

**DESERT TORTOISE COUNCIL**

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**Via email and BLM NEPA ePlanning Portal**

March 30, 2025

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RE: Rogers Wash Mine Plan of Operations Environmental Assessment (DOI-BLM-AZ-P010-2024-0017-EA)

Dear Mr. Demko and Mr. Holden,

The Desert Tortoise Council (Council) is a non-profit organization comprised of hundreds of professionals and laypersons who share a common concern for wild desert tortoises and a commitment to advancing the public's understanding of desert tortoise species. Established in 1975 to promote conservation of tortoises in the deserts of the southwestern United States and northern Mexico, the Council routinely provides information and other forms of assistance to individuals, organizations, and regulatory agencies on matters potentially affecting desert tortoises within their geographic ranges.

Both our physical and email addresses are provided above in our letterhead for your use when providing future correspondence to us. When given a choice, we prefer to receive emails for future correspondence, as mail delivered via the U.S. Postal Service may take several days to be delivered. Email is an "environmentally friendlier way" of receiving correspondence and documents rather than "snail mail."

We appreciate this opportunity to provide comments on the above-referenced project. Given the location of the proposed action in habitats occupied by the Sonoran desert tortoise (*Gopherus morafkai*) (synonymous with Morafka's desert tortoise), our comments include recommendations intended to enhance protection of this species and its habitat during activities that may be authorized by the Bureau of Land Management (BLM), which we recommend be added to terms and conditions in the authorizing documents [e.g., issuance of grazing authorization, National Environmental Policy Act (NEPA) decision document] for the proposed action as appropriate. Please accept, carefully review, and include the Council's following comments and attachment for the proposed action in the relevant project file.

The International Union for Conservation of Nature's (IUCN) Species Survival Commission, Tortoise and Freshwater Turtle Specialist Group, now considers the Sonoran desert tortoise, located in Arizona and Sonora, Mexico, to be Vulnerable at this time, but nearly qualifies as Endangered (Averill-Murray et al. 2023). "Steep declines of approximately 54% have occurred in recent years in several formally monitored local subpopulations in Arizona." "Despite evidence that several subpopulations have stabilized or increased, survival rates are predicted to decline with future drought conditions, which are expected to intensify with global climate change." In Mexico, "patterns of rainfall and drought across Sonora mirror those in Arizona and suggest that Sonoran subpopulations likely increased and decreased similarly over time." According to the IUCN, this designation of Vulnerable means that the species is "considered to be facing a high rate of extinction in the wild" and is one step above endangered.

The IUCN identified several threats to the survival of the Sonoran desert tortoise including residential, commercial, and industrial development; ranching and farming; roads and railroads; hunting and trapping; recreational activities; wildfires and fire suppression activities; invasive non-native plant species; and drought/temperature extremes from climate change. The proposed project directly deals with management of ranching and indirectly deals with wildlife, invasive non-native plant species, and drought/temperature extremes from climate change.

### **Description of the Proposed Action and Alternatives**

Rattler Resources, LLC. (Applicant) proposes to develop, operate, and maintain a surface placer mining operation within Rogers Wash. The Applicant has 17 unpatented mining claims within the proposed project site. The operation would mine gold-bearing gravels from alluvial placer deposits and gravity process the ore on site. Mining may include other precious and base metals, strategic minerals, and rare-earth elements.

The boundary of the Applicant's proposed Mining Plan of Operations (MPO) encompasses about 195 acres of public land managed by the BLM. The proposed project site boundary (claim ownership boundary) encompasses approximately 330 acres of BLM-managed land. Within the 330-acre project site boundary, the Anticipated Area of Disturbance (AAD) is projected to be approximately 95.5 acres.

BLM described and analyzed one action alternative in addition to the No Action Alternative.

**Proposed Action Alternative:** The proposed mining project would be completed in two phases. Phase I would include exploration and mining in the Upper Rogers Wash, setting up and operating a wash plant, and connecting the existing on-site water wells to the wash plant with flexible pipeline placed on the ground surface. Phase II would include exploration and mining in Lower Rogers Wash, construction of a haul road to connect existing roads in Phase I, and operation of the processing wash plant used in Phase I. Prior to and concurrent with mining, the proposed mine areas would be explored to identify priority ore zones. Trenches or pits would be excavated, and bulk samples processed to determine concentrations of gold and other materials.

The Applicant proposes to process up to 100 cubic yards (cy; approximately 170 tons) of gold-bearing native material (ore) per hour. Extraction mining would occur in longitudinal passes through the sedimentary materials to a maximum depth of approximately 50 feet below ground surface. Washed native materials from the wash process area would be used to reclaim mining disturbance concurrent with mining operations. Implementation of Phase I would disturb up to approximately 79.4 acres, and Phase II up to approximately 16.1 acres. The 5-acre process area is proposed to contain a mechanical gold-recovery ore wash plant with appropriately sized water storage pond, access road, and ore stockpile area for ore and washed materials and would be located within the upper area of Rogers Wash.

Mining disturbance would be reclaimed concurrently by using spent ore to backfill mine excavations. Disturbed ground that is not backfilled and recontoured would be limited to less than 45 acres within both mining phases, plus the 5-acre process area, for a total of 50 acres.

Reclamation grading and contouring activities would mimic the pre-disturbance topography in an effort to maintain the natural/seasonal flows of Rogers Wash. Topsoil would be removed, stockpiled, and reserved for future reclamation. A re-seeding schedule would be implemented to bring the reclaimed areas back into vegetated compliance. If it is determined that irrigation is necessary for seed establishment, it would be provided.

The project site is located approximately 5 miles southeast of Wickenburg and 47 miles northwest of Phoenix in Maricopa County, Arizona. Access to the project site is via U.S. Highway 60 traveling approximately 1.9 miles east and southeast on West San Domingo Peak Trail to the Project site. The proposed project would be implemented during a 10-year period, with three years for reclamation and establishment of vegetation.

**No Action Alternative:** The Mining Plan of Operations would not be approved. There would be no placer mining activity on public lands by the Applicant within the mining claim areas following the completion of the existing and approved BLM mining exploration authorization plan.

## Alternatives Considered but Eliminated

BLM stated that, “[t]he alternatives carried forward represent those identified as reasonable and are based on the issues that were identified by the IDT [interdisciplinary team]. There are no currently identified unique circumstances, concerns, interests, or resource values that would suggest a need for other action alternatives.”

## Comments on the Environmental Assessment

**Information Missing from the EA:** The Table of Contents lists “Figures,” “Appendix A – Aerial Mapping.,” “Appendix B – Mine Plan Of Operations,” “Appendix C – Native Plant Count ,” “Appendix D – Biological Evaluation Report,” And “Appendix E – Ordinary High-Water Report.” We were unable to find these appendices at the end of the EA (although we found the title pages for each one) or listed as separate documents on the BLM NEPA ePlanning web page (<https://eplanning.blm.gov/eplanning-ui/project/2032342/510>). These appendices were referred to in the body of the EA. Please see our comment below under “Vegetation Resources, Affected Environment” for an example of BLM’s referral in the EA to information in an appendix. The exception was the Mine Plan of Operations that was included and labeled as a separate document on the BLM NEPA ePlanning webpage. With no figures provided in the EA even though BLM referred to them in the body of the EA document, and no appendices provided in the EA or delineated elsewhere on the BLM NEPA ePlanning webpage for the proposed project, the public had no opportunity to review and comment on the EA with the appendices.

The Council requests that BLM reannounce the availability of the public comment period for this proposed project and include all information from the Table of Contents of the EA in the EA.

**1.5 Compliance with BLM Land Use Plan and 1.6. Relationship to Statutes, Regulations, or Other Plans:** “ The Proposed Action conforms to the BLM Bradshaw-Harquahala Resource Management Plan (BLM; 2010) and Final Environmental Impact Statement, Record of Decision approved in 2010.”

**Compliance with the Sonoran Desert Tortoise Candidate Conservation Agreement:**(USFWS et al. 2015). The Bradshaw-Harquahala Resource Management Plan (RMP) was issued by BLM in 2010, five years prior to the Sonoran Desert Candidate Conservation Agreement (Agreement) (USFWS et al. 2015). BLM is a signatory to this Agreement. This RMP that was approved restricts only saleable minerals material disposal on floodplains of riparian areas and in areas where disposal would result in a net loss of Sonoran Desert Tortoise habitat. The proposed Mine Plan of Operations is not for saleable minerals. Thus, it appears that BLM has no requirements for mining exploration or mining operations for locatable minerals (hardrock and placer mining) in this RMP to demonstrate compliance with the CCA and conserving the tortoise. The Council requests that BLM demonstrate how the implementation of the proposed project complies with its commitments to the tortoise in the Agreement.

**Compliance with the Federal Land Policy and Management Act (FLPMA):** FLPMA directs BLM to manage public lands that consider the long-term needs of future generations for renewable and

non-renewable resources, and to take any action necessary to prevent unnecessary or undue degradation of the lands. FLPMA requires BLM to manage public lands “on the basis of multiple use and sustained yield.” The term “sustained yield” means the achievement and maintenance in perpetuity of a high-level of annual or regular periodic output of the various renewable resources of the public lands consistent with multiple use.

We found no information in this section of the EA that explained how BLM is complying with these requirements of FLPMA. Rather, BLM states only that “Federal regulations require that mine plans (43 CFR 3809.411) under the FLPMA be analyzed in accordance with the National Environmental Policy Act (NEPA)<sup>1</sup>. BLM retains responsibility for compliance with NEPA . . .” In the Environmental Impacts section of the EA, we found no explanation of how the proposed Mine Plan of Operations and proposed mitigation would comply with the management requirements for the tortoise/tortoise habitat under FLPMA to manage for multiple use *and* sustained yield [emphasis added] for renewable resources including the tortoise and its habitat. In addition, we found no information in the EA that described how the proposed actions when implemented would prevent unnecessary or undue degradation of the lands particularly to the tortoise and tortoise habitat.

Compliance with the National Environmental Policy Act (NEPA): “The BLM verifies that it has complied with the requirements of NEPA, including the Department’s regulations and procedures implementing NEPA at 43 C.F.R. Part 46 and Part 516 of the Departmental Manual, consistent with the President’s January 2025 Order and Memorandum.” This was the only verbiage in this section that mentioned NEPA compliance. Unfortunately, this verbiage does not demonstrate that BLM’s EA complies with NEPA “to promote efforts which will prevent or eliminate damage to the environment.”

Further, we found no information that BLM complied with the NEPA requirement that “it is the continuing policy of the Federal Government, in cooperation with State and local governments, and *other concerned public and private organizations* [emphasis added], to use all practicable means and measures, including financial and technical assistance, in a manner calculated to foster and promote the general welfare, to create and maintain conditions under which man and nature can exist in productive harmony, and fulfill the social, economic, and other requirements of present and future generations of Americans.”

The Council received no notification from the BLM about the availability of this EA for public review and comment. The Council has continuously requested that the BLM contact us directly as an Affected Interest for all projects that may affect desert tortoises. This includes the Sonoran desert tortoise. We discovered accidentally the availability of this EA when we were searching for other information on the BLM’s website. Our formal request of November 12, 2019 that was mailed to Leon Thomas, District Manager of the BLM’s Phoenix District is attached as a reminder. In addition, in all the Council’s comment letters to BLM for the last several years, we stated “we reiterate that the Desert Tortoise Council wants to be identified as an Affected Interest for this and all other projects funded, authorized, or carried out by the BLM that may affect species of desert tortoises, and that any subsequent environmental documentation for this project is provided to us at the contact information listed above.” The contact information includes the email address for

the Council's Ecosystem Advisory Committee. During the past few years, we have carbon copied BLM's Arizona State Director Raymond Suazo on many of the Council's letters that commented on BLM proposed projects in Arizona with the same request reiterated in these letters.

We are copying this letter to BLM Arizona State Director Suazo, with the expectation that his office will be responsive to our ongoing requests and that he will direct his staff, district managers, and field managers to contact the Council in a timely manner when BLM is proposing actions in the range of desert tortoise in Arizona that are subject to NEPA compliance. We request that BLM send a brief electronic correspondence to the Council about the availability of these proposed projects at the beginning of the applicable public comment period/scoping period to the email address on our letterhead.

**Table 2. Environmental Protection Measures and 2.4.1. Design Features:** BLM describes actions that the Applicant would implement to mitigate impacts to natural resources. Some of these would avoid or minimize direct impacts to the tortoise, for example:

- 1) construct excavations with a sloped end for easy egress or install adequate fencing to preclude access to the public, wildlife, or livestock;
- 2) fence holding ponds in accordance Arizona Game and Fish Department (AZGFD) fencing guidelines; inspect holding ponds daily to prevent wildlife from inadvertently being trapped;
- 3) cover drill holes or other open excavations if left open overnight to avoid wildlife entrapment;
- 4) ensure wildlife do not have access to artificial water sources and holding ponds through wildlife-proof and/or snow fencing;
- 5) avoid conducting new disturbance (i.e., disturbance on previously undisturbed ground) from January 15 through August 31;
- 6) if vegetation removal is required during the migratory bird breeding season, conduct a site survey to locate active nests and establish appropriate buffers around active nests;
- 7) provide environmental awareness training to all personnel and contractors prior to conducting onsite work; collect waste in approved trash bins and/or containers and dispose of waste regularly in a state, federal, or local designated site).

The Council recommends that some of these Environmental Protection Measures be modified to provide mitigation for the tortoise. These modifications include:

- 1) examining excavations daily for the presence of wildlife including the tortoise and removing and releasing wildlife safely before commencing surface disturbance work;
- 2) fencing holding ponds and other artificial waters associated with the proposed project following Arizona Department of Transportation (ADOT) (2005) fencing guidelines [https://azdot.gov/sites/default/files/2019/06/detail\\_f-fencing.pdf](https://azdot.gov/sites/default/files/2019/06/detail_f-fencing.pdf) such that animals that dig (e.g., tortoises) are not able to dig under the fencing or climb over fencing to access the other side;
- 4) inspecting the fencing around holding ponds daily to ensure there are no breaches, and repair fencing immediately when breaches or damage is found;
- 6) conducting site surveys for tortoises in addition to migratory birds prior to imitating surface disturbance or vegetation removal;

- 7) ensuring that environmental awareness training includes information on the biology, ecology, and behavior of the tortoise and that immediately before moving any vehicles or equipment at the project site, all personnel and contractors will look under vehicles and equipment for tortoises.

In addition, we recommend that clearance surveys be conducted for tortoises immediately prior to the initiation of ground disturbance. The AZGFD has a survey protocol for pre-project surveys (AZGFD 2010) with the purpose of determining whether tortoises are likely to occur/have occurred on the project site. However, we are not aware that AZGFD has a protocol for conducting clearance surveys immediately before surface disturbance will occur. Usually several months elapse between the pre-project survey for tortoises and the initiation of surface disturbance activities. This time would allow tortoises to move onto and use the site even if none were present/detected during the pre-project survey.

Because take of a tortoise is not allowed in Arizona (i.e., “since 1988, it has been against Arizona State law to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect” the Sonoran desert tortoise (<https://www.azgfd.com/species/desert-tortoise-2/>)), we recommend that the clearance survey protocol for the Mojave desert tortoise (USFWS 2009) be conducted to ensure that tortoises are not using the project site at the time of initial surface disturbance and are not harmed or killed. If a tortoise is seen during this clearance survey or during the implementation of the project, it would be moved out of the project area following the Guidelines for Handling Sonoran Desert Tortoises Encountered on Development Projects (AZGFD 2014).

In addition, we recommend that dogs not be allowed on the project site (Berry et al. 2014) and that firearms not be allowed (Berry et al. 2006, Brooks and Esque 2002) except for personnel hired specifically for implementing security of the site.

**3.3.1. Vegetation Resources, Affected Environment:** “Native plant counts were conducted by Cornerstone Environmental in May and June 2023 (Appendix C – Native Plant Count).” We found no Appendix C at the end of the EA or listed as a separate document on the “Documents” page for this project on BLM’s NEPA ePlanning web site. Please include this appendix at the end of the EA or list it as a separate document on the BLM NEPA ePlanning webpage for this project.

**3.3.2. Vegetation Resources, Environmental Consequences:** “Reclaimed areas would be seeded with seed mix, application rates, and seeding methods that are recommended and approved by the BLM.”

In this section, BLM describes some of the impacts to the vegetation resources at the project site but we found no citations from the scientific literature to support these descriptions. For example, BLM states, “Reclaimed areas would be seeded with seed mix, application rates, and seeding methods that are recommended and approved by the BLM.” This statement combined with information provided earlier in the EA on the 3 years of time allotted for reclamation and revegetation indicates that BLM is not using information available on the times and methods required for successful revegetation.

To increase the likelihood of success, BLM should ensure that the reclamation/revegetation plan includes the latest information from the scientific literature on restoration of vegetation in the Sonoran Desert. This is needed to comply with FLPMA's requirement to take any action necessary to prevent unnecessary or undue degradation of the lands, which would include degradation of vegetation resources, and for the revegetation efforts to have a high rate of success. Planting nursery-grown perennials (outplanting) and seeding are the two main methods for revegetating severely disturbed soil. Abella and Berry (2016) reported that in the Mojave Desert, outplanting is more reliable than seeding for establishing perennial plants any given year when using good planting stock and proper plant care. In contrast, seeding of native annuals is more successful when reducing herbivory by nonnative animals and carefully timing herbicide applications for non-native plants (Abella and Berry 2016). Abella et al. (2023) analyzed 50 revegetation studies in the Mojave and Western Sonoran deserts and provide recommendations for improving soil features (e.g., biocrusts), increasing cover of native perennial and annual plants, enhancing native seed retention and seed banks, and reducing risk of fires to conserve mature shrubland habitat.

Revegetation should include establishing annual native vegetation with a diversity of these species. Many wildlife species that are lower on the food web derive their water and nutrients from herbaceous annuals. The plant pallet used in this restoration should include native annual species that provide high quality nutrition for the tortoise. In spring and summer, adult tortoises consumed predominantly annual legumes, such as lupines (*Lupinus sparsiflorus*, *L. concinnus*), lotus or deervetch (*Lotus humistratus*, *L. strigosus*, *L. salsuginosus*) and milkvetch (*Astragalus nuttallianus*). These species were characteristically high in water and protein content while low in potassium (i.e., low PEP (potassium excretion potential) indices in the spring (Ofstedal et al. 2007). Little perennial material was consumed (Ofstedal et al. 2007). In the summer, plants consumed in the greatest quantity in summer were moderate in water content, moderate to high in protein, low to moderate in potassium, and low to moderate in PEP (Ofstedal et al. 2007). Juvenile tortoises had a narrower dietary breadth in species selected and consumed and showed more dietary specialization relative to adult tortoises (Murray and Wolf 2013). The reduced gut capacity and shorter retention times found in juvenile tortoises, as well as their smaller and weaker mandibles limits their foraging to relatively low-fiber, leafy C<sub>3</sub> forbs whose availability may be temporally and spatially restricted (Murray and Wolf 2013) by factors such as precipitation, land use, or competition from non-native plant species. These dietary needs of the tortoise should be included in the development of a plant palette for vegetation restoration at the project site and in other areas of tortoise habitat.

BLM has assigned a restoration period of three years and that includes the surface recontouring activities. However, restoration of native vegetation in the Sonoran Desert is likely to take much longer. As a comparison, in the Mojave Desert Abella (2010) reported that the regeneration times to restore cover of vegetation takes on average 76 years while return to species composition is an estimated 215 years. We expect that this time would be reduced somewhat because of activities conducted by the Applicant to assist the restoration process (i.e., reseeding). However, it would not be reduced to the 3 years that BLM indicates in the EA. BLM should revise this time with one that uses other successful revegetation efforts in the Sonoran Desert near the project site.



We did not find a reclamation/revegetation plan in the EA; we know that certain protected species (primarily cacti) will likely be transplanted and that BLM mentioned reseeding in the EA as a revegetation method. Also not found in the EA is information on the length of time required to monitor the revegetation, the criteria for measuring success of the revegetation, the methods used to monitor plant growth from the revegetation, and reporting requirements. If the revegetation is not successful, the Applicant should be required to implement the revegetation efforts until they are successful.

The Council requests that BLM require the Applicant to post a performance bond prior to the initiation of surface disturbance activities and that it is structured in such a manner that BLM will be able to access those funds to pay for the reclamation and revegetation of the site, in the event that the project owner becomes insolvent. In calculating the amount of this bond BLM should calculate an inflation rate because the reclamation and most revegetation activities would not occur for several years and would take several years to implement successfully. We are aware of situations on BLM land where applicants have obtained a ROW or lease, posted a bond, conducted their work, and abandoned the site because the cost of reclamation and revegetation was greater than the amount of the bond that BLM required. Consequently, these sites were not restored to their required condition because the bond that was required was inadequate. Please provide this information in the reclamation/revegetation plan and assurances that the bond would be adequate to cover the reclamation, revegetation, monitoring, and adaptive management costs if the Applicant is unable to implement this plan.

Given FLPMA's mandate regarding degradation of the land, the criteria for measuring success should be high and should include plant and animal biodiversity including the needs of juvenile and adult tortoises. Please revise the EA to include this information.

"Rattler would be responsible for controlling and maintaining noxious weeds within the Project area until the reclamation activities have been determined to be successful by BLM." We hope this is an error and that BLM is not requiring the Applicant to maintain noxious weeds in the project area.

In addition, we did not find a requirement that the Applicant remove non-native invasive plant species from the project site. BLM should require this to comply with Executive Order 13112 - Invasive Species. In this directive BLM is required to "not authorize, fund, or carry out actions that it believes are likely to cause or promote the introduction or spread of invasive species . . ." Please add requirements to the EA that the Applicant will implement measures to ensure that all vehicles, equipment, and supplies brought to the project site are free of seeds or plant propagules of invasive non-native species, to regularly monitor the project site, including access routes, for the presence of non-native invasive plant species, and that if found, they will be promptly removed by methods approved by BLM and other relevant federal and state agencies.

**3.4.2. Special Status Species, Environmental Consequences:** "The Sonoran Desert Tortoise may likely be affected through the disturbance and potential loss of approximately 95.5 acres of habitat." This is the only information we found in the EA that describes the impacts to the tortoise. We found no analysis of this impact to the species. According to BLM's NEPA Handbook, impacts

that are to be described and analyzed in an environmental assessment include direct, indirect, and cumulative impacts to the resource issue (BLM 2008). For the tortoise, a resource issue identified by BLM in the EA, this would include direct mortality and injury from mining activities; unauthorized collection; increased predation from new human subsidies of food, water, and garbage; surface disturbance that promotes the establishment and proliferation of non-native annual species; competition with native plants species; reduction in the availability of native plants species for adequate nutrition and water balance for the survival of juvenile, adult, and reproducing female tortoises; increased traffic on roads to and in the project are expanding the “road effect zone” and associated mortality; higher fuel loads of non-native plants leading to greater fire frequency, intensity, and size; and more.

Specific to gold mining, gold is frequently found associated with other heavy metals/rare earth elements including arsenic, chromium, lithium, nickel, antimony, and mercury. BLM affirms this by stating in the EA that the Applicant would be looking for “concentrations of gold and other REE (rare earth element) materials.” The mining process would unearth and expose these buried heavy metals and REE materials. This exposure would make these previously buried heavy metals and REE materials subject to transport downgradient by precipitation and downwind by aeolian activity and deposited on/near the soil’s surface. At a gold mining area in the Mojave Desert, soil anomalies for arsenic, gold, cadmium, mercury, antimony, and tungsten extend as far as 15 km (9.3 miles) outward from the present area of mining. Soils containing anomalous Hg were found at least 6 km (3.7 miles) away from tailings. Elevated levels of these heavy metals were found in herbaceous plants growing in the area. Chaffe and Berry (2006) attributed the source of these elevated levels of metals to mining activities that produced dust contaminated with these metals. This contaminated dust was/continues to be distributed by wind, vehicles, and rainfall including flash flooding. The anomalous concentrations of arsenic and mercury may be the source of elevated levels of these elements found in ill tortoises from the region (Chaffee and Berry 2006). Thus, the proposed project may release heavy metals and rare earth elements to the human environment where plants, animals, and people are now exposed to them.

We were unable to find a discussion/analysis of effects of exposure to tortoises from mining activities that unearth, spread, and expose tortoises/tortoise habitat to environmental contaminants/heavy metals including arsenic, from inhalation, ingestion (lithophagy and geophagy), surface contact, foraging on contaminated plants, etc. Please revise the EA to include these impacts to the tortoise/tortoise habitat and that these impacts can extend well beyond the project site.

The Council requests that these direct and indirect impacts be analyzed in the EA for the tortoise. As part of this analysis the Council requests that BLM’s “Advancing Science in the BLM, An Implementation Strategy” (BLM 2015a,b) be applied in the analysis of these impacts in the EA and in BLM’s decisionmaking for the proposed project. This document directs BLM to “deliberately pursues mission-oriented science and enables managers and staff to apply that science in decision making and adaptive management.” The goal for BLM is to “consistently use science as one of the critical inputs in its decision-making processes, at every level and in every program” (BLM 2015a).

Because of the numerous direct and indirect impacts that we listed above that are likely to occur from implementation of the proposed project and for which we found no discussion and analysis in the EA, we request that BLM (1) revise the EA to include this and other relevant information; (2) comply with NEPA and the BLM NEPA Handbook with respect to analyzing the direct, indirect, and cumulative impacts of the proposed project to the tortoise and tortoise habitat; (3) comply with FLPMA and require the Applicant to avoid undue or unnecessary degradation of the land; and (4) comply with BLM’s “Advancing Science in the BLM, An Implementation Strategy.”

“If a Sonoran Desert Tortoise is found on site, the tortoise would be allowed to move away from vehicle/equipment and operations on its own. If the tortoise does not leave the operations area, the BLM would be consulted and the AZGFD guidelines for handling Sonoran Desert tortoises Encountered on Development Projects would be utilized.” This is the only mitigation that we found in the EA that BLM proposed for the destruction of 95 acres of tortoise habitat and the other direct and indirect impacts to the tortoise that we listed above from the implementation of the proposed project.

We remind BLM that there are at least five documents that direct BLM to implement mitigation in addition to moving tortoises from the project site. They include Compensation for the Desert Tortoise (Desert Tortoise MOG 1991); Sonoran Desert Candidate Conservation Agreement (USFWS et al. 2015); BLM’s Mitigation Policy, Handbook, and Manual (BLM 2022, a, b, c); Habitat Connectivity on Public Lands Instruction Memorandum 2023-005 (BLM 2022); and BLM’s Special Status Species Management Handbook 6840 (BLM 2024).

“Compensation for the Desert Tortoise” as applied to BLM land describes the process that BLM would implement to compensate for habitat lost from projects approved and implements on BLM lands. BLM should explain how the mitigation proposed in the EA complies with “Compensation for the Desert Tortoise” and if it does not modify the EA to ensure compliance.

As a signatory to the Sonoran Desert Candidate Conservation Agreement, BLM committed to implementing:

- (1) BLM Manual 6840 (BLM 2024) that establishes specific procedures for managing the Sonoran desert tortoise as it is a BLM sensitive species, with the goal of conserving the Sonoran desert tortoise and its habitat on BLM-managed lands in cooperation with other agencies;
- (2) landscape level conservation measures (e.g., identifying areas of potential conflict between agency mission and Sonoran desert tortoise habitat and identifying and reducing or otherwise mitigating dispersal barriers between Sonoran desert tortoise populations, etc.); and
- (3) local level conservation measures (e.g., considering the effects of actions on the Sonoran desert tortoise during the planning process, and avoiding or minimizing impacts, or implementing mitigation measures to offset impacts to tortoise populations and habitat where practical and feasible, avoid, where practicable, or otherwise minimize or mitigate adverse effects of actions that could result in isolation of known Sonoran desert tortoise populations and/or landscape-level fragmentation of Sonoran desert tortoise habitat, etc.).

These three measures may only be effectively implemented when BLM knows the status and trend of the tortoise populations on the lands it manages and where the direct and indirect impacts to the tortoise are occurring, especially at a landscape level, and thus affecting tortoise populations. The Council is concerned about projects and management decisions that contribute to degradation and loss of tortoise habitat (including habitat needed for connectivity among populations) (BLM 2022) from habitat fragmentation, activities that introduce and spread non-native plant species, promote fuel for or ignition sources for wildfires, etc., which result in a reduction in tortoises/tortoise habitat. To conduct an accurate regional or cumulative effects analysis and comply with the Agreement, BLM would need to track these and other impacts to the tortoise at a local and landscape level using a geospatial tracking system for all management actions and projects that it authorizes, funds, or implements. Approval of mine plans of operation and their impacts to tortoise/tortoise habitats should be added to BLM's geospatial tracking system.

In the Agreement, BLM says, that through [its] Resource Management Plans (RMPs), BLM managers are directed to “[a]void, minimize or mitigate impacts associated with *all BLM authorized activities* [emphasis added] including mineral material sales, rights-of-way, recreational use, travel management, and livestock grazing through project design and modifications to allowable uses in order to achieve Sonoran desert tortoise management objectives” (USFWS et al. 2015). BLM also committed to making planning decisions that result in “managing for no net loss in quantity and quality of SDT habitat to the extent practicable and using offsite mitigation (compensation) for unavoidable residual habitat loss” (USFWS et al. 2015).

BLM should explain and analyze in the EA how it will mitigate (avoid, minimize, and/or compensate) direct, indirect, and cumulative impacts associated with the proposed project at a local and landscape level to achieve Sonoran desert management objectives identified in the Agreement. BLM should also explain how it will comply with its Rangeland Plan (BLM 1988) for the desert tortoise.

In BLM's Mitigation Manual (BLM 2021), “BLM will follow the policy in this manual if the mitigation is necessary to comply with the performance standards in 43 Code of Federal Regulations 3809.420, including paragraph (a)(4) (“You must take mitigation measures specified by BLM to protect public lands.”), or otherwise to prevent unnecessary or undue degradation. The BLM may also identify additional mitigation measures to address potential impacts of approving the plan of operations that may not necessarily rise to the level of constituting unnecessary or undue degradation, including mitigation sited outside the plan of operations boundary. These mitigation measures may be incorporated in the plan of operations decision with the agreement of the operator, along with any mitigation proposed by the operator. Even though these mitigation measures would not be required to prevent unnecessary or undue degradation, they are enforceable if included in the plan of operations decision with the operator's consent.” BLM should require the Applicant to fully offset the loss of 95 acres of tortoise habitat.

BLM's Habitat Connectivity on Public Lands Instruction Memorandum (BLM 2022) directs BLM to ensure that habitat connectivity, permeability and resilience is restored, maintained, improved, and/or conserved on public lands. To accomplish this outcome, BLM will work with state and Tribal wildlife managers as well as other stakeholders to assess data regarding connectivity, permeability, and resilience and, based on that assessment, identify where to focus management that best supports priority species. BLM staff are "encouraged to work with a diverse scientific field of experts to expand research on habitat connectivity on public lands to best inform the assessment of habitat connectivity."

The Council is concerned that the proposed project is located in/along a wash. Deeply incised washes are associated with tortoise shelters (Sutor 2024). Vegetation, moderately rugged terrain, and areas with incised desert washes may encourage tortoise movement, whereas bare earth, high vegetation cover, flat and extremely rugged terrain, areas far from incised washes, and low-traffic roads may restrict or discourage movement typical of range-resident tortoises (Sutor et al. 2024). Averill-Murray and Riedle (2024) reported that tortoises at one study area selected habitat with greater canopy cover, absence of cattle activity, and closer proximity to washes and low-traffic gravel roads than was available across their home ranges (Grandmaison et al. 2010). Washes provide access to caliche caves used as shelter by tortoises. The proposed project that is located in and along a wash is likely to impede tortoise movement through the wash and may contribute to isolating tortoises located upgradient from the project site from those located downgradient. This impediment would continue for decades while the mine is in operation and until the revegetation is completed to near pre-project conditions.

The Council requests that BLM demonstrate in the EA that it has worked with a diverse scientific field of experts and assessed data regarding connectivity, permeability, and resilience for the tortoise, how the results of that assessment apply to the tortoise in the vicinity of the project site, how implementation of the project would impact the connectivity, permeability, and resilience of the tortoise using this assessment, and how BLM would require these impacts be effectively mitigated to offset these impacts.

BLM's recently revised its Special Status Species Management Handbook 6840 (BLM 2024). This policy established an agencywide "emphasis on proactive, landscape- and ecosystem-level, scientifically informed conservation and recovery of special status species and their habitats." "Thus, as a matter of policy, the BLM endeavors to apply the proactive coordination and recovery measures to all BLM special status species, not only species listed under the ESA. Proactive conservation and recovery means that the agency, at all levels and across all BLM programs as allowable by law, is actively engaged in protecting, restoring, and improving special status species populations and habitats."

With respect to the tortoise, a special status species, this policy directs BLM staff, in the development and implementation of proactive conservation and recovery efforts, to achieve sustainable and improving populations and habitats, thereby precluding the need to list sensitive species; implement conservation agreements/strategies through land use planning and implementation-level activity plans; ensure that implementation-level activity plans and land use authorizations protect and restore special status species and their habitats through terms and

conditions, or necessary denial of discretionary action applications that may impact special status species.

In the EA BLM should demonstrate how it is complying with this policy with respect to the tortoise/tortoise habitat.

In addition, the Council strongly recommends that BLM implement the Recommended Standard Mitigation Measures for Projects in Sonoran Desert Tortoise Habitat (Arizona Interagency Desert Tortoise Team 2008). The mitigation should fully offset the direct, indirect, and cumulative impacts of the proposed project to the tortoise/tortoise habitat. This mitigation includes the temporal loss (likely decades) of the wash's ecological structure and function at the project site and downgradient. The Applicant should be required to mitigate this temporal loss through additional compensation implemented as off-site mitigation.

We appreciate this opportunity to provide the above comments and trust they will help protect tortoises during any resulting authorized activities. Herein, we reiterate that the Council wants to be identified as an Affected Interest for this and all other projects funded, authorized, or carried out by the BLM that may affect desert tortoises, and that any subsequent environmental documentation for this project is provided to us at the contact information listed above. Additionally, we ask that you notify the DTC at [eac@deserttortoise.org](mailto:eac@deserttortoise.org) of any proposed projects that BLM may authorize, fund, or carry out in the range of any species of desert tortoise in the southwestern United States (i.e., *Gopherus agassizii*, *G. morafkai*, *G. berlandieri*, *G. flavomarginatus*) so we may comment on it to ensure BLM fully considers and implements actions to conserve these tortoises as part of its directive to conserve biodiversity on lands managed by BLM.

Please respond in an email that you have received this comment letter so we can be sure our concerns have been registered with the appropriate personnel and office for this Project.

Respectfully,



Edward L. LaRue, Jr., M.S.  
Desert Tortoise Council, Ecosystems Advisory Committee, Chairperson

Attachment

Cc: Raymond Suazo, Arizona State Director, Bureau of Land Management, [blm\\_az\\_asoweb@blm.gov](mailto:blm_az_asoweb@blm.gov)  
Phoenix District Office Manager, Bureau of Land Management, [blm\\_az\\_pdoweb@blm.gov](mailto:blm_az_pdoweb@blm.gov)

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## DESERT TORTOISE COUNCIL

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### CERTIFIED MAIL

November 12, 2019

Anthony (Scott) Feldhausen, District  
Manager  
Gila District Office  
Bureau of Land Management  
3201 East Universal Way  
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William Mack, Jr., District Manager  
Colorado River District  
Bureau of Land Management  
1785 Kiowa Ave  
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Leon Thomas, District Manager  
Phoenix District Office  
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21605 North 7th Avenue  
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Michael Herder, District Manager  
Arizona Strip District  
Bureau of Land Management  
345 East Riverside Drive  
St. George, UT 84790-6714

RE: Reiteration of the Desert Tortoise Council's Previous Requests as An Affected Interest for Notification of Bureau of Land Management Proposed Actions Affecting the Desert Tortoises or Habitats

Dear Mr. Feldhausen, Mr. Thomas, Mr. Mack, and Mr. Herder:

The Desert Tortoise Council (Council) is a non-profit organization comprised of hundreds of professionals and laypersons throughout the United States and other countries. Council members share a common concern for wild desert tortoises and a commitment to advancing the public's understanding of the three species of desert tortoises. Established in 1975 to promote conservation of tortoises in the deserts of the southwestern United States and Mexico, the Council routinely provides information and other forms of assistance to individuals, organizations, and regulatory agencies on matters potentially affecting desert tortoises within their geographic ranges.

The Council has submitted written comments on numerous proposed actions by the Bureau of Land Management (BLM) within the range of two species of desert tortoises (i.e., *Gopherus*

*agassizii* synonymous with “Mojave desert tortoise” and *Gopherus morafkai* synonymous with Sonoran desert tortoise).

In the last few years, the Council provided written comments on numerous BLM proposed actions in the range of the Mojave and Sonoran desert tortoises. Some of these proposed actions in Arizona are listed below:

In 2019:

- 2019/8/16 - Environmental Assessment (DOI-BLM-UT-C030-2017-0063-EA) for Rocky Mountain Power Powerline Upgrade Project and City of St. George Waterline Development Project Red Cliffs National Conservation Area

In 2018:

- 2018/11/29 - Ten West Link Draft Environmental Impact Statement (DEIS) and Draft Resource Management Plan Amendments (DEIS) (DOI-BLM-AZ-C020-2016-0010-EIS)
- 2018/5/08 - Draft Buckeye Hills Travel Management Plan, Pinal and Maricopa Counties, Arizona
- 2018/3/07 - Scoping Comments for the Lower Colorado River Travel Management Plan  
03/07/18
- 2018/2/13 - Environmental Assessment (EA) for the Lower Centennial Complex

In 2016:

- 2016/2/12 - Pakoos Springs Public Use Environmental Assessment (DOI-BLM-AZ-A030-2016-0004-EA)
- 2016/9/22 - Pakoos Springs Public Use Environmental Assessment (DOI-BLM-AZ-A030-2016-0004-EA)

In each comment letter to the BLM, the Council asked “that the Desert Tortoise Council be identified as an Affected Interest for this and all other BLM projects that may affect species of desert tortoises, and that any subsequent environmental documentation for this Project is provided to us at the contact information listed above.” The contact information is contained in the letterhead of these comment letters, [eac@deserttortoise.org](mailto:eac@deserttortoise.org).

The Council believes this language was clear to the BLM and that the Council as an Affected Interest was to be notified of BLM proposed actions that may affect species of desert tortoises. However, the Council did not learn about any of these proposed actions from the BLM, but from several third parties. Given the numerous requests the Council has submitted to project officials at BLM field offices in Arizona in the last few years to be identified as an Affected Interest, we are puzzled as to why we did not (and do not) receive notification from the Gila District Office, the Phoenix District Office, Colorado River District Office, Arizona Strip District Office or any of the field offices within these Districts of any proposed actions on BLM lands in Arizona. Consequently, we are elevating our request to you as the District Managers in Arizona.

Our request for the BLM to notify the Council of these proposed actions is based on federal regulations and BLM’s handbook. According to 40 CFR 1500.2, “federal agencies shall to the fullest extent possible encourage and facilitate public involvement in decisions which affect the

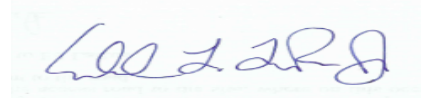
quality of the human environment.” This public involvement is further discussed in 40 CFR 1506.6, which says, “Agencies shall make diligent efforts to involve the public in preparing and implementing their National Environmental Policy Act (NEPA) procedures. The agency should request comments from the public and should *affirmatively solicit comments* [emphasis added] from those persons or organizations who may be interested or affected.”

The BLM NEPA Handbook states, “A primary goal of public involvement is to ensure that all interested and affected parties are aware of your proposed action. Knowing your community well is the first step in determining the interested and affected parties and tribes. You may already have a core list of those interested in and potentially affected by the BLM's proposed actions; this may provide a good starting point” (section 6.9.1). The Handbook also states under Environmental Assessments “The EA must list tribes, individuals, organizations, and agencies consulted (40 CFR 1508.9(b))” (section 8.3.7).

We urge the BLM to comply with these directives. With this letter, the Council requests that you ensure that the BLM notifies the Council in a timely manner (e.g., prior to the first day of the public comment period) of any proposed action in the Gila District, Phoenix District, Colorado River District, or Arizona Strip District that may affect the Mojave desert tortoise, Sonoran desert tortoise or their habitats. This includes any action that may affect, either directly or indirectly, these species. If the BLM is unwilling or unable to do this, we request that it provide a written response to the Council explaining why it is unable to honor this request to comply with federal regulations and the BLM NEPA Handbook.

Should you have any questions regarding this request, please contact me at the contact information on the Council’s letterhead above.

Regards,



Edward L. LaRue, Jr., M.S.  
Desert Tortoise Council, Ecosystems Advisory Committee, Chairperson

cc: Jayme Lopez, Field Manager – Tucson Field Office  
Ed Kender, Field Manager – Lower Sonoran Field Office  
Angie Meece, Acting Field Manager – Hassayampa Field Office  
Amanda Dodson, Field Manager – Kingman Field Office  
Aron King, Field Manager – Yuma Field Office  
Jason West, Field Manager – Lake Havasu Field Office  
Lorraine Christian, Field Manager – Arizona Strip Field Office  
Mark Wimmer, Manager – Grand Canyon-Parashant National Monument

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