



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY REGION IX 75 Hawthorne Street San Francisco, CA 94105

October 21, 2008

Robert D. Williams Field Supervisor U.S. Fish & Wildlife Service Nevada Fish and Wildlife Office 340 Financial Boulevard, Suite 234 Reno, Nevada 89502-7147

Subject: Final Environmental Impact Statement (FEIS) for Coyote Springs Investment Planned Development Project (CEQ# 20080351)

Dear Mr. Williams,

We have reviewed the FEIS for the Coyote Springs Investment (CSI) Multiple Species Habitat Conservation Plan (MSHCP) and Development. The FEIS is intended to evaluate the impacts of federal actions, including issuance of an Endangered Species Act Section 10(a)(1)(B) incidental take permit from U.S. Fish and Wildlife Service (Service); issuance of a Clean Water Act (CWA) Section 404 permit from the U.S. Army Corps of Engineers (Corps) for fill of waters of the U.S. (WOUS); and reconfiguration of lands under management of the Bureau of land Management. EPA has reviewed the FEIS and provides comments consistent with our authority provided by Section 309 of the Clean Air Act and the National Environmental Policy Act. Our detailed comments are enclosed.

We rated the project DEIS as EO-2, Environmental Objections - Insufficient Information, primarily due to the substantial amount of impacts to WOUS and the insufficient analysis of reasonable project alternatives that would further avoid impacts to WOUS and comply with the CWA Section 404(b)(1) Guidelines that require identification of the least environmentally damaging practicable alternative. Since then, we appreciate having had several opportunities to work with you and your staff, the Corps, representatives of CSI, and their consultant Terry Huffman, to resolve our objections. We have recommended that results of these efforts to reduce impacts to WOUS, including increasing upland buffers from 334.1 acres to 1,228.1 acres, and several additional protection measures, be adopted in the Record of Decision (ROD) consistent with the written correspondence between Terry Huffman and EPA, dated July 28 and July 31, 2008 (attached). We also appreciate the effort to respond to many of our concerns over off-site alternatives analysis, WOUS mitigation monitoring, water reliability, air quality impacts analysis, biological resources, and growth inducing impacts.

We have remaining concerns with the continued use of post-construction conditions as a project effects baseline and the resulting determination that the proposed project would have a positive benefit to hydrologic conditions and water quality. We recommend the proper baseline be clarified in the ROD. We also recommend that the ROD clarify that all crossings on the Pahranagat Wash will be clear span and commit to not using box culverts for crossings on any tributaries to the Pahranagat in the proposed project area. With regard to groundwater resources

and the carbonate-rock aquifer, we remain concerned that the applicant has not committed to forming a regional groundwater framework, and continue to recommend doing so consistent with EPA's August 20, 2007 DEIS and March 7, 2008 FEIS comment letters for the Kane Springs Valley Groundwater Development Project. This framework is intended to establish a formal process that will work towards a reliable and enduring water supply for humans and the environment. We also reiterate our recommendations for expanded discussion of water pricing to encourage conservation, and a discussion of the potential for, and recommendations to address, reduced groundwater supply as a result of climate change.

Our FEIS detailed comments also describe remaining concerns regarding the lack of information on how MSHCP conservation measures will offset habitat fragmentation impacts to the desert tortoise population, as well as a lack of detail as to how the public will be made aware of potential roadway impacts to migrating bighorn sheep. We recommend that the ROD provide this additional information and commit to working with the Service and Nevada Department of Wildlife on a bighorn sheep awareness and protection program.

Finally, we strongly encourage the project applicant to commit to utilizing solar technology, such as rooftop installations, to provide renewable on-site energy and reduce fossil fuel consumption and greenhouse gas emissions. We also recommend the ROD clarify why only 5 to 10 percent multi-family housing is considered sufficient, and that the project applicant reconsider increasing the percentage of high density housing to reduce the project footprint.

We appreciate having had the opportunity to discuss our remaining concerns with you and members of your staff prior to sending our FEIS comment letter. Please send a copy of the Record of Decision to the address above (mailcode: CED-2). If you have any questions, please contact Paul Amato, the lead reviewer for this project, at 415-972-3847 or <u>amato.paul@epa.gov</u>; or contact me at 415-972-3521 or <u>goforth.kathleen@epa.gov</u>.

Sincerely,

/s/

Kathleen M. Goforth, Manager Environmental Review Office

Enclosures: EPA's Detailed Comments July 28, 2008 Letter from Terry Huffman, Ph.D. July 31, 2008 Letter from EPA

Cc: Mike Jewell, U.S. Army Corps of Engineers Leilani Tokano, U.S. Fish & Wildlife Service Jeff Weeks, Bureau of Land Management Ruth Sundermeyer, Coyote Springs Investments Brad Hardenbrook, Nevada Department of Wildlife Tracy Taylor, P.E., Nevada State Engineer Ronda Hornbeck, Lincoln County Water District Donald A. Pattalock, Vidler Water Company Jo Morgan, Las Vegas Valley Water District

ENVIRONMENTAL PROTECTION AGENCYS' DETAILED COMMENTS ON THE COYOTE SPRINGS INVESTMENT DEVELOPMENT FINAL ENVIRONMENTAL IMPACT STATEMENT, OCTOBER 21, 2008

Waters of the U.S.

Clean Water Act Section 404(b)(1) Alternatives Analysis

In our DEIS comments, the EPA indicated that the alternatives analysis did not demonstrate compliance with the Clean Water Act (CWA) Section 404 (b)(1) Guidelines (Guidelines), based on the lack of a sufficient alternatives analysis to determine the least environmentally damaging practicable alternative (LEDPA). This position was based on an alternatives analysis that included only two action alternatives that were the same in their avoidance of waters of the U.S. (WOUS) and different only in construction phasing and conservation measures. The FEIS response to comments suggests that the EPA was involved and kept aware of the alternatives development process prior to the DEIS. While it is true that EPA staff were involved in some early planning meetings for the project, we disagree with the implication that we were aware of the selected alternatives prior to the release of the DEIS. However, our primary concerns pertaining to WOUS are the avoidance of direct and indirect impacts to their chemical, physical, and biological integrity, and we acknowledge the project proponent's efforts to increase protective measures in response to EPA DEIS concerns. We appreciate having had the opportunity to participate in the various meetings following our DEIS comments, and the modifications to the proposed project that resulted.

As stated in our attached July 31, 2008 letter to your consultant, Terry Huffman, Ph.D., "The revised proposed project, as described in your July 28, 2008 letter [attached], satisfactorily addresses the concerns regarding avoidance and minimization of waters we raised in our February 28, 2008 letter to the Corps." The revised proposed project would increase the amount of upland buffer habitat adjacent to preserved and restored WOUS from the 334.1 acres described in the DEIS, to 1,288.1 acres. This increase in buffers is further reflected in the August 2008, *Addendum to EIS and HCP*. We also anticipate the proposed project will comply with all measures described in the July 28, 2008 letter, and clarified in our July 31, 2008 letter.

Consistent with our previous discussion with the project proponents on July 2, 2008, EPA encourages the development of passive recreation areas adjacent to buffer areas of the Pahranagat Wash and contributing tributaries to further minimize impacts to WOUS at the project site. We continue to encourage the use of Low Impact Development (LID) design practices to replicate and restore natural watershed functions to the maximum extent practicable. Links to LID resources were provided in our DEIS comments.

EPA requests the development of an adaptive management plan designed to ensure the long-term integrity of the preserved and restored waters at the project site. We also suggest the Drainage and Maintenance Easement and the protective easement for restored waters prohibit the use of all pesticides in WOUS and their designated buffers, as we have previously discussed.

Though not mentioned in our July 31, 2008 letter, we encourage the project proponent to develop criteria for establishing the previously agreed-upon 40 to 80 foot buffer areas along restored waters. Landscape condition, hydrogeomorphic processes, and habitat integrity should be considered.

Recommendations:

The U.S. Fish & Wildlife Service (Service) should adopt in the Record of Decision (ROD) the revised proposed project with increased upland buffers, described in both your August 2008 Addendum, and your July 28, 2008 letter, and clarified in our July 31, 2008 letter. The Service should also adopt in the ROD the additional protective measures described in these letters.

Criteria should be developed to inform the designation of 40 to 80 foot buffers along restored WOUS.

The ROD should commit to locating passive recreational areas adjacent to Pahranagat Wash and contributing tributary buffers, and implementing LID to the maximum extent practicable.

The ROD should commit to developing an adaptive management plan for preserved and restored WOUS prior to any fill activities. EPA recommends this also be a condition of the Corps 404 permit.

The ROD should commit to prohibiting the use of all pesticides, as part of the Drainage and Maintenance Easement and protective easements for restored waters.

Impacts to Hydrology and Water Quality

EPA remains concerned that the FEIS continues to claim that the proposed project will have positive effects to hydrology and water quality, using post-construction conditions for comparison. As stated in our DEIS comment letter, "EPA does not agree with the use of post-project conditions as the NEPA baseline to which impacts should be assessed nor do we agree that achieving flood control through channel modification to functioning natural drainages results in a positive direct effect on the current baseline conditions of the site." Our comments go on to say that "EPA does not agree with the use of post-project conditions to evaluate impacts on baseline water quality nor do we believe that implementation of the Stormwater Management Plan and Best Management Practices will have a positive effect on pollutants when compared to current conditions." The FEIS adequately describes potential direct impacts to hydrology and water quality but continues to claim that the proposed project would have a "slight positive direct effect" to both (pp. 5-26, 27). We remain concerned with the continued approach of determining hydrologic and water quality improvements based on a comparison of project effects to post-development conditions instead of natural baseline conditions. These claims are inaccurate, based on the information provided, and could be misleading to decision makers and the public.

Recommendations:

The ROD should clarify that stormwater and flood conveyance facilities would have a slight positive effect on post-construction hydrologic conditions but that there would be direct adverse effects to the natural baseline hydrologic conditions.

The ROD should clarify that implementation of the Coyote Springs Stormwater Management Plan and Best Management Practices would have a slight positive effect on post-construction water quality conditions but that there would be direct adverse effects to the natural baseline water quality conditions.

Flood Conveyance Channels

Road crossing designs should be clarified. In our DEIS comments, EPA recommended that "The design of bridges, opportunities to reduce crossings, and designs that prevent placement of structures in the active channel should be included" in the FEIS. The FEIS response to comments states that roadways will all be overcrossings using either box culvert or deck on abutment designs. This is potentially inconsistent with the description in the July 28, 2008 letter to EPA from the project consultant, Terry Huffman, Ph.D., that describes road crossings in the Pahranagat Wash as being "elevated on concrete bridge abutments within the designated buffer areas with no bridge abutments being placed within the active channel." While it is assumed, due to the width of the Pahranagat Wash, that box culverts will not be used, this should be clarified in the ROD. In addition, clear span crossings should be used on all tributaries to the Pahranagat in the project area. Box culverts and other concrete in-channel designs can induce erosion and sedimentation, and degrade habitat and water quality.

Recommendation:

The ROD should clarify that crossings on the Pahranagat wash will be consistent with the July 28, 2008 letter to EPA. The ROD should also commit to using only clear-span bridges on tributaries to the Pahranagat Wash.

Groundwater

Commit to the development of a regional groundwater framework. EPA's DEIS comments recommended the development of a regional groundwater framework, consistent with our August 20, 2007 comments on the DEIS for the Kane Springs Valley Groundwater Development Project of which the CSI Development would be the primary beneficiary of groundwater yield. The FEIS response to comments has noted that the Service and CSI will continue to coordinate with other parties when making resource decisions. We continue to believe that a more formal, structured process would benefit future planning efforts and help to ensure more efficient and sustainable use of carbonate-rock aquifer groundwater. As stated in our March 7, 2008 FEIS comments for the Kane Springs Valley Groundwater Development Project, "We continue to urge the Bureau of Land Management, Cooperating Agencies, Lincoln County Water District, Vidler Water Company, Coyote Springs Investments, and other water right applicants to develop a regional groundwater framework to ensure efficient long-term sustainable use of the deep carbonate-rock aquifer and avoidance of adverse impacts to third parties and surface and

groundwater quality and quantity. We continue to recommend that Kane Springs Valley project water be utilized only after a clear demonstration by beneficiaries of effective use of in-basin supplies and application of aggressive water use efficiency, conservation, and reuse measures."

Recommendation:

We recommend the Service and CSI make a commitment in the ROD to form a regional groundwater framework to work with the above entities towards making certain that water supply development decisions and actions achieve a reliable and enduring water supply for both human users and the environment.

Include information on water pricing as a water conservation measure. As stated in our DEIS comments, "Variable pricing of water can significantly influence water demand and supply." To that end, we recommended that the FEIS "...include an in-depth discussion of pricing and how it will be utilized by the Coyote Springs Water Resources District (CSWRD) to balance water demands and water supply." The FEIS Response to Comments states that the Coyote Springs Water Resources District rules that are anticipated to include a tiered rate structure. EPA supports the development of a tiered rate structure that creates an effective economic incentive for users to conserve water.

Recommendation:

The ROD should include a commitment that a tiered rate structure will be implemented with the intent to provide an economic incentive for users to conserve water within the proposed project.

Describe potential effects of climate change on water availability. Our DEIS comments recommended a general discussion of the potential impacts of climate change on water supply for the project, as well as recommendations for addressing these effects. We acknowledge the inclusion of the paragraph in the FEIS cumulative impacts section (p. 5-99) discussing the potential effects on groundwater in the western United States, but do not consider this to adequately address our comment.

Recommendation:

The ROD should include an expanded discussion of possible reductions in groundwater supply, specific to the proposed project that could result from climate change effects. This discussion should also include recommendations to address potential water supply shortages for the proposed project.

Biological Resources

Endangered Species Act Section 10(a)(1)(B)

Desert tortoise habitat fragmentation impacts should be assessed and mitigated. The EPA's DEIS comment letter included a comment that habitat fragmentation impacts to desert tortoise were not adequately linked to the MSHCP conservation measures. We recommended the FEIS assess the degree of these impacts on desert tortoise populations and identify project alternatives

that further reduce these impacts. The FEIS response to comments describes fragmentation minimization through the land configuration process and the placement of the project between Highways 93 and 168, two existing obstructions that currently fragment desert tortoise habitat in the project area. We recognize the benefits of the proposed project alternative that reconfigures the privately owned land in order to confine the project area between the two existing highways. We also acknowledge and support the phased construction approach that would build the proposed project from the south to the north over a 40 year period, and that would occur only if there was an available water supply. However, we remain concerned with the level of fragmentation impacts that do not appear to be directly linked to the conservation measures for the MSHCP.

Recommendation:

The ROD should include a discussion of fragmentation impacts that would affect the desert tortoise population in and around the proposed project area and specify how MSHCP conservation measures are expected to offset these impacts.

Bighorn sheep movement corridors should be protected through a public awareness and protection program. The FEIS response to comments suggests that if residents are informed to be careful for bighorn sheep movement that this could result in reduced vehicle strikes, injury, and mortality. While EPA supports public education and awareness, it is unclear from the FEIS that the applicant has agreed to develop and implement such a program and just what a bighorn sheep awareness and protection program would include. The applicant should continue to consult with the Service and the Nevada Department of Wildlife (NDOW) on the development and implementation of a public awareness and protection program aimed at the protection of bighorn sheep, regardless of their not being included as a covered species in the Multi-Species Habitat Conservation Plan. At a minimum, this program should include information for both residents and motorists traveling through and within potential bighorn sheep migration corridors.

Recommendation:

The ROD should commit to continued coordination between, the Service, NDOW, and CSI on the development and implementation of a bighorn sheep awareness and protection program.

Minimization Measures

Green building standards should be expanded in the FEIS. EPA recommended that the project proponent maximize the implementation of green building standards for the proposed project. We understand that green building standards adopted by the Southern Nevada Home Builders Association would be implemented. We remain concerned with the lack of commitment to utilize solar energy production as a source of renewable energy for the proposed project. The FEIS states that "renewable energy sources would be considered for on-site energy generation" and that "…the use of photovoltaic technology in the production of solar energy production could occur." (p. 3-19). While we note that the FEIS states that CSI would encourage the use of solar energy and that builder guidelines for solar are being developed, we suggest there be a commitment to utilize solar, such as rooftop installation, for on-site energy production. Such a

commitment seems reasonable given the Bureau of Land Management (BLM) identification of this desert location as having high solar energy production potential. In addition, there could be substantial environmental benefits and reduced energy costs for residents and business owners, including reduced fossil fuel consumption and greenhouse gas emissions that contribute to climate change impacts.

Recommendation:

The ROD should include a commitment to maximize the use of solar energy for on-site energy production.

Increased density could reduce impacts of the proposed project footprint. As stated in our DEIS comment letter, "multi-family homes make up only 5-10 percent of the project area, and inclusion of additional multi-family homes could lead to reduced habitat impacts and increased conservation areas. The FEIS should provide a justification for the low percentage of multi-family housing, including any market rate information used to set this percentage." The FEIS and FEIS response to comments do not respond to this comment directly. We remain concerned with the low percentage of multi-family housing and continue to support an increase in higher density housing to reduce the amount of single family homes and further reduce the project footprint. More higher density housing and less single family homes could reduce the environmental impacts of the proposed project.

Recommendation:

The ROD should clarify how the project proponent determined that multi-family housing could only make up 5 to 10 percent of the total housing for the project. We also recommend that the project proponent reconsider increasing the percentage of high density housing and reduce the overall project footprint.