

US EPA ARCHIVE DOCUMENT



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

August 1, 2012

Kathleen Rehberg
Bureau of Land Management
Winnemucca District Office
5100 E. Winnemucca Blvd.
Winnemucca, Nevada 89445

Subject: Final Environmental Impact Statement for the Hycroft Mine Expansion Project, Humboldt and Pershing Counties, Nevada [CEQ# 20120220]

Dear Ms. Rehberg,

The U.S. Environmental Protection Agency has reviewed the Final Environmental Impact Statement (FEIS) for the Hycroft Mine Expansion Project. Our review and comments are provided pursuant to the National Environmental Policy Act, the Council on Environmental Quality Regulations (40 CFR Parts 1500-1508), and our NEPA review authority under Section 309 of the Clean Air Act.

The Proposed Action would include the expansion of mining and mineral exploration activities at the existing Hycroft Mine, increasing the Project area from 8,858 to 14,753 acres of private and public land, and adding approximately 2,172 acres of new surface disturbance. The expansion would increase the mine life by an additional 12 years.

On March 26, 2012, EPA provided comments to the BLM on the Draft Environmental Impact Statement (DEIS) for this project, wherein we rated the preferred alternative as *Environmental Concerns – Insufficient Information* (EC-2). This rating was based primarily upon concerns about potential impacts on water and air resources. In particular, we felt that the DEIS did not provide sufficient information on water usage, water quality, and groundwater availability. We also recommended that BLM include additional information on and/or consider additional measures to further minimize impacts to air quality, cumulative impacts, and other topics.

In response to comments, some figures and text in the FEIS have been revised to provide greater clarity to describe facilities design, groundwater levels, and how water quality may be affected by the project. EPA appreciates these revisions; however, we continue to be concerned that the EIS lacks detail regarding baseline water quality conditions. While Chapter 8 of the FEIS provides specific responses to comments raised in the DEIS comment period, the majority of responses provided, or FEIS sections referenced, provide responses to only one small component of a larger comment. As a consequence, many of EPA's questions and comments on the DEIS remain unaddressed following our review of the FEIS.

Finally, we understand that the Fort McDermitt Paiute and Shoshone Tribe has identified significant concerns in regards to tribal and cultural resource impacts resulting from the proposed project. While we note the additional proposed mitigation measures for these impacts identified in the FEIS, we encourage the BLM to continue working with the tribe to seek a mutually agreeable resolution to any remaining concerns from the Tribe.

EPA appreciates the opportunity to review this FEIS and we are available to discuss these comments with you further. Please send a copy of the Record of Decision to this office at the same time it is officially filed. If you have any questions, please contact me at 415-972-3521, or contact Carter Jessop, the lead reviewer for this FEIS. Carter can be reached at 415-972-3815 or jessop.carter@epa.gov.

Sincerely,

/s/

Kathleen Martyn Goforth, Manager
Environmental Review Office (CED-2)

Enclosures: EPA Detailed Comments

Cc: Bruce Holmgren, Nevada Division of Environmental Protection
Fort McDermitt Paiute and Shoshone Tribe

Water Resources

Water Quality

In our comments on the DEIS, EPA noted that there appear to be multiple aquifers in the Project Area vicinity and that the DEIS concludes that the perched aquifer system does not appear to be connected to the deeper groundwater system. The DEIS did not, however, provide sufficient basis for this conclusion and, in fact, noted that fault zones may serve as conduits for vertical groundwater flow between shallow, deep, and basement systems (DEIS pg. 3-62). In response to this comment, the FEIS states simply that the analysis in the DEIS concluded that there would be no impact to groundwater, therefore no changes were made to the FEIS. This response does not sufficiently address the concerns raised regarding the potential for groundwater quality impacts resulting from the proposed project.

As indicated in our comments on the DEIS, although it is reasonable to assume that the springs in the project area represent the shallow perched aquifer system, we are concerned that there may be connections between the perched aquifer and the deeper groundwater system. Based on the information presented in the DEIS, and without further information on baseline/reference conditions and surface and groundwater samples, it is not possible to ascertain to what degree the systems may be interconnected. Although no impact to groundwater quality is expected to occur due to the project, the Hycroft Mine Plan of Operations indicates that a release of process solution into the shallow aquifer system has occurred in the past at this mine site (September 2010; Appendix C – pg. 29). Developing an even more robust knowledge of the groundwater system at the project site would facilitate remediation and mitigation should another unplanned and unforeseen release of contaminants to groundwater occur.

Recommendation:

EPA continues to recommend an examination of the ionic composition of the mine process water, makeup water, surface water (springs), and various groundwater aquifers to determine if they are unique. We recommend that BLM ascertain whether there are any indications that the mine process water could be interacting with makeup water, surface water, or groundwater. These results should be made available to the public either as an attachment to the Record of Decision or at a later date via publication to the BLM's website.

Post-Reclamation Monitoring and Maintenance

In our comments on the DEIS, EPA recommended that the FEIS include summary or attachment of the Hycroft Mine Monitoring Plan to be administered under the Water Pollution Control Permit issued by the Nevada Division of Environmental Protection. The FEIS notes that the WPCP has not yet been issued for this project therefore no change was made to the FEIS. This plan or the basic provisions of it continue to be an important aspect of the proposed project absent from the EIS. Although NDEP would determine the specific requirements of the monitoring activities to be carried out, it is common practice to include significantly more detail in regards to potential or proposed monitoring and maintenance activities than this FEIS includes.

Recommendations:

The Record of Decision should discuss all monitoring and maintenance activities that would take place for the Hycroft Mine project. It should describe the groundwater monitoring that would be undertaken in accordance with existing permits, as well as the water quality monitoring that will be required to ensure compliance with water quality standards. The locations of all groundwater monitoring wells and points of compliance on the site, including screening intervals, parameters to be monitored, and monitoring frequencies should be defined. We continue to recommend that the ROD include the Hycroft Mine Monitoring Plan as defined by the WPCP as an attachment if possible.

Air Quality

Based upon our review of the DEIS, EPA noted that when mobile source emissions are considered in conjunction with stationary sources, the project would exceed the National Ambient Air Quality Standards for one-hour NO₂ and SO₂ emissions. While this does not necessarily mean that the Proposed Action would violate the Federal Clean Air Act, it does indicate that the project would likely result in an adverse environmental impact. The FEIS includes a number of new mitigation measures that could be implemented to facilitate a reduction in NO₂ and SO₂ emissions.

Recommendation:

The ROD or mine Plan of Operations should be revised to include the implementation of these NO₂ and SO₂ emissions reduction measures as contractual requirements for the mine operator and its contractors.

Solar Energy Development as an Option for Future Use of Reclaimed Areas

In our comments on the DEIS, EPA recommended that the BLM and project proponent consider the suitability of the site for solar energy development after closure and reclamation activities have been completed. Although the FEIS indicates that this recommendation does not meet the Purpose and Need of this project, EPA encourages the BLM and project proponent to investigate the potential for implementation of this recommendation outside this NEPA process. In light of the project's connection to the grid via high voltage transmission lines, the intent to explore the possibility of geothermal power generation at the site, the general project location, and the nature of reclaimed mine facilities, the project area may have a great deal of potential for the development of power generation in the future.

Recommendation:

Consider the suitability of the reclaimed mine surfaces for solar as well as geothermal energy development and describe in the ROD the venue for further exploring this topic.

Tribal/Cultural Impacts

Following the issuance of our comments on the DEIS, EPA has become aware that the Fort McDermitt Paiute and Shoshone Tribe has raised significant concerns with the Hycroft Mine Expansion project. The Tribe has asserted that BLM's analysis of impacts on culturally significant resources, sacred sites and exercise of Tribal religion is deficient, and that BLM's conclusion that "no impacts will occur on

sacred sites and religious freedom rights” is not well supported. We note the FEIS includes additional mitigation measures for impacts to tribal and cultural resources and a list of meetings that have occurred between the BLM and the Fort McDermitt Paiute and Shoshone Tribe between the publication of the Draft and Final EISs.

Recommendation:

The BLM should ensure that all impacts to tribal or cultural resources will be avoided or mitigated consistent with Executive Order 13175, *Consultation and Coordination with Indian Tribal Governments*, Section 106 of the National Historic Preservation Act, and Executive Order 13007, *Indian Sacred Sites*. We recommend that the ROD further discuss the status of ongoing consultation with the Fort McDermitt Paiute and Shoshone Tribe. If the Tribe continues to have unresolved concerns with the project, the ROD should discuss what actions the BLM will take moving forward to ensure that such concerns are addressed.