



Western Watersheds Project  
P.O. Box 779  
Depoe Bay, OR 97341  
tel: (928) 322-8449  
fax: (208) 475-4702  
email: [kfuller@westernwatersheds.org](mailto:kfuller@westernwatersheds.org)  
web site: [www.westernwatersheds.org](http://www.westernwatersheds.org)

*Working to protect and restore Western Watersheds and Wildlife*

---

*Delivered via email*

May 24, 2018

Kevin Hurrell  
U.S. Bureau of Land Management  
50 Bastian Road  
Battle Mountain, NV 89820  
[khurrell@blm.gov](mailto:khurrell@blm.gov)

**RE: Comments on the Environmental Assessment for the Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application (DOI-BLM-NV-B010-2018-0028-EA)**

Dear Mr. Hurrell:

Western Watersheds Project (WWP) and Great Basin Resource Watch (GBRW) are pleased to provide these comments in response to the Bureau of Land Management's (BLM's) request for comments on the Environmental Assessment (EA) for the Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application (DOI-BLM-NV-B010-2018-0028-EA).

Western Watersheds Project is a non-profit organization with more than 5,000 members and supporters. Our mission is to protect and restore western watersheds and wildlife through education, public policy initiatives and legal advocacy. Western Watersheds Project has staff and members in Nevada who use and enjoy America's public lands and their wildlife, cultural and natural resources for health, recreational, scientific, spiritual, educational, aesthetic, and other purposes. Western Watersheds Project also has a direct interest in mineral development that occurs in areas with sensitive wildlife populations and important wildlife habitat, as well as long-standing interest in conserving Nevada's wildlife and habitats.

Great Basin Resource Watch is a regional environmental justice organization dedicated to protecting the health and well being of the land, air, water, wildlife, and human communities of the Great Basin from the adverse effects of resource extraction and use. We inform communities about mining impacts through reports and educational materials. We review mine proposals, permits and expansions in Nevada and California, and we

recommend policy solutions to reduce toxic emissions, protect our water resources and preserve human and wildlife habitat.

We thank you for your assistance locating and providing the previous National Environmental Policy Act (NEPA) documents that are incorporated by reference in this EA, in response to Western Watersheds Project's concerns that the BLM make those documents reasonably available to the public per 40 CFR 1502.21. However, as of today, the comment deadline for this EA, Western Watersheds Project still has not received the Cortez Hills Expansion Project Final Environmental Impact Statement (FEIS). We urge you to put that document online so that it will be reasonably available to the public in future NEPA processes involving the Cortez operations.

We have a number of questions and concerns.

**I. The EA does not fulfill BLM's NEPA obligations because it tiers to non-NEPA documents for its analysis of impacts.**

The BLM's EA is 25 pages long. Seven additional Resource Reports that total 507 pages are posted on the BLM's ePlanning website.<sup>1</sup> These seven Resource Reports are not listed in the EA's Table of Contents, nor are they identified on their cover pages as being parts of the EA, nor have they been subject to notice and comment. Nevertheless, the seven Resource Reports are where most of the analysis of environmental impacts of this proposed action is located. For example, the EA's section on traffic and human safety states:

This section summarizes the affected environment and consideration of direct, indirect, and cumulative effects to traffic and human safety that was documented in the traffic and human safety resource report. The analysis area for direct, indirect, and cumulative effects on traffic and human safety includes the ore transportation route. The resource report, which is available in the project record, includes the traffic impact study conducted for the Proposed Action. The traffic impact study documents traffic counts, traffic accidents, and truck loading (Matrix Design Group, Inc. 2017); it is incorporated by reference.

EA at 3-4.

Similarly, the EA's section on noise states:

This section summarizes the affected environment and consideration of direct, indirect, and cumulative effects to sensitive receptors from noise that was documented in the noise resource report. The noise resource report, which is available

---

<sup>1</sup> The seven resource reports pertain to noise, air quality, Native American religious concerns, traffic and human safety, hazardous and solid wastes, social and economic values and environmental justice, and general wildlife and special status animal species.

in the project record, includes the baseline noise technical memorandum. The technical memorandum identifies the ambient sound levels and sensitive receptors within the ore transportation route analysis area, and includes the descriptive measures of sound and typical levels of sound in different environments (Tetra Tech, Inc. 2018a); it is incorporated by reference.

EA at 3-5.

Likewise, the EA's section on general wildlife states:

This section summarizes the affected environment and consideration of direct, indirect, and cumulative effects on wildlife, including migratory birds, that is documented in the wildlife and special status species resource report. The resource report, which is available in the project record, includes a baseline wildlife technical memorandum (Tetra Tech, Inc. 2018b); it is incorporated by reference.

EA at 3-7.

Two other sections of the EA (air quality, special status animal species) also state that they summarize environmental analysis located in the resource reports and that those reports incorporated by reference. The EA's sections on Native American religious concerns, hazardous or solid waste, and social and economic values and environmental justice reference the resource reports but do not say those reports are incorporated by reference. Why does the EA treat these two groups of resource reports differently?

The EA's reliance on the detailed analysis of direct, indirect, and cumulative impacts located in resource reports that are non-NEPA documents does not comply with NEPA. An agency cannot tier to a non-NEPA document for its analysis of impacts for a given project. *See League of Wilderness Defenders v. U.S. Forest Serv.*, 549 F.3d 1211, 1219 (9th Cir. 2008); *see also Klamath-Siskiyou Wildlands Center v. BLM*, 387 F.3d 989, 998 (9th Cir.2004) ("a non-NEPA document . . . cannot satisfy a federal agency's obligations under NEPA").

## **II. We request clarification of the EA's Purpose and Need.**

We request clarification of the EA's Purpose and Need because the EA does not explain why the mining operator has requested permission to haul an additional 1.2 million tons of refractory ore from the Cortez to the Goldstrike facilities. What is happening that the company has an additional 1.2 million tons of ore that it wants to haul? Why is this increase in ore hauling only going to last for 18 months? What will happen after that 18 months? For example, does the company plan to return to prior levels of ore hauling at the end of those 18 months? How does this proposed action relate to the company's expansion plans such as the Deep South project? If this is in any way related or connected to future mine expansion,

BLM must analyze this increase in ore hauling as part of that mine expansion. Otherwise, analyzing only this change to hauling operations by itself is improper NEPA segmentation (a.k.a. piecemealing).

**III. We request clarification of the process of preparing this EA and the seven resource reports.**

We request clarification of the process of preparing this EA and the seven resource reports because the EA states that it was prepared at the direction of BLM by Tetra Tech, Inc. under a contract with BCI (Barrick Cortez, Inc.). EA at 3-16. The cover pages of the seven resource reports identify them as “submitted to” BLM and prepared by Tetra Tech, Inc. Has a Memorandum of Understanding (MOU) for creating this EA been prepared and signed by the three parties (BLM, Tetra Tech, BCI)? If so, which documents does that MOU include? For example, only the EA or also the seven resource reports? Has a financial disclosure statement been prepared and signed by Tetra Tech? What was the process by which BLM selected Tetra Tech, Inc. to prepare the EA? Did the BLM select Tetra Tech, Inc. to prepare the seven resource reports and if so, what did that process entail?

**IV. The EA fails to take a hard look at the reasonably foreseeable direct, indirect and cumulative impacts of this proposed action.**

*A. Failure to take a hard look related to improper NEPA tiering*

The content of the EA alone is not enough to be a hard look under NEPA because the details of the direct, indirect and cumulative impacts are located in seven resource reports that are not NEPA documents. As discussed above, the EA cannot tier to a non-NEPA document. Therefore, the EA’s reliance on discussion of environmental effects in the seven resource reports does not satisfy the BLM’s obligations under NEPA. This affects all of the resources discussed in the EA.

For example, we note that the EA contains only one reference to climate change: “A description of the existing ambient air quality, including climate, meteorology, greenhouse gases, and climate change is provided in the air quality resource report.” EA at 3-10. Climate change’s relationship to greenhouse gas emissions is well known, and increased truck trips to haul additional refractory ore will increase greenhouse gas emissions. However, increases in greenhouse emissions are not analyzed in the EA.

*B. Failure to take a hard look related to cumulative impacts*

As noted herein, the EA fails to fully consider all “direct and indirect impacts” under NEPA. These failures are in addition to the EA’s failure to review the “cumulative impacts” from all “past, present, and reasonably foreseeable future actions” under NEPA. 40 CFR § 1508.7. In this case, the EA provides a map (figure 1) showing existing project and actions

“that could interact with the Proposed Action in a manner that would result in cumulative effects” (EA p.2.2) and references the analysis contained in the Cortez Hills FEIS and SEIS (BLM 2008a, BLM 2011) and APO3 EA (BLM 2015a). These documents contain no reference to the proposed “Deep South Expansion.”

According to the Deep South Expansion Project Amendment to Plan of Operations and Reclamation Permit Application #0093<sup>2</sup> the following is expected:

- Deepen the existing Crossroads Pit (Pipeline Complex) by 200 feet to 3,200 feet above mean sea level (amsl) and reconfigure the backfill. Three backfill scenarios are being proposed for authorization;
- Add Stage 11 to the Pipeline Pit;
- Expand the existing Gold Acres Pit Complex and expand the waste rock facility (WRF);
- Expand the existing Cortez Hills underground mine by increasing the depth of mining to 2,500 feet amsl;
- Revise dewatering rates and continue dewatering to allow underground mining at Cortez Hills beneath the currently authorized floor of 3,800 feet amsl to 2,500 feet amsl;
- Extend the Pediment portion of the Cortez Hills Pit and shift the Plan boundary to the east by 800 feet;
- Potentially backfill the Cortez Hills Pit;
- Construct an additional water treatment plant in the Cortez Hills Complex;
- Expand the existing Cortez Pit and WRF;
- The maximum dewatering rate will remain below the authorized rate of 36,100 gpm;
- Add Rapid Infiltration Basins (RIBs), surface pipelines and construction laydown areas on private land outside of the Plan boundary in Crescent Valley;
- Construct additional RIBs, surface pipelines and construction laydown areas in Grass Valley and Pine Valley;
- Change the Grass Valley production wells to injection wells and add monitoring wells;
- Construct, if necessary, a water reservoir and pipelines for dewatering water management at Rocky Pass, construct a water line from the reservoir to the Dean Ranch, and construct a bypass road for public access;
- Various additions/revisions to Facilities and Ancillary Disturbance:
  - o Expand the Plan boundary to capture proposed facilities;
  - o Increase off-site ore haulage and back haul to 2.5 million tons/year;
  - o Modify the surface mining rate to allow up to 600,000 tons per day;

---

<sup>2</sup> See Attachment A.

- o Expand the existing Pipeline oxide ore stockpile;
- o Add ore stockpiles;
- o Add ancillary disturbance around existing and proposed facilities;
- o Powerlines, pipelines, buildings, communication sites, haul and access roads;
- o Underground surface infrastructure (vent raises, boreholes, surface plants (shotcrete, etc.)).

The proposed modifications will result in approximately 3,793 acres of new disturbance inside of the Plan boundary. The Horse Canyon/Cortez Unified Exploration Project (NVN-066621) plan boundary and the West Pine Valley Exploration Project (NVN-077213) plan boundary will be modified to exclude the proposed Pine Valley RIBs and associated infrastructure. The Horse Canyon/Cortez Unified Exploration Project (NVN-066621) plan boundary will also be modified to exclude the portion of the Pediment East extension that crosses into this Plan area. Cortez will submit amendments to these plans as directed by the United States Bureau of Land Management (BLM) in the Record of Decision.

Despite the 18-month duration of the proposed action, the EA fails to provide the quantified analysis of the cumulative impacts from all past, present, and reasonably foreseeable future activities in the area on all potentially affected resources such as air quality, recreation, wildlife, noise and visual impacts, etc., as required by NEPA. This includes, at a minimum, a quantified analysis of the impacts of all of the activities/projects noted in the EA, as well as others which were not included, but are currently proposed, such as the Deep South Expansion project.

BLM needs to justify the exclusion of the proposed Deep South Expansion. Why has it been excluded?

*C. Failure to take a hard look related to greater sage-grouse*

The EA discloses the presence of greater sage-grouse leks, Priority Habitat Management Area (PHMA), General Habitat Management Area (GHMA) and Other Habitat Management Area (OHMA) in proximity to the proposed ore hauling route. However, the EA does not discuss how sage-grouse use those areas seasonally and how their seasonal use will be affected by the proposed action. For example, does the analyzed area include any winter concentration areas, nesting habitat, brood-rearing (summer) or habitat connectivity areas? If so, how will increasing the frequency of truck noise affect sage-grouse? As Patricelli et al. (2012) have pointed out, noise impacts sage-grouse beyond leks: “if noise levels drop down to stipulated levels at the edge of the lek, then much of the area surrounding the lek will be exposed to higher noise levels (see Figures 3 & 4). This management strategy therefore protects only a fraction of sage-grouse activities during the breeding season—mate assessment and copulation on the lek—leaving unprotected other critical activities in areas

around the lek, such as foraging, roosting, nesting and brood rearing.” Research has also shown greater reductions in male attendance at leks exposed to road noise than drilling noise, suggesting the power of road noise to affect sage-grouse. *See* Blickley et al (2012). According to Blickley et al. (2010), “The cumulative impacts of noise on individuals can manifest at the population level in various ways that can potentially range from population declines up to regional extinction. If species already threatened or endangered due to habitat loss avoid noisy areas and abandon otherwise suitable habitat because of a particular sensitivity to noise, their status becomes even more critical.”

The EA also does not disclose sage-grouse lek data over time, which is critical to understanding whether the local sage-grouse population is increasing, decreasing, or remaining steady. What is known about sage-grouse population trends (e.g., lek counts) over the last 20 years in the study area? Have any soft or soft triggers under the Nevada and Northeastern California Greater Sage-Grouse Approved Resource Plan Amendment (NV/CA ARMPA) been declared for this area since the ARMPA was approved? If so, they need to be included as part of cumulative impacts analysis in this EA.

**V. The EA does not comply with the Nevada and Northeastern California Greater Sage-Grouse Approved Resource Plan Amendment**

The NV/CA ARMPA’s MD SSS 7 instructs the BLM to

Work with project proponents to limit project-related noise, seasonally or annually (see MDs SSS 2 and SSS 3), in GRSG habitat where it would be expected to reduce functionality of habitats that support associated GRSG populations. Support the establishment of ambient baseline noise levels for leks in PHMAs and GHMAs.

*As additional noise-related research and information emerge, specific new limitations appropriate to the type of projects being considered will be evaluated and appropriate measures will be implemented where necessary to minimize the potential for noise impacts on GRSG populations.*

NV/CA ARMPA at 2-10, emphasis added.

The EA’s analysis of noise impacts to greater sage-grouse derives from ambient noise values that have been extrapolated from a 40-year old EPA reference document. *See* Noise Resource Report at 3-4. Recent sage-grouse research finds very different ambient noise values in rural areas that are well below the EPA noise value for wilderness and also suggests that allowing 10 dBA over ambient is not a strong enough standard to protect sage-grouse.<sup>3</sup> This more recent information needs to be taken into account. As mitigation, we suggest that the BLM to add a timing limitation to its Conditions of Approval so that during March 1

---

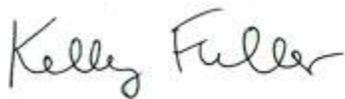
<sup>3</sup> See, for example, Ambrose et al (2015). Attachment B, as well as Patricelli et al (2012). Attachment C.

through June 30, any increased ore hauling within four miles of active and pending greater sage-grouse leks takes place only between 9 am and 6 pm. Furthermore, the NV/CA ARMPA states within PHMA “in authorizing third-party actions that result in habitat loss and degradation, the BLM will require and ensure mitigation that provides a net conservation gain to the species, including accounting for any uncertainty associated with the effectiveness of such mitigation.” NV/CA ARMPA at 2-8. This ARMPA provision is relevant to the EA because greater sage-grouse are highly noise sensitive. The proposed action will increase the frequency of noise in PHMA, thus degrading the functionality of that habitat for sage-grouse. To achieve the net conservation gain standard, we suggest that the Conditions of Approval include a reduction of livestock grazing on one or more grazing permits held by Barrick, for a 24 month time period.

In conclusion, thank you again for this opportunity to assist BLM by providing comments for your EA review of the Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application (DOI-BLM-NV-B010-2018-0028-EA). If you have any questions or would like additional information, please contact Kelly Fuller at (928) 322-8449, [kfuller@westernwatersheds.org](mailto:kfuller@westernwatersheds.org) and John Hadder at (775) 348-1986, [john@gbrw.org](mailto:john@gbrw.org).

Please add Western Watersheds Project and Great Basin Resource Watch to the notification list for the Cortez mine complex, including this amendment, future amendments or modifications, and future expansions, using our contact information below.

Sincerely,

A handwritten signature in cursive script that reads "Kelly Fuller".

Kelly Fuller  
Energy Campaign Coordinator  
P.O. Box 779  
Depoe Bay, OR 97341  
(928) 322-8449  
[kfuller@westernwatersheds.org](mailto:kfuller@westernwatersheds.org)

A handwritten signature in black ink that reads "John Hadder". The signature is fluid and cursive, with the first name "John" and last name "Hadder" clearly legible.

John Hadder  
Director, Great Basin Resource Watch  
P.O. Box 207  
Reno, NV 89504  
(775) 348-1986  
[john@gbrw.org](mailto:john@gbrw.org)

## Literature Cited

- Ambrose, Skip, et al. 2015. Review of Wyoming Governor's Order 2011-5. Attachment B.
- Barrick Cortez Inc., "Deep South Expansion Project Amendment to Plan of Operations and Reclamation Permit Application #0093." (NVN-067575 (16-1A)), BARRICK CORTEZ INC. HC 66 Box 1250 Crescent Valley, NV 89821-1250, October 2016. Attachment A.
- Bureau of Land Management. 2018. Environmental Assessment for the Barrick Cortez Inc. - Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application (DOI-BLM-NV-B010-2018-0028-EA). Available at [https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142396/174809/20180425\\_BarrickCortezRefractoryOreAmendment\\_EA\\_508.pdf](https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142396/174809/20180425_BarrickCortezRefractoryOreAmendment_EA_508.pdf).
- Bureau of Land Management. 2015. Nevada and Northeastern California Greater Sage-Grouse Approved Resource Management Plan Amendment. Available at [https://eplanning.blm.gov/epl-front-office/projects/lup/21152/63235/68484/NVCA Approved RMP Amendment.pdf](https://eplanning.blm.gov/epl-front-office/projects/lup/21152/63235/68484/NVCA_Approved_RMP_Amendment.pdf).
- Blickley, J. L. and Patricelli, G. L. 2010. Impacts of Anthropogenic Noise on Wildlife: Research Priorities for the Development of Standards and Mitigation. *Journal of International Wildlife Law & Policy*, 13: 4, 274 — 292. <http://dx.doi.org/10.1080/13880292.2010.524564>. Available at <http://www.tandfonline.com/doi/abs/10.1080/13880292.2010.524564>.
- Blickley, et al. 2012. Experimental Evidence for the Effects of Chronic Anthropogenic Noise on Abundance of Greater Sage-Grouse at Leks. *Conservation Biology*. Attachment D.
- Patricelli, et al. Patricelli, G.L., J.L. Blickley, and S.L. Hooper. 2012. The impacts of noise on greater sage-grouse: A discussion of current management strategies in Wyoming with recommendations for further research and interim protections. Unpubl. Report prepared for: The Bureau of Land Management, Lander Field Office and Wyoming State Office, Cheyenne and Wyoming Game and Fish Department, 25 pp. Attachment C.
- Tetra Tech, Inc. 2018. Air Quality Resource Report for the Barrick Cortez, Inc. – Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application. Available at <https://eplanning.blm.gov/epl-front->

[office/projects/nepa/105663/142397/174810/20180423\\_BarrickCortezRefractoryOre\\_AirQualityResourceReport\\_Final\\_508.pdf](https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142397/174810/20180423_BarrickCortezRefractoryOre_AirQualityResourceReport_Final_508.pdf).

Tetra Tech, Inc. 2018. Native American Religious Concerns Resource Report for the Barrick Cortez, Inc. – Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application. Available at [https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142398/174811/20180423\\_BarrickCortezRefractoryOre\\_NaAmResourceReport\\_Final\\_508.pdf](https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142398/174811/20180423_BarrickCortezRefractoryOre_NaAmResourceReport_Final_508.pdf).

Tetra Tech, Inc. 2018. Noise Resource Report for the Barrick Cortez, Inc. – Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application. Available at [https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142403/174816/20180423\\_BarrickCortez\\_RefractoryOre\\_NoiseResourceReport\\_Final\\_508.pdf](https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142403/174816/20180423_BarrickCortez_RefractoryOre_NoiseResourceReport_Final_508.pdf).

Tetra Tech, Inc. 2018. Social and Economic Values and Environmental Justice Resource Report for the Barrick Cortez, Inc. – Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application. Available at [https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142399/174812/20180423\\_BarrickCortezRefractoryOre\\_SocialEJResourceReport\\_Final\\_508.pdf](https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142399/174812/20180423_BarrickCortezRefractoryOre_SocialEJResourceReport_Final_508.pdf).

Tetra Tech, Inc. 2018. Traffic and Human Safety Resource Report for the Barrick Cortez, Inc. – Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application. Available at [https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142400/174813/20180423\\_BarrickCortezRefractoryOre\\_TrafficHumanSafetyResourceReport\\_Final\\_508.pdf](https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142400/174813/20180423_BarrickCortezRefractoryOre_TrafficHumanSafetyResourceReport_Final_508.pdf).

Tetra Tech, Inc. 2018. Wastes, Hazardous or Solid Resource Report for the Barrick Cortez, Inc. – Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application. Available at [https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142401/174814/20180423\\_BarrickCortezRefractoryOre\\_WastesResourceReport\\_Final\\_508.pdf](https://eplanning.blm.gov/epl-front-office/projects/nepa/105663/142401/174814/20180423_BarrickCortezRefractoryOre_WastesResourceReport_Final_508.pdf).

Tetra Tech, Inc. 2018. General Wildlife and Special Status Animal Species Resource Report for the Barrick Cortez, Inc. – Cortez Refractory Ore Amendment to the Plan of Operations (NVN-067575 [18-1A]) and Reclamation Permit Application. Available at <https://eplanning.blm.gov/epl-front->

[office/projects/nepa/105663/142402/174815/20180423 BarrickCortezRefractoryOre WildlifeResourceReport Final 508.pdf.](#)