COLORADO
Parks and Wildlife
Department of Natural Resources

Steamboat Springs (Area 10) Service Center
PO Box 775777 | 925 Weiss Drive
Steamboat Springs, Colorado 80487
P 970.970.2197

August 9, 2024

Alan Goldich
Routt County Planning Department
136 6th St., Suite 200
Steamboat Springs, Colorado 80477

RE: Trapper Solar Project (Application ID: PL20240046) - Colorado Parks & Wildlife Review and Comments

Dear Mr. Goldich,

Colorado Parks and Wildlife (CPW) appreciate the opportunity to review this Routt County special use permit application for the Trapper Solar Project south of the town of Hayden. As you are aware, CPW has a statutory responsibility to manage all wildlife species in Colorado; this responsibility is embraced and fulfilled through CPW's mission to perpetuate the wildlife resources of the state, to provide a quality state parks system, and to provide enjoyable and sustainable outdoor recreation opportunities that educate and inspire current and future generations to serve as active stewards of Colorado's natural resources. Additionally, the State of Colorado is taking ambitious action to achieve net-zero greenhouse gas emissions by 2050, and 100% clean electricity by 2040.

CPW staff has consulted with the project proponent through several pre-application meetings and conversations dating back to November of 2022. The comments and recommendations below are a reflection of these conversations and data/information that has been provided to CPW through the applicant and the submitted permit application package. We provide these comments for your consideration during review of the special use permit application.

The proposed project location intersects several CPW-mapped high priority wildlife habitats. These include the following: greater sage-grouse priority habitat management area (PHMA), general habitat management area (GHMA), and undesignated habitat; Columbian sharp-tailed grouse production areas, winter range, and lekking area; elk winter concentration area; and mule deer migration corridor. In addition to these formal high priority habitats, the area also provides important habitat for sandhill cranes, ferruginous hawks, amphibians, songbirds, and

small mammals. Lastly, the Colorado State Land Board's State Trust Lands present within the project area are leased by CPW for public access during hunting seasons and would no longer be available following the development of the solar project.

Utility-scale solar development is unique regarding impacts to wildlife due to the National Electric Code requirements for security fencing around these facilities. This security fencing is a barrier for larger species of wildlife and has the potential to block important migratory routes. It is also unknown how other species including sage-grouse will utilize habitat within the project footprint, but it's anticipated that it results in a nearly complete loss of habitat for these species. The most important factor to avoiding impacts to wildlife is making informed siting decisions for these projects. CPW appreciates the applicant's efforts to site this project within areas mostly already disturbed by historic agricultural uses. While current siting of the project minimizes conversion of native intact habitats, CPW still anticipates adverse impacts to various wildlife species in this area.

CPW has prepared the following information regarding some of the most relevant wildlife resources in this region. Additionally, we have prepared a list of recommendations meant to avoid, minimize, and mitigate (offset) the adverse impacts of this proposed project. These specific recommendations have been attached to this comment letter as Attachment A.

Greater Sage-Grouse & Columbian Sharp-Tailed Grouse

Greater sage-grouse (GrSG) and Columbian sharp-tailed grouse are both listed as a Tier 1 Species of Greatest Conservation Need in Colorado.[1] This proposed project will convert roughly 300 acres of GrSG priority habitat management area (PHMA), 1,000 acres of GrSG general habitat management area (GHMA), and 660 acres of CSTG production habitat into industrial solar panel infrastructure. There are limited studies regarding the impacts of solar development on GrSG and CSTG; however, it is known that many grassland grouse species exhibit strong avoidance behavior towards tall structures (i.e. taller than the sagebrush vegetation communities they reside in). It is anticipated that the installation of security fencing and solar panel infrastructure will result in significantly reduced use of these habitats by both species. We have provided recommendations to minimize these impacts, but complete avoidance and minimization of the impacts will not be possible. CPW recommends off-set measures to help alleviate the remaining residual impacts resulting from the project.

Big Game Winter Range and Migration Corridors

The project area receives a considerable amount of seasonal use, including large migratory movements, by multiple big game species. Pronghorn utilize this area year-round while elk and mule deer will use the area during winter months and as a migratory path between higher elevation summer ranges to the east and winter ranges farther west. Security fencing is the biggest impact to big game as it completely precludes passage by these animals. We have worked with RWE to design the fencing in a manner that minimizes entanglement hazards for

[1] Colorado State Wildlife Action Plan (SWAP). 2015. Colorado Parks & Wildlife. https://cpw.state.co.us/Documents/WildlifeSpecies/SWAP/CO_SWAP_FULLVERSION.pdf

wildlife. Additionally, RWE is exploring best management practices to allow animals trapped within fenced areas to escape without human intervention. Lastly, and most importantly, RWE has developed the project layout with multiple movement corridors between fenced areas and solar arrays. CPW has worked with RWE and SWCA to tweak the fencing layout in hope of making these corridors as effective as possible for all big game species. We have also requested that the project proponent work with CPW to install remote wildlife cameras along these corridors following construction to gather data on their use by wildlife. This information will inform CPW on future projects regarding what corridor widths are most effective to facilitate continued big game movement through utility-scale solar projects.

Greater Sandhill Crane Staging Areas

Greater sandhill cranes are also designated as a Tier 1 Species of Greatest Conservation Need by CPW. The agricultural grain fields south of Hayden are used by large numbers of cranes as they migrate north each year. We do not foresee cranes continuing to use areas covered in solar panels, which will result in many acres of lost habitat for this species. We are also not aware of any best management practices that could help alleviate these impacts. Due to these factors, CPW has recommended that RWE make a monetary contribution to the Colorado Crane Conservation Coalition's Crops for Cranes program to help offset the loss of habitat. This program is intended to maintain private land grain crops utilized by migrating cranes, and continue to provide this crucial resource for the species during their annual migrations and breeding activities.

Colorado Parks and Wildlife looks forward to continued collaboration with Routt County on this project proposal. Please let us know if we can provide any additional information that would be helpful during your review process. If you have questions about the project or these comments, please don't hesitate to contact Justin Pollock, District Wildlife Manager, at (970) 629-1247, or Taylor Elm, NW Region Energy Liaison, at (970) 986-9767.

Sincerely,

Kris Middledorf

Kris Middledorf,
Area Wildlife Manager

cc: Justin Pollock, District Wildlife Manager
Libbie Miller, Wildlife Biologist
Eric VanNatta, Wildlife Biologist
Molly West, Land Use Specialist

Attachment A: *CPW Recommendations to Avoid, Minimize & Mitigate Impacts*

Attachment A:

Trapper Solar Project Development Proposal

Colorado Parks & Wildlife Recommendations to Avoid, Minimize, & Mitigate

August 8, 2024

Purpose & Intent: These recommendations provided by CPW reflect the outcome of numerous pre-application consultation meetings and the on-site field tour for the proposed Trapper Solar development project in Routt County. The measures included below have been separated into three categories corresponding with their intent to protect the wildlife resources present within the project area. Following consideration of these measures by RWE and their environmental consultant(s), these recommendations will be submitted to the Routt County planning department for consideration during their review of the special use permit application.

Avoidance Measures:

1. CPW recommends minimizing the amount of ground disturbance by limiting final development to areas that will reduce the need for blading and complete removal of vegetation.
2. To the extent feasible, conduct construction operations outside the period of December 1 to April 30 to avoid impacts to wintering big game and grouse.
3. The extent feasible, conduct construction operations outside the period from March 1 to July 30 within CPW-mapped Columbian sharp-tailed grouse production areas and greater sage-grouse priority habitat management area (PHMA) habitats.

    ** CPW appreciates the applicant's efforts to work with CPW on phased construction and avoiding disruptive activities within sensitive habitats to the maximum extent feasible given the large size of this development proposal.*

Minimization Measures:

1. Utilize the wildlife exclusion fencing design that has been supplied by CPW staff, and contained within Routt County's development code, (i.e., eight-foot woven wire fencing with six-inch wire openings to allow passage by smaller wildlife

species). Preclude the use of barbed wire on the top of fencing to reduce entanglement and collision hazards for wildlife.

- *See Attachment 1 below for specific recommendations on highlighted areas of the proposed development and fencing plan.*

2. Where vegetation remains relatively undisturbed within fenced development areas, consider raising sections of the perimeter fencing off the ground to allow for passage of small wildlife species, potentially including sage-grouse and sharp-tailed grouse. CPW does not know how various species may or may not utilize areas within a solar development; however, this would enhance access for a broader range of species to potentially utilize the developed areas.
3. Inspect fencing and gates on a regular basis to ensure that fence integrity is maintained and there are no openings or potential hazards for wildlife.
4. Where feasible, bury all connector transmission lines to reduce the presence of tall perching structures and maintain the functionality of adjacent grouse habitats. For lines that are not buried, install raptor perch deterrents to reduce perching and electrocution risks.
5. Excluding emergency situations, conduct production-phase site visitations and maintenance operations during daylight hours to reduce overall disturbances to wildlife.
6. Install raptor perch deterrents on fence posts within greater sage-grouse and Columbian sharp-tailed grouse habitat.
7. Re-seed disturbed soils with a wildlife friendly seed mix recommended by CPW. The Colorado Seed Mix tool can be utilized to help identify appropriate native plant species for this area and the wildlife species present.
8. Maintain a robust noxious weed monitoring and treatment program approved by Routt County to help identify and eradicate noxious weed species within and around the project area.
9. Install appropriate stormwater and erosion control BMPs for any disturbed areas to reduce the transport of sediment into waterways.
10. Maintain low speed limits for all production-phase traffic to reduce wildlife collisions and overall disturbance.
11. During construction, utilize bear-proof trash receptacles for all food related waste and transport waste off-site on a regular basis.
12. Develop a program in coordination with CPW to install remote wildlife cameras within the incorporated big game movement corridors. Regularly provide collected data with CPW's Area 10 staff to help inform the effectiveness of various corridor widths and corresponding use by big game species present within the project area.
13. At the proposed battery storage facility, direct any required lighting downward and shield light sources to not cast light on adjacent wildlife habitat areas.

14. During necessary snow plowing for access roads, incorporate openings in plowed berms to allow passage for wildlife, especially associated with the included wildlife movement corridors incorporated into the project's design.
15. Contact CPW staff immediately for any observed wildlife within the perimeter fence, conflicts or mortalities associated with the proposed project and infrastructure.

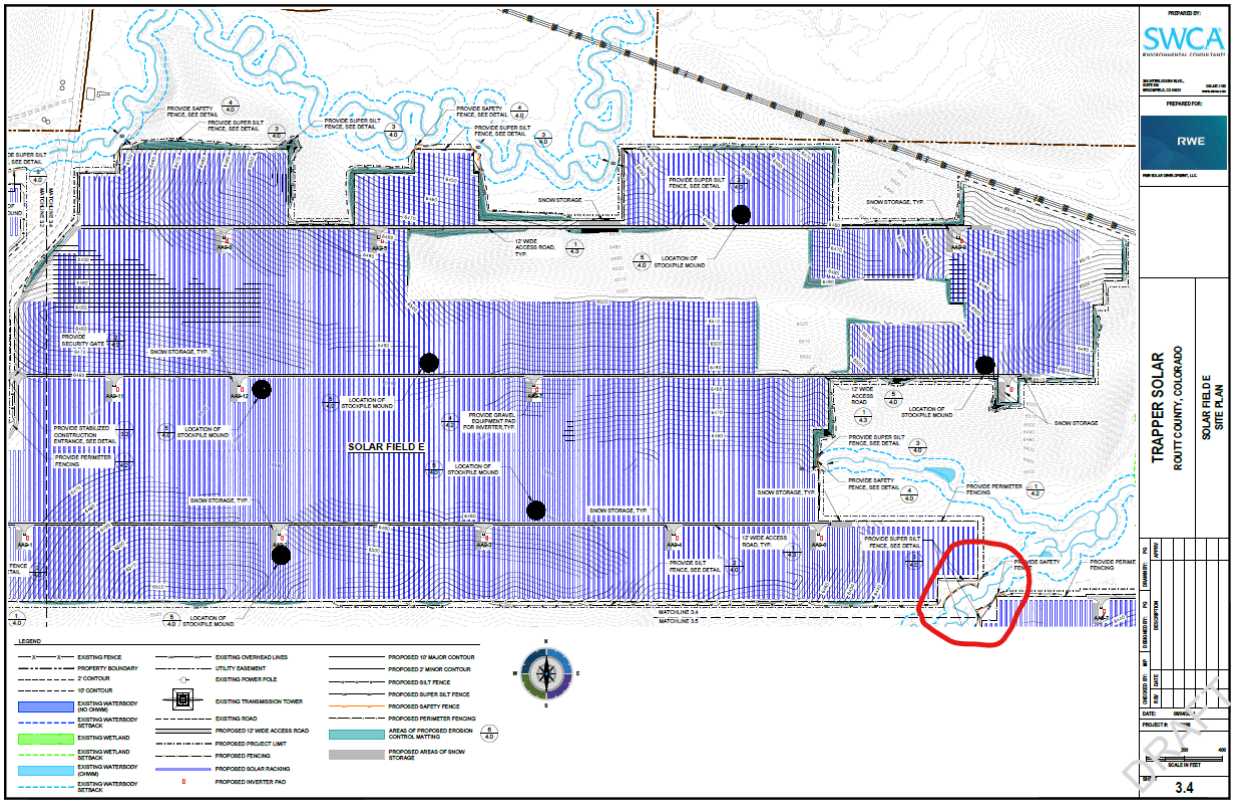
Compensatory Mitigation Measures:

The below items are intended to identify options for the project proponent to attempt to offset the unavoidable adverse impacts to wildlife associated with the proposed project. Given the size of this project, completely offsetting impacts is likely infeasible, however CPW considers the following measures beneficial for the species and habitats that are present within the proposed project area. Specific amounts for mitigation have not been assessed or determined between CPW and the project proponent. CPW anticipates that discussions will be ongoing to identify any specific contributions that might be made to alleviate the project's impacts to wildlife.

1. Make a donation (amount to be determined) to the Colorado Cattlemen Association's Yampa Valley Conservation Partnership to conserve existing wildlife habitat in the Yampa Valley in perpetuity.
2. Make a one-time donation (amount to be determined) to the Colorado Crane Coalition's Crops for Cranes program. This program was created to help maintain the presence of agricultural crops beneficial to sandhill cranes within the Routt County area. Funds will help offset the loss of crane habitat due to conversion into utility-scale solar infrastructure.
3. In coordination with Colorado State Land Board and private landowners, remove obsolete fencing near the project area to eliminate obstacles and hazards for big game migrating through this area. CPW can help coordinate with landowners to identify potential unnecessary fencing that can be removed from the landscape using a third party contractor.
4. Consider making a donation to Save the Hunt Colorado and/or Backcountry Hunters and Anglers to help alleviate the continued loss of public access and hunting opportunities, and the direct loss of public access associated with this project.

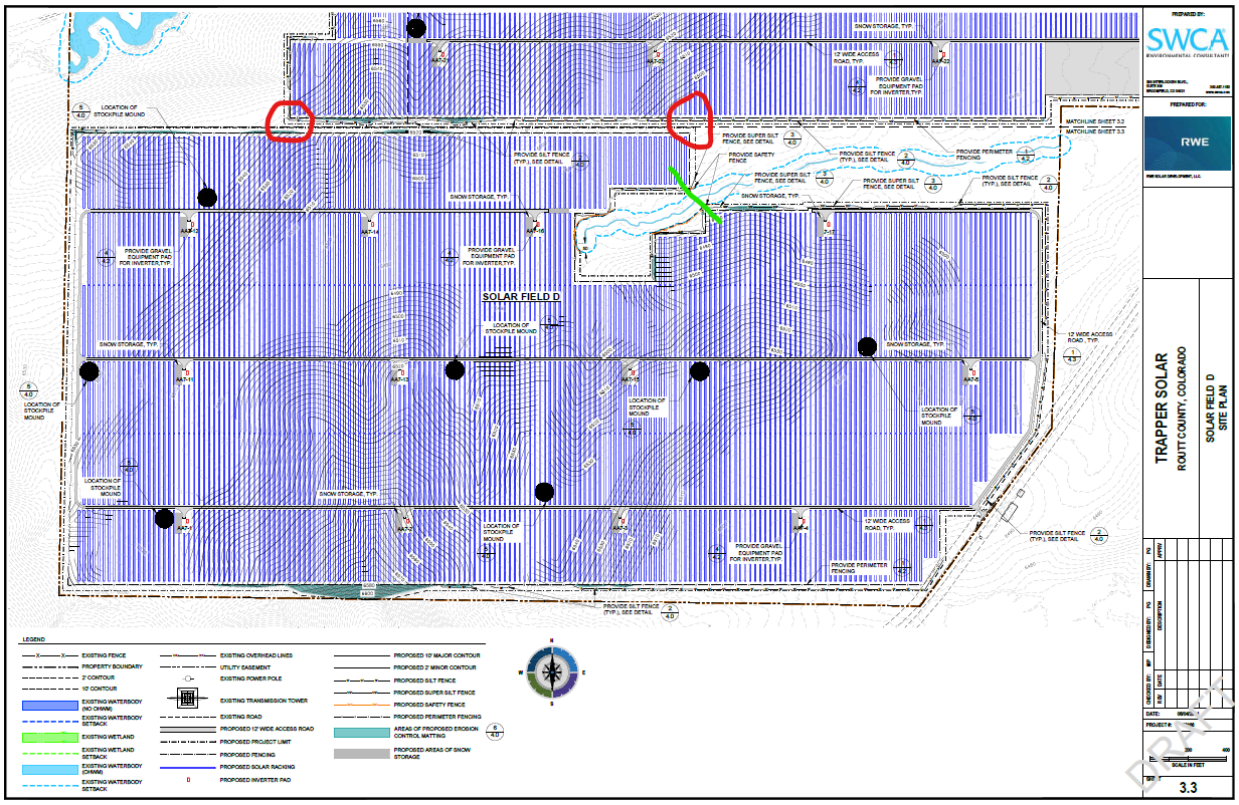
Appendix 1 (Specific Fencing Recommendations):

Figure 1:



* In the red circle consider pulling back the fencing as much as possible within this narrow “pinch-point” for wildlife. Any additional room that can be incorporated would be beneficial from a wildlife movement perspective.

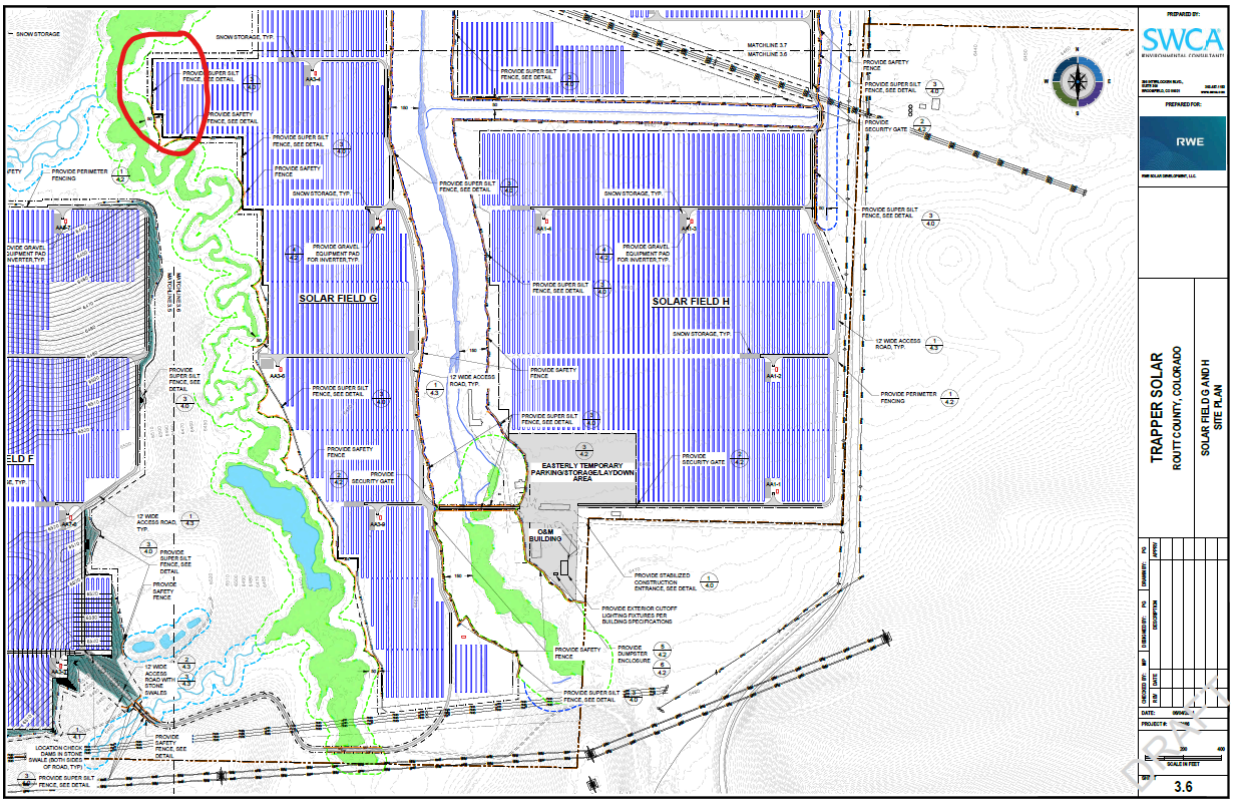
Figure 2:



* At the red circles, consider joining the fencing of the two array areas and remove the redundant fencing parallel to each other between the two circles. As drawn, it appears there would be a very narrow section between the two parallel fences which could trap wildlife if they enter this narrow area.

* In the area of the green line, consider opportunities to remove this dead-end corridor for wildlife, especially big game. CPW recommends discussing with Routt County the potential to fence this dead end corridor and preclude animals from becoming trapped in this near fully fenced area with only one escape option.

Figure 3:



* Within the red circle, consider opportunities to relocate these panels to another area within the project boundary. Expanding this wildlife movement corridor to the maximum width possible will help it be functional for the greatest number of wildlife species and individual animals with various tolerance levels to the new infrastructure.