/Initiative Measure D. The ECAP designates the site as Large Parcel Agriculture (LPA), and establishes minimum parcel sizes for specific areas of the East County (100 acres for the subject parcels) and maximum building intensity (floor area ratio or FAR). Subject to the provisions, policies and programs of the ECAP, the LPA designation permits one single family residence per parcel, agricultural uses, agricultural processing facilities, public and quasi-public uses, quarries, landfills and related facilities, “windfarms and related facilities, utility corridors and similar uses compatible with agriculture.”

**ENVIRONMENTAL REVIEW:** A Final Supplemental Environmental Impact Report (FSEIR) has been prepared that evaluates the potential environmental impacts of the application to extend for three years the existing CUPs, and which is “tiered” from an EIR that was certified by the EBZA on July 18, 2013 for modifications approved on the same date, to allow full operation of the 828 existing turbines through October 31, 2015.

**RECOMMENDATIONS:**

The Board of Zoning Adjustments should receive a staff presentation, take public comment on the FSEIR and on the subject application, review the draft resolutions and exhibits, including the Mitigation Monitoring and Reporting Programs (MMRPs) for the project, certify the Final SEIR by adoption of a draft Resolution for the purpose of CEQA, and approve the proposed CUP modifications (PLN2014-00028) by adoption of the second Resolution and proposed conditions.

**PERTINENT FACTS:**

Physical Features: The subject CUPs are widely distributed across the Alameda County portion of the Altamont Pass Wind Resource Area (APWRA). The project location containing AWI’s existing wind turbines falls within an approximately 14,196-acre portion of the 50,000-acre APWRA. The APWRA extends across the northeastern hills of Alameda County and a smaller proportion of Contra Costa County to the north. The region is generally characterized by rolling foothills of annual grassland. The area in which the CUPs are permitted is mostly treeless with relatively steep terrain on the west and gently rolling hills on the east toward the floor of the Central Valley. The underlying landscape generally consists of undeveloped grazing land. Major features of the area include the wind turbines, ancillary

facilities, an extensive grid of high voltage power transmission lines, substations, microwave towers, a landfill site, Interstate 580, railroad track lines, ranch houses, and clusters of rural residential homes on Dyer and Midway Roads.

History/Background: The 16 subject CUPs were initially approved by the EBZA in November 2003 and January 2004 with conditions, as the continued operation of existing wind farm facilities, including turbines and infrastructure. These permits, along with 13 other CUPs approved on those dates, and another two CUPs approved in 2006, were approved with a determination that they were categorically exempt from CEQA as the continued operation of existing facilities. A total of 31 CUPs were operating under a common set of conditions after the Alameda County Board of Supervisors approved a resolution in September of 2005 which provided for operation of the wind farms through 2018 but with phased decommissioning requirements, in the expectation that repowering of the APWRA – replacing the older generation turbines with newer and substantially fewer, larger and more efficient turbines – would be well under way after 2010. After litigation by a coalition of environmental advocacy organizations in 2006, a Settlement Agreement was approved in 2007 by three of the four wind energy companies that required greater commitments to repowering and cessation of most of their operations after 2015. As a result of the Settlement Agreement, the conditions of approval applicable to the turbines beneficially owned by the Settling Parties were substantially changed; however, AWI (the current applicant) was not one of the Settling Parties, and therefore remained subject to the original conditions adopted in 2005. More detailed history and background on the year 2005 CUPs is provided in the prior staff report on the public hearing on the Draft SEIR on December 18, 2014.

In 2013, AWI obtained approval of its application (PLN2011-00102) to modify these same CUPs, to eliminate the requirements of the year 2005 CUPs for phased decommissioning, which more specifically required removal of 10 percent of its original 920 turbines by September 30, 2009 (92 turbines), an additional 25 percent by September 30, 2013 (35 percent cumulative, or 322 turbines), an additional 50 percent by September 30, 2015 (another 460 turbines), and the remaining 15 percent of turbines (138) by September 30, 2018. The first phase of decommissioning took place in 2009, at which time AWI removed 10 percent of its 920 turbines. Together with the elimination of phased decommissioning, AWI also sought under that application to remove the requirements for winter seasonal shutdown, and proposed that 100 percent of AWI's turbines would be decommissioned by the end of 2015. The modifications approved in 2013 (July 19, 2013, by Resolution Z-13-36) were the subject of an EIR to address both the CUP modifications and decommissioning activities, as required by the year 2005 CUPs. On the basis of the 2013 EIR, the County denied the request to eliminate the winter seasonal shutdown and instead approved an alternative with continued seasonal shutdown, consistent with other wind farm operators, but with expiration on October 31, 2015.

The 2013 approval also instituted a Mitigation Monitoring and Reporting Program (MMRP) which primarily applied to ground-disturbing activities associated with repowering, but also required that the seasonal shutdown established in the prior years by the County be maintained through the life of the project (Mitigation Measure BIO-16), and retrofit off-site electrical facilities (i.e., power poles) proportional to the number of projected eagle fatalities (Mitigation Measure BIO-17). The County confirms that the seasonal shutdowns occurred on schedule since 2013, and that the power pole retrofits required by the MMRP were completed in October of 2014. In addition, removal of high-risk turbines (HRTs, aka hazardous-rated turbines), required by the 2013 conditions of approval (not by the MMRP), was completed by October of 2014.

## **PROJECT DESCRIPTION**

The current project proposal is a request to modify 16 existing Conditional Use Permits (CUPs), approved in 2005 and modified in July 2013 (PLN2011-00102), for continued operation of the wind farm assets of

Altamont Winds, Inc. (AWI), now comprised of 828 wind turbines with a rated capacity of 85.8 MW. Specifically, AWI's request would provide for the wind farm turbines to continue operating through October 2018, as a change from the current expiration of the CUPs on October 31, 2015. While the CUPs as approved in 2005 provided for operations through September 2018, they also required phased shutdown and removal, with a combined 35 percent of all turbines removed by September 2013 and an additional 50 percent removed by September 2015, so that only 15 percent of the original number of turbines would be operating between 2015 and 2018. The modifications approved in 2013 in effect exchanged the phased shutdown requirement for a complete shutdown in October of 2015, in order to initiate repowering of its wind farm assets in 2016.

The Applicant, AWI, contends that its progress in developing a repowering program for its turbines is constrained by ongoing commercial and regulatory difficulties, and that the CUP modifications allowing it to operate through 2018 are necessary in the event that circumstances beyond AWI's control prevent it from initiating repowering in 2015 or in a financially feasible manner after the current CUPs expire in 2015. AWI proposes to operate through 2018 only on the condition that it has diligently pursued repowering of its wind farm assets, and can demonstrate that circumstances beyond AWI's control have delayed completion of the repowered project. Conditions of approval would require an bi-annual review to document AWI's efforts to repower its assets.

Asset Exchange. Concurrently with the request for an extension through 2018, AWI is in discussions with another wind farm operator, Green Ridge Power LLC (an operating entity of NextEra Energy Resources, aka NEER), for an exchange of wind turbine assets. Specifically, approximately 300 wind turbines currently owned by AWI south of I-580 would be acquired by Green Ridge and a roughly equal number of wind turbines would be acquired by AWI north of I-580. As proposed, and under assurances from both companies, such an exchange will not increase the capacity or quantity of AWI's operating turbines. Green Ridge will shut down and remove the turbines it will acquire, for the purpose of repowering.

The asset exchange is recognized in the FSEIR and certain aspects of it are discussed, such as that it would result in a decrease of roughly 1.7 MW in AWI's rated annual capacity, and that it would result in a moderate reduction in the number of operating high-risk turbines (HRT) , specifically those rated 8.5 to 10.0 for their relative risk of striking birds. The asset exchange and the reduced number of HRTs to be operated was also the subject of some comments on the Draft SEIR, that asserted that such calculations of benefit were unreasonably describing it as a means of mitigating impacts on birds, or adjusting the assessment of avian mortality impacts. The response to these comments in the FSEIR indicates that the asset exchange is not directly part of the project, and neither of the possible decreases in MWs or HRTs described in the DSEIR were intended to suggest the impact of the project on avian mortality was mitigated or reduced in a substantive way. The DSEIR in fact described the effect as having no statistical importance.

## **RESPONSES TO COMMENTS ON THE DRAFT SUPPLEMENTAL EIR**

The Draft SEIR (DSEIR) circulated for the purpose of public and agency comment between November 17, 2014, and January 12, 2015, having been extended for 10 additional days beyond the original 45-day comment period in recognition of the winter holiday period. The County held a public hearing to obtain verbal comments on the DSEIR on December 12, 2014. A Final SEIR (FSEIR) was prepared as a complete revision of the Draft SEIR with Appendices containing comments on the DSEIR, master responses to frequent or prominent comments, responses to individual comments, a version showing changes to the DSEIR (deletions and insertions), notification documents, and assorted other materials. The DSEIR and FSEIR were prepared by Power Engineers, Inc. under County supervision.

The 2014 SEIR is a supplement to the 2013 EIR, which was certified in July 2013 as a complete assessment of the environmental impacts of AWI's existing operations, and of proposed modifications to operate all of AWI's 828 turbines through the end of 2015 without a seasonal shutdown, as well as three alternatives or scenarios: 1) operations through October 31, 2015; 2) operations through October 31, 2016; and 3) operations through October 31, 2018. All alternatives assumed full operations (no additional decommissioning), and included 3-½-month seasonal shutdowns. The SEIR is not intended to re-evaluate the assessment of those impacts, but is meant to provide additional, detailed analysis of the impacts attributable to the third alternative (to operate through 2018), which are limited almost exclusively to biological resources and in particular, avian mortality. Some additional analysis of hazardous materials was completed due to concerns raised by an area resident, but did not identify any significant impacts. More broadly speaking, the SEIR provides useful information regarding the asset exchange, new comparisons between the current project and its alternatives, revised mortality rates for focal raptor species, additional mitigation options, and provides for further public review of the current proposal. As with the 2013 EIR, the analysis quantifies effects on the four focal raptor species that were the subject of the 2007 Settlement Agreement, including golden eagle, red-tailed hawk, burrowing owl and American kestrel, as well as all bird species known to inhabit the APWRA. The DSEIR used the same method as the 2013 EIR to quantify the relative, projected number of bird deaths in the years 2013 to 2018, which was the range of years used in the 2013 EIR to show avian mortality impacts and changes due to that proposal, between the baseline (no project) conditions (with phased shutdown and decommissioning between 2013 and 2018) and complete shutdown in 2015.

The Executive Summary (Table ES-4) briefly outlines the impacts that were identified, and topic areas that were excluded from the analysis as not relevant or applicable to the site location or nature of the project. The SEIR's analysis of the current proposal's impacts identified only one significant, overarching environmental impact (among the specific determinations required by CEQA), which were the significant and unavoidable adverse impacts on biological resources, and the same significant impact as defined in the 2013 FEIR: *Impact BIO-1* – the potential to cause a substantial adverse effect, either directly or through habitat modifications, on special-status avian species.

To address impact BIO-1, the 2014 SEIR identifies three distinct mitigation measures, two of which were previously included in the 2013 EIR, namely continuing the winter seasonal shutdown (Mitigation Measure 16), and retrofitting electrical power poles (Mitigation Measure 17). To further mitigate and compensate for the projected level of avian mortality resulting from the proposed CUPs extension, the DSEIR identified Mitigation Measure "BIO-17a" (i.e., a subdivision of BIO-17), as a suite of five optional measures to supplement Mitigation Measure 17 and provide a means of compensation for the loss of special-status avian species, including golden eagles, by enabling contributions to conservation efforts. This measure was adopted almost verbatim and directly from the *Program EIR* (PEIR) for the *Altamont Pass Wind Resource Area Repowering* that was certified in November, 2014, and as outlined in the DSEIR, could include measures "outlined" in a programmatic eagle take permit, contributing to raptor recovery activities, raptor conservation, and regional raptor habitat conservation efforts. Contributions to raptor recovery activities and raptor conservation efforts were to be based on the estimated average cost of each raptor recovery reported in the PEIR (\$580, based on an interview with staff of the California Raptor Center at the University of California, Davis), for use in a Resource Equivalency Analysis (REA) to calculate appropriate costs for land conservation.

However, after certification of the PEIR, that average recovery cost was refuted by the Raptor Center as having been taken out of context, and because no substitute dollar amount was identified, the FSEIR was changed to remove those two components of Mitigation Measure BIO-17a that were associated with that recovery cost estimate. Another component of the suite from the 2014 PEIR, described as "Other Conservation Measures Identified in the Future" was also eliminated in the FSEIR as it would only apply in the long term, beyond 2018. The remaining options under Mitigation Measure BIO-17a would now

require contributions to regional conservation of raptor habitat by funding conservation easements within the APWRA or its bordering eco-region if approved by the County, held by an organization dedicated to managing conservation lands, based on a well-reasoned REA approved by the USFWS and the County, and according to a specific timetable, would remain as a strategy acceptable by the County to mitigate impacts on raptors. The impacts would not be reduced to less than significant levels, however. These changes would maintain the intent of Mitigation Measure BIO-17a to provide options for the applicant to diversify its mitigation program as defined in the 2013 EIR, which was limited to retrofitting power poles.

Major Comments and Master Responses. The County received nine letters of comment and some verbal comments at the public hearing. The majority of the comments fell into a limited number of common themes, for which the County prepared Master Responses, as summarized below.

- *Fatality Calculation and Use of MW-Years.* Several commenters, including members of the APWRA Scientific Review Committee, stated that it appeared that fatalities were being calculated on the basis of only a portion (0.708) of a “MW-year” as defined in the annual APWRA-wide Monitoring Reports to reflect the winter season shutdown, and that no such “subtraction” should have been applied. The County responds in the FSEIR that no such subtraction occurred, and that all of the comparisons of the proposed project with the existing CUPs, or with the prior baseline of phased decommissioning, all account for the seasonal shutdown. Simply stated, each scenario is measured on the basis of the cumulative total MWs of installed capacity operating or permitted to operate between October 1, 2013 and October 31, 2018, and as such are “scored” by the same metric.

Although there was a bias in estimating impacts of the 2013 proposal for operations without a seasonal shutdown, due to the likelihood of substantially higher fatality rates during the peak winter migration season, this is a separate issue, and none of the scenarios under consideration at the present time involve operations during the winter season shutdown.

- *Baseline for Analysis.* Some commenters believed the impacts of the current project proposal should be measured on the basis of the current CUPs that disallow any operations after October 31, 2015, in order to show the project’s levels of avian mortality in sharp contrast to conditions with no AWI-turbine operational related impacts. The response indicated that the County retained the use of the same baseline as used in the 2013 FEIR, of continued operations with phased decommissioning through 2018, because of the need (as described above as well) for comparing each scenario on the same metric.
- *Asset Exchange and Reduction of HRTs.* Some commenters questioned if the description of the asset exchange and the resulting modest reduction in the number of operating HRTs (high-risk turbines) in the APWRA at large, and modestly lower MWs of operating capacity were intended as a mitigation measures or in other ways give ‘credit’ to the asset exchange and the project in general. The response in the FSEIR makes it clear that neither the asset exchange or reduction of HRTs are treated as mitigation measures, though it is recognized that it will help facilitate repowering of the APWRA on those parcels south of I-580 that AWI will exchange or trade ‘away’ for assets north of I-580, where repowering will occur somewhat later, after 2015.

It was clarified in the FSEIR that the asset exchange is *not* an actual component of the project but merely a likely means of ‘disentangling’ assets in the APWRA that have historically over-lapped.

- *Inadequacy of Mitigation Measures.* Numerous commenters expressed concerns that the mitigation measures identified lacked certainty of implementation, such as that Mitigation Measure BIO-17a was an option rather than a requirement. Additionally, the details and number of power pole retrofits to be required under Mitigation Measure BIO-17 were not sufficiently clear to some commenters. The FSEIR responses to these issues consists of clarifications that the Measures are required, and reassurances that the suite of optional and supplemental measures available under Mitigation Measure

BIO-17a can be implemented effectively. The FSEIR response cites Table 3-3 as the basis for estimating total golden eagle fatalities attributable to the operations between 2016 and 2018 and the determination that retrofitting 322 power poles would be sufficient mitigation. The basis on which the retrofit of 322 power poles was determined is discussed separately below (see *Power Pole Retrofits Under Mitigation Measure BIO-17*).

The FSEIR also provided for changes to Mitigation Measure BIO-17a to eliminate the reliance on a disavowed estimate of the cost of an individual raptor recovery (\$580). Two of the five options that were considered to be reliant on the 2014 Program EIR-based dollar amount of \$580 were deleted from Mitigations Measure 17a, as well as the general and long-term-oriented “Other Conservation Measures Identified in the Future.”

- *Cumulative Impacts on Avian Populations.* A few comments, including some from the SRC, asked why the DSEIR did not evaluate in broader terms the deaths of avian predators on local or regional breeding, wintering and migratory populations, or other cumulative impacts. The FSEIR response acknowledged the cumulative impact but noted that as a Supplement to the 2013 FEIR, it would be inappropriate for the SEIR to add a new or expanded scope of assessment or methodology to define new impacts. The response also states that Mitigation Measures BIO-16, -17, and 17a are all intended to address cumulative impacts on all bird species, and that BIO-17a enables the wider ecological issues to be addressed through an REA to provide landscape-scale analysis and subsequent compensation and conservation strategies. Lastly, the FSEIR indicates that the cumulative impacts of other wind and energy projects in the APWRA were considered in the 2013 FEIR, and that the impacts of the project were categorized as cumulatively significant and unavoidable.
- *Current Monitoring Data.* Some commenters requested that the SEIR incorporate the latest Avian Monitoring Reports to estimate APWRA-wide avian mortality rates, to include bird years 2011 and 2012. The FSEIR responded that for consistency between the 2013 FEIR and the SEIR, the 2008-2010 mortality rates should be used as the basis for consistent analysis of avian impacts between the 2013 project and the current proposal. However, mortality rates from the later Monitoring Reports were included in the FSEIR in Table 3-5, to provide the range of estimated fatalities from the different mortality rates. Most importantly, the mortality rates for golden eagles including the later years were within the range established by the earlier years (0.085 for the period 2005 to 2010, and 0.061 for the years 2008 to 2010). As such, the use of later Avian Monitoring Report data did not substantially change the estimated range of projected fatalities. Nevertheless, and in consideration of the entire record, staff recommends that the mortality rates from later periods be included and that the response should be deemed to be revised accordingly in the resolution to certify the SEIR and in the Findings of Significant Impacts.
- *Overriding Considerations.* Several commenters asserted that the SEIR does not contain the background information necessary to support a Statement of Overriding Considerations, needed for project approval. The FSEIR response notes the comments, but characterizes them as primarily directed at the merits of the project itself rather than the adequacy of the DSEIR analysis. In addition, while the SEIR describes some of the intended benefits of the project (page 23, Section 2.3, Project Need and Objectives), which may contribute to the content of the Statement of Overriding Considerations, the Statement does not normally rely solely on the analysis in an EIR, and the FSEIR response notes that it may be based on information from the 2013 FEIR, the SEIR, or other information in the record. The FSEIR response acknowledges that the current project, substantially the same as Alternative 3 as described in the 2013 FEIR, was deemed infeasible in 2013, but concludes that the FSEIR is only intended to inform the County’s decision makers and the public about the potential environmental effects of the CUP modification currently proposed by the applicant.

Power Pole Retrofits Under Mitigation Measure BIO-17. Mitigation Measure BIO-17 as defined in the FSEIR is intended to provide for 29 power pole retrofits per projected golden eagle fatality, consistent with the 2013 FEIR. The following discussion is intended to provide some clarification with respect to statements in the DSEIR regarding Mitigation Measure 17 as described in the FSEIR. Firstly, the DSEIR and FSEIR state, on pages 37-8:

The proposed project with implementation of mitigation measure BIO-16, (together identified as Alternative 1 in the analysis of project alternatives) is projected to result in the fatality of approximately one eagle (cumulatively, and statistically, 0.7–1.0) when compared to the existing avian baseline condition (the No Project Alternative) (2013 FEIR Table 3.2-5).

This statement was directly copied from the 2013 FEIR description of Mitigation Measure BIO-17, and thus only applies to the 2013 proposed project, not the current 2014 proposal. However, revisions to the text in the FSEIR clarify that “this mitigation addresses the impacts of the 2013 project proposal (with Mitigation Measure BIO-16), which is approximately one additional eagle fatality.” The FSEIR also adds text explaining the basis for calculating the one additional eagle fatality, and that the currently proposed project (2014) would have a notably greater number of projected eagle fatalities – 11.1 – requiring 322 power pole retrofits.

As reported in Table 3-3 (and duplicated as Table ES-1), on the basis of the *2008-2010 Bird Year Adjusted Fatality Rates*, the current project would result in 3.7 annual estimated fatalities, or 11.1 estimated fatalities over the three-year period 2016-2018. The total estimated fatalities for the period 2013 to 2018 was 19, all of which data is derived from Tables 3-1 and 3-2, using the average fatality rates from the 2008-2010 bird years (i.e.,  $0.061 \times 60.8$  MW of operating capacity per year = 3.7; or for the whole period, 2013 to 2018,  $0.061 \times 311.0$  MW of cumulative operating capacity = 19). However, to clarify, the projected 19 fatalities represent a “gross” number, including the number of fatalities anticipated to occur in the same period under the existing CUPs – 7.9 (statistically), a difference of 11.1 fatalities – the same as the three-year total in Table 3-3. It should be emphasized again that these results are based on the 2008-2010 fatality rates, which had special merit in the 2013 FEIR, in that they represented the years in which the winter seasonal shutdown was fully in effect, whereas it was only partly implemented in the years 2005 to 2007.

The Executive Summary of the FSEIR, which was intended to summarize the content of the text body (Chapters 1.0 to 3.0) of the FSEIR, also contains a statement (page 5) clarified below the subject excerpt:

Use of power poles for the mitigation of all estimated golden eagle fatalities projected to result from the current proposal to operate through 2018 – a range of 19.0 to 26.4 such fatalities between 2013 and 2018 [2013 FEIR, Table 4-2, *Adjusted Species Fatality Rates for Each Alternative, Based on an Average Fatality Rate (Fatalities per Megawatt per Year)* would require the retrofitting of between 551 and 722 power poles, including at least 322 poles during the proposed three-year CUP extension.”

Although the range of 19 to 26.4 fatalities is represented in Table 4-2 of the 2013 FEIR, it also represents the “gross” number of fatalities projected from 2013 to 2018 and includes fatalities that would occur otherwise under the prior existing CUPs as they had been approved in 2005, between October 1 of 2013 and October 31, 2018. As such, the last portion of this statement could be rephrased to say “*could* require the retrofitting of between 551 and 722 power poles *due to the “gross” number of projected avian fatalities, but based on the “net” increase in projected fatalities, compared to conditions without the 2013 permit modifications, only a minimum of 322 pole retrofits would be required* during the proposed three-year CUP extension.” However, the FSEIR Executive Summary correctly concludes that AWI will retrofit 322 utility poles as mitigation for the currently proposed (2014) project.



Table 3-1 in the DSEIR also included fatality rates based on Avian Monitoring Reports from the period 2005 to 2010, and 2005 to 2011, and in response to some comments received on the DSEIR, Table 3-1 was supplemented with the fatality rates from 2005 to 2012. Table 3-5 was also amended to show average fatality rates for the period 2008 to 2012, which the County recognizes as having the greatest number of years (i.e., more supporting data) during which time the winter season shutdown was in full effect. However, some minor formatting and typographic corrections to Table 3-5 as revised for the FSEIR are necessary, as shown below with changes underlined, and with some additional explanatory footnotes.

**TABLE 3-5 COMPARISON OF ADJUSTED SPECIES FATALITY TOTALS OF FOUR FOCAL SPECIES, BASED ON AN AVERAGE FATALITY RATE (FATALITIES PER MEGAWATT PER YEAR)**  
**(UPDATED)**

SPECIES	AVERAGE FATALITIES PER MW (2005–2010/ 2008–2010/ 2005-2011/ 2005-2012/ 2008-2012)	PROJECTED NUMBER OF FATALITIES UNDER THE 2013 FEIR PROPOSED PROJECT <sup>1</sup>	PROJECTED NUMBER OF FATALITIES UNDER 2013 FEIR BASELINE CONDITIONS <sup>2</sup>	PROJECTED NUMBER OF FATALITIES UNDER 2013 FEIR ALTERNATIVE 3 <sup>3</sup>	PROJECTED NUMBER OF FATALITIES FOR YEARS 2016-2018 <sup>4</sup>
American Kestrel	0.496/0.443/ <u>0.59</u> / <u>0.577</u> /0.571	85.5–113.9	51.6–68.7	137.8–183.5	80.8–107.6
Burrowing Owl	0.721/0.425/ <u>0.78</u> / <u>0.70</u> /0.52	82.1–150.6	49.5–90.9	132.2–242.6	77.5–142.3
Golden Eagle	0.085/0.061/ <u>0.08</u> / <u>0.081</u> /0.075	11.7–16.4	7.1–9.9	19–26.4	11.1–15.5
Red-Tailed Hawk	0.449/0.286/0.44/0.411/0.35	55.2–86.7	33.3–52.3	88.9–139.6	52.2-81.9

**Notes:**

- <sup>1</sup> This column of data is a remnant of Table 3.2-5 in the 2013 FEIR which represents the 2013 proposal to eliminate seasonal shutdowns; the results were also determined to be biased low in the 2013 FEIR.
- <sup>2</sup> These baseline conditions represent the 2005 CUPs with phased decommissioning through 2018.
- <sup>3</sup> Alternative 3 is identical to the current 2014 project proposal, for the purposes of this table.
- <sup>4</sup> These results represent the increment of additional focal species fatalities attributed to the 2014 project proposal, based on the lowest and highest fatality rates in the 2nd column and the increment in cumulative MWs for the period 2016-2018.

It should be noted that the updated mortality rates for golden eagle in the various periods (2005 to 2011, 2005 to 2012, and 2008 to 2012), all fell within the lowest and highest mortality rates previously used in the 2013 FEIR (0.061 to 0.085 eagle fatalities per MW per year). If the lowest and highest fatality rates are considered, the potential increment of additional eagle fatalities for the three-year period 2016 to 2018, as shown in the last column of Table 3-5, would range between 11.1 and 15.5 (respectively using the fatality rates from 2008 to 2010, and 2005 to 2010).

Although using different fatality rates would result in different total projected fatalities, the FSEIR used the rate of 0.061 eagle fatalities per MW per year, based on the 2008 to 2010 period as the “final” rate and interpreted it to be consistent with the 2013 FEIR. Most importantly, as discussed above, based on the three years of operating capacity between 2016 and 2018 (182.4 MWs) the current project would result in 11.1 golden eagle fatalities, and require 322 power pole retrofits to mitigate the project’s impacts under Mitigation Measure BIO-17. Master Response 6 of the FSEIR states that “For consistency between the 2013 FEIR and the DSEIR, the 2008-2010 fatality rates should be used as the basis for comparing avian impact analysis.” In this case, the DSEIR and FSEIR used the lowest result (11.1) and not the highest result (15.5). It is common practice in CEQA and the policy of the County to base its identification of required mitigation measures on the worst-case condition, which in this case is a potential result of 15.5 (statistical) eagle fatalities, for which, based on the rate of 29 power pole retrofits per potential fatality,

would require 450 power pole retrofits, not 322. However, the County considers the highest rate of eagle mortality, 0.085 per MW per year, based on the years 2005 to 2010, to be the *least* representative of current conditions, because half of the years on which it is based did not include the fully implemented winter season shutdown. Based on comments received on the DSEIR, it appears that the rate based on the years from 2008 to 2012, as noted above, represent the largest number of years (i.e., more supporting data) during which time the winter season shutdown was in effect. It should also be recognized that the 2013 FEIR used a worst-case result to determine that the net increase in fatalities from approval of the 2013 project was 1.0, rather than the least-case result of “0.7”, based on the 2008 to 2010 mortality rates.

Alternatively, using the updated average golden eagle mortality rate of 0.075 per MW per year from the years 2008 to 2012, the result of operating a net additional 182.4 MW of installed capacity through 2018 would be 13.7 additional golden eagle fatalities, for which – assuming the use of Mitigation Measure BIO-17 and power pole retrofits to exclusively mitigate for all raptor impacts, at the USFWS-sanctioned rate of 29 power pole retrofits per projected golden eagle fatality, the applicant would have to retrofit a minimum of 397 power poles. This number represents a smaller amount than the range indicated in the Executive Summary of 551 to 722, is based on a rate reported in the FSEIR (Table 3-5), falls within the range of projected fatalities for the project, is considered to be supported by the FSEIR and would be acceptable to the County as mitigation. More importantly, it is based on a total of five years of monitoring during the current regime of 3½ months of winter season shutdown, and may be a more reliable and authentic mortality rate available at this time.

Combining Mitigation Measures BIO-17 and BIO-17a. Because the SEIR provides for some or all of the impacts to be mitigated through Mitigation Measure BIO-17a, the applicant may choose to combine power pole retrofits with some of the options identified with BIO-17a. For example, the applicant may retrofit 200 power poles under BIO-17, and under BIO-17a, provide for mitigation of the full range of special status species through contributions to conservation strategies during the four-year remaining life of the CUPs as modified.

Other Concerns. In response to a specific comment in response to the Notice of Preparation from a resident on Dyer Road, regarding the appearance of oil or other lubricants being released from leaking turbine generators or other equipment, including along the turbine blades, the DSEIR and FSEIR provided information on the potential of a significant leak of hazardous materials into the environment. As discussed in the prior staff report for the Public Hearing, the DSEIR determined that the impacts were less than significant and did not warrant the requirement for any mitigation measures; no different findings were made for the FSEIR. After the close of the comment period, the Dyer Road resident, Bob Cooper, submitted an e-mail to County staff reporting on a site tour on January 20, 2015, in which he indicated he was satisfied that what he believed was leaking oil was in fact rust stains, and that maintenance of the turbines was adequate. The e-mail is included in the FSEIR (Appendix B), but as it was received late, was not responded to directly in the FSEIR, nor did it require a response or change any determination in the FSEIR.

## **GENERAL/NON-CEQA-RELATED COMMENTS ON THE PROJECT**

Many comments received on the DSEIR expressed strongly negative opinions regarding the merits of the project, that were not appropriate to be addressed in the FSEIR. Comments from the U.S. Fish and Wildlife Service (USFWS), the California Department of Justice/Office of the Attorney General, the East Bay Regional Park District (EBRPD), Audubon California (Audubon), and Save Mount Diablo (SMD), may be summarized as follows.

- The USFWS noted that approximately 31 golden eagle fatalities were recorded at AWI facilities in the APWRA since late 2009, when eagle take permit regulations were first promulgated, but without

the benefit of any permit. Additionally, the Service stated that in spite of their encouragement of AWI to apply for such a permit, and indications by AWI of their intent to apply, the Service has not received a permit application from AWI or taken other steps to reduce its impacts on the species protected by the Migratory Bird Treaty Act (MBTA) or the Bald and Golden Eagle Protection Act (BGEPA). It was also noted that the golden eagle and other special-status species deaths attributable to AWI operations represent violations of the MBTA and BGEPA, and though enforcement has been withheld for those wind energy companies actively engaged in repowering, AWI is not doing so, and for this reason the Service recommended that the County deny the permit modifications.

AWI provided the County with a letter response to the DSEIR comment letter from USFWS, and it is attached to this staff report.

- The Attorney General opened its letter with opposition to the permit modifications on the grounds that it would “create serious inequities for other turbine operators and will undercut current efforts to repower” the APWRA, and that the DSEIR does not provide substantial evidence to support the required statement of overriding considerations and is otherwise legally inadequate. Primarily, the AG’s office considers repowering to be the more feasible alternative to lessen the significant environmental impacts of the project, and cited case law wherein a lead agency was found to have abused its discretion where the record did not support the finding that other less damaging alternatives were infeasible. It points out that the current record of evidence shows that Alameda County has already made a determination that repowering the APWRA with new turbines is a feasible alternative. The letter closes with a recommendation to the County to not certify the SEIR, and to deny the request.
- The EBRPD expressed its opinion that the finding made in 2013 that Alternative 3 (addressed in the prior 2013 FEIR and roughly the same as the current project proposal) would “very substantially increase the avian mortality impacts compared to the project and all other alternatives... [and] is considered infeasible” would be unchanged, and should continue to be found to be infeasible. The District does not explicitly state that it opposes the permit modifications, but more simply states that the permit extensions would delay repowering – and continue what it considers visual effects that would otherwise be removed.
- Audubon California’s letter begins with an observation that the County previously determined in 2013 that the extension of operations to 2018 were “infeasible” and that removal of the existing turbines after 2016 would be the best means of promoting repowering of the APWRA at large. Most of the comments address the DSEIR and CEQA issues, but others express the opinion that AWI would be given an unfair competitive advantage over other wind energy companies in the APWRA that are pursuing repowering, that the County would be complicit in the killing of golden eagles and other protected species by approving the extension, and as the project would delay repowering and result in higher levels of avian mortality, it should be denied.
- Save Mount Diablo expressed its opposition to the project due to the increases in avian mortality, but primarily addressed its remarks to the DSEIR.

## **PLANNING CONSIDERATIONS**

Planning staff have carefully considered the current project proposal, the FSEIR analysis, the comments from the public, private organizations and government agencies, and support approval of the project in part, with limits on the scale of the permitted operations, additional conditions of approval and related requirements for implementation of the identified Mitigation Measures BIO-16, BIO-17 and BIO-17a. The Board of Zoning Adjustments may choose to approve the project application as proposed with no changes, or it may choose to deny the request. Under the existing CUPs approved in 2013 (Condition 5, Expiration), the applicant has no express or implied right to operate existing turbines under these Permits after October 31, 2015. The Board may consider the assertion by the applicant that in order for it to

develop its repowering program for its turbines and prevent closure of the company, it must continue operations in a financially feasible manner beyond 2015, and thereby approve the project as proposed. County staff recognize that there are certain overriding considerations, as described in Exhibit C to the draft Resolution, related to local jobs and renewable energy. Alternatively, the Board may consider Planning staff's following recommendations.

Firstly, with respect to the primary request to operate the full 828-turbine, 85.8 MW wind farm for the three years between February 15, 2016 and October 31, 2018, for a cumulative three-year installed capacity of 182.4 MWs, County staff recommend that the use permits be extended but to allow no more than one-half of the MWs to be operated within that period, which may be either operated fully until June 22, 2017 (i.e., a total of 12-¾ months out of the applicant's requested extension to allow 25-½ months of operation, with winter season shutdown as provided by Mitigation Measure 16), at 50% capacity for all three years through October 31, 2018, or in other stages such that the three-year installed or operating capacity of AWI's entire windfarm operations, with or without an asset exchange, may not be greater than 91.2 MWs, or one-half of 182.4 MWs. The result of such a reduction in MWs would proportionally reduce the number of golden eagle, other raptors and avian species fatalities. The East County Board of Zoning Adjustments may specify that the CUPs will expire on June 22, 2017, or another later date if the applicant requests to operate fewer turbines over a longer period of time.

Planning staff consider this reduced level of operations to be somewhat comparable to, but notably more liberal than reverting back to the original 2005 CUP conditions, in which only 15 percent of the turbines were allowed to be operating between 2016 and 2018. It would provide for a total operational output in MWs from October 2013 to October 2018 of 220.0 MW, when compared to the other alternatives considered in the 2013 FEIR and as represented in Table 3-2 of the FSEIR (page 33). It is moderately more MWs of allowed output than Alternative 2 considered in the 2013 FEIR (30.5 more MW, compared to 189.5 under Alternative 2, which provided for cessation of operations after October 31, 2016).

Secondly, staff believes the applicant should be required to shutdown all turbine sites it currently operates or could operate after the asset exchange, with an HRT rating of 8.5 or greater. The elimination of hazardous-rated turbines (HRTs) has been shown by the preponderance of evidence over many years to reduce the number of avian fatalities, and has been part of the conditions of approval in various forms for the CUPs since 2005.

Thirdly, in order to assure the applicant honors its statements that it is taking all possible steps to engage in repowering of its APWRA assets except under specific conditions that it contends are outside of its control, the applicant should be required to submit a report semi-annually (twice yearly) to the Board of Zoning Adjustments describing, relative to each of the potential obstacles to repowering outlined as "Circumstances Outside of AWI's Control" in the FSEIR (page 25).

Fourthly, the Board should agree on a fatality rate to be used for projecting the total number of golden eagle fatalities anticipated to result from the project, from among the three principal options: a) 0.061 based on the monitoring years 2008-2010; b) 0.071 based on monitoring years 2008-2012; or c) 0.085 using monitoring years 2005-2010. The fatality rate will then be used to determine the number of power pole retrofits to be required under Mitigation Measure BIO-17 (and as adjusted by half, assuming the first recommendation above is required).

Finally, unless the applicant chooses to apply for an eagle take permit as described in Mitigation Measure BIO-17a (and submits a complete draft Eagle Conservation Plan and meets other USFWS requirements for an ETP) within six months of approval of the CUP modifications, the applicant should make a deposit of adequate trust funds prior to the start of each operational year (February 15<sup>th</sup> of each year, starting in 2016) that are dedicated to implementing Mitigation Measure BIO-17 and/or BIO-17a. Such deposits for

the use of power pole retrofits, or contributions to regional conservation of raptor habitat could be adjusted at the end of each operational year (2016 to 2018) based on actual expenditures and power pole retrofits completed, subject to approval by a Technical Advisory Committee (TAC) as will be structured under the APWRA Repowering Program EIR.

The above recommendations have been incorporated into the draft Resolution to approve the proposed project (attached), as revisions to the Avian Wildlife Protection Program & Schedule (AWPPS) component of the existing CUPs. A separate draft Resolution is also attached for certification of the FSEIR. Together with the draft Resolution to approve the project, three Exhibits are also provided, including: Exhibit A, Findings of Significant Impacts; Exhibit B, Statement of Overriding Considerations; and Exhibit C, the Mitigation Monitoring and Reporting Program. Although the FSEIR indicates that the identified mitigation measures would reduce the impacts on avian species, they would not eliminate the effects or reduce the impact to a level that is less than significant, and the impacts would remain significant and unavoidable. The purpose of the Exhibits, which are referred to in the draft Resolution for the project, is to support the decision of the Board to approve the project and comply with CEQA requirements.

Recommendation: The Board of Zoning Adjustments should receive a staff presentation, take public comment on the FSEIR and on the subject application, review the draft resolutions and exhibits, including the Mitigation Monitoring and Reporting Program (MMRPs) for the project, certify the Final SEIR by adoption of a draft Resolution for the purpose of CEQA, and approve the proposed CUP modifications (PLN2014-00028) by adoption of the second Resolution and proposed conditions.

Staff Planner: Andrew Young, Planner III  
Reviewed By: Sandra Rivera, Assistant Planning Director

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